

**BEFORE THE PUBLIC UTILITIES COMMISSION
OF THE STATE OF CALIFORNIA**



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Order Instituting Rulemaking to Develop a
Successor to Existing Net Energy Metering
Tariffs Pursuant to Public Utilities Code
Section 2827.1, and to Address Other Issues
Related to Net Energy Metering.

Rulemaking 14-07-002
(Filed July 10, 2014)

**GRID ALTERNATIVES' OPENING COMMENTS ON ADMINISTRATIVE LAW
JUDGE'S RULING SEEKING PROPOSALS AND COMMENTS ON
IMPLEMENTATION OF ASSEMBLY BILL 693**

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Dated: August 3, 2016

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I. INTRODUCTION

Pursuant to the July 8th, 2016 *Administrative Law Judge’s Ruling Seeking Proposals and Comments on Implementation of Assembly Bill 693* (“Ruling”), GRID Alternatives (“GRID”) hereby submits its comments and responses to questions.

Assembly Bill (AB) 693 (Eggman, 2015) created the Multifamily Affordable Solar Housing Roofs Program (“Program”) – a Program envisioned to deploy solar to dedicated affordable multi-family housing, thereby increasing access to solar for low-income tenants and providing direct economic benefits to tenant households. While AB 693 is unprecedented in the potential scope of its investment (up to \$100M annually),¹ the Program builds upon the strong foundation the California Legislature has demonstrated since 2006 in authorizing programs that increase equity and access to solar energy and renewable resources for low-income residents in disadvantaged communities. This focused and deliberate investment began with the establishment of the Single-family Affordable Solar Homes (SASH) and Multi-family Affordable Solar Housing (MASH) programs in 2006, their renewal via Assembly Bill (AB) 217 (Bradford) in 2013, and programs derived from Senate Bill (SB) 535 (De León, 2012) and the

¹ Section 2870(2)(c).

Greenhouse Gas Reductions Funds, such as the Low-income Weatherization Programs (LIWP). As California continues to be the nation's leader on issues surrounding equity and access to solar and renewable technologies, other states and regions have followed suit. The progressive notion of increasing equity and access to renewable energy – once considered ground-breaking and unique to California – has been replicated and expanded to other states and markets. This is evidenced by the variety of low-income solar programs and low-income program carve-outs intended to diversify solar access in recent years in Washington D.C., NY, CO, and in the White House's executive actions in both 2014 and July 2016 to expand access to solar and renewable technologies for more families.

As the nation's largest non-profit solar installer, GRID understands the unique barriers that prevent low-income solar adoption across states and markets. Deliberate, focused, and thoughtfully-designed programs can help increase equity and access. GRID has been honored to use the organization's on-the-ground experience to help shape and participate in the development, implementation, and administration of many of the nation's solar programs and appreciates the opportunity to offer its thoughts here toward implementing AB 693.

Since 2004, GRID has functioned as a direct service organization working exclusively with low-income families and affordable housing owners by providing access to solar technologies in communities where market solutions typically fall short. As a mission-based, not-for-profit, public-benefit organization, GRID's overarching objectives are increasing access to the benefits of solar technologies for low-income families while maximizing savings at the household level, championing consumer protection, and creating hands-on job training opportunities for the next generation of solar workers.

In California, GRID serves as the statewide program administrator for the state's two dedicated low-income solar programs for single-family households: the SASH Program, since 2009; and, the LIWP program commencing in 2014. In both of these programs, GRID has integrated its unique installation model that creates valuable hands-on job training and workforce development opportunities at every project for job trainees, many of whom hail from the same under-resourced communities as where the solar projects are installed. The workforce development program GRID Alternatives developed and implemented in the SASH Sub-contractor

Partnership Program (SPP) has become the foundation for the current MASH program requirement under AB 217.²

GRID also leverages its volunteer and job-trainee based solar installation model on multi-family affordable housing projects. In this capacity, GRID works with non-profit and public housing authorities across the county to install solar electric systems while increasing tenant engagement, maximizing direct tenant benefits, and incorporating robust workforce development opportunities for job trainees.

In 2015 and in partnership with a national foundation, GRID began offering technical assistance (TA) to multi-family affordable housing owners. GRID was also selected as the statewide Solar Provider for CA's cap-and-trade funded multi-family solar program and helped implement the statewide multi-family LIWP program starting in 2016. GRID believes that its experience in multi-family program design, keen focus on tenant engagement and on maximizing household benefits, as well as expertise in creating workforce development opportunities for solar job trainees uniquely position the organization to provide insights that could be helpful to the Commission and stakeholders in implementing AB 693. GRID's purpose in participating in CPUC proceedings is to provide a voice for low-income tenants and low-income households in disadvantaged communities and to use the organization's on-the-ground experience to help design and implement programs that are functional, practical, workable, and provide real impact and benefit to our most underserved communities.

(a) AB 693's Program

To define the primary purposes of AB 693's Program as requested in the Ruling, GRID Alternatives found it helpful to first envision the Program's primary beneficiaries and participants. The central beneficiaries of the Program are intended to be the low-income tenants residing in multi-family buildings who will realize monthly economic savings from solar. Additional beneficiaries will be the hundreds or even thousands of solar job trainees who receive job training or employment opportunities on these installations that create pathways to long-term employment opportunities. While the primary *beneficiaries* of the Program are low-income tenants and job trainees, the primary Program *participants* are the affordable housing operators

² Decision 15-01-027, January 29, 2015, at pgs. 17-21.

who will be the entities making the decision to put solar on their property. Having a trusted advocate on their side to help navigate the process could be a significant boon to ensure the Program is cost-effective, reaches property owners and operators who do not have experience in solar, and increases overall impact and success. This Program has to potential to be a tremendous resource for the state’s affordable housing providers, akin to a “one-stop shop” in which non-profit housing operators can receive technical assistance, project guidance, and assistance from a trusted consumer advocate to help them navigate the details and nuances of the solar project and the financing construct.

In addition to building owners and operators, solar installers are integral participants for this Program. GRID would like to see not only a robust job training requirement, but also the associated infrastructure developed to help streamline connections among employment-seeking graduates of community-based job training programs and workforce development opportunities on AB 693-funded installations.

(b.) Primary purpose(s) of AB 693’s Program

The primary purpose of AB 693’s implementation is to create a Program that maximizes benefits to low-income tenants in qualifying properties. Deliberate care and thoughtful program design can ensure the maximum benefits flow to low-income tenants, primarily in monthly cost savings and economic impact, but also through tenant engagement, increased energy efficiency education, and solar job training opportunities. The overarching primary goal should be maximizing the economic benefits to participating low-income households.

A secondary goal should be developing a strong and robust job training program that will have positive multiplier benefits in CA’s communities. Thirdly, special focus should be put on implementing the most cost-effective and nimble program possible so that the most low-income households will be able to benefit. Relatedly, it is important the Program take a comprehensive approach to solar and include avenues for energy efficiency measures to be implemented.

Though the potential scale and scope of this Program warrants stakeholders to think “outside of the box” in creative program design, particular thought and attention should be given to constructing a program that is workable and functional within the multi-family affordable housing space. This means the Program should incorporate lessons learned from MASH,

incorporate tested solutions successful in real-world applications, and ensure the program rules are structured to also incorporate the fast changing environments of project financing, distributed energy resource integration, and emerging technologies.

II. COMMENTS ON ALJ's QUESTIONS

1. To implement this requirement, the Program must ensure that all properties meet the definition of deed-restricted affordable housing codified in P.U. Code 2852 Section (a)(3)(A)(i). P.U. Code 2852 compliance is a fundamental qualifying parameter for all projects in the SASH and MASH Programs and the Commission has developed and refined the qualifying documents for the MASH Program to demonstrate compliance with P.U. Code 2852. There is a long record in the AB 217 proceeding on this matter³ and the Commission should ensure past issues are not repeated here by providing clear, deliberate guidance as to acceptable documentation demonstrating deed-restriction. From GRID's experience reviewing deed-restrictions and covenants for affordable housing owners, it is evident that documentation lacks uniformity and can be project-specific which adds complexity. It is clear from the inclusion of P.U. Code 2852 compliance as the cornerstone requirement for all properties in the Program that the Legislature envisioned the Program would serve properties dedicated to providing affordable housing.

One important consideration is that the length of the restrictions can vary per project, though 30 years can be common in the multi-family sector. Guidance and regulations should be provided for properties applying to the Program around expiration timelines for affordability restrictions. The purpose behind including affordability restrictions in both SASH/MASH is to ensure energy saving benefits continue to accrue to another low-income family. Some potential guidelines to address this issue could be: an affordability agreement would be acceptable if it has 10 years of affordability remaining; if there are more than 5 but less than 10 years remaining, then the property owner is required to sign an affidavit describing their intention to keep the property affordable; if less than 5 years remaining, the property owner is ineligible until they reauthorize the deed-restriction.

³ Decision 15-01-027, January 29, 2015. At pg. 55.

2. Yes. The CalEnviroScreen (“CES”), created by CA EPA pursuant to Section 39711 of the Health and Safety Code, should be used in this context, complies with the statute, and satisfies eligibility allowed under 2870(a)(3)(A). If using the CalEnviroScreen, the Commission will need to identify what percentages of census tracts measured as disadvantaged should be considered eligible.

In determining the census tracts to be included from CES, it is important to recognize that CES is a statewide tool and is not exclusive to the Investor-Owned Utilities (IOUs) boundaries. A significant proportion of the population of the top 25% of the most disadvantaged census tracts statewide – a metric used in the statewide LIWP program available in both IOU and non-IOU territories – live outside of the IOU territories.

To illustrate, consider the case of Los Angeles (LA) County: 4.3M, or 46%, of the 9.4M individuals who live in the top 25% statewide CES DAC census tracts, live in LA County.⁴ The Los Angeles Department of Water and Power (LADWP), a municipally-owned utility outside of the scope of AB 693, exclusively serves customers in LA County and serves a population of 3.9M.⁵ Removing LADWP’s population (3.9M) from LA County’s CES top 25% DAC population (4.3M) leaves only ~ 400,000 individuals in LA County, or 9% of the 4.3M that are in the top 25% statewide CES DACs. Similar results occur when looking at the population in the top 25% statewide CES DACs that are in municipal and publicly-owned utility territories such as the Imperial Irrigation District (IID) and the Sacramento Municipal Utility District (SMUD).⁶

When the 25% statewide metric for CES DACs is applied to the IOU territories, the result is widely inequitable as delineated in Table 1 below: less than 3% of SDG&E residential meters fall into the top 25% CES census tracts; whereas SCE has nearly 60% of its residential meters included in the same metric.⁷

⁴ <http://www.calepa.ca.gov/EnvJustice/GHGInvest/Documents/SB535List.xls>

⁵ LADWP website, 7/24/2015. https://www.ladwp.com/ladwp/faces/ladwp/aboutus/a-water/a-w-factandfigures?_adf.ctrl-state=10ts4zd93s_4&_afLoop=34204385877287.

⁶ CalEPA SB 535 List of Disadvantaged Communities, October 2014, <http://www.calepa.ca.gov/EnvJustice/GHGInvest/Documents/SB535List.xls>

⁷ Data prepared by GRID Alternatives, March 2016 derived from publically filed comments on Assembly Bill 693 from SCE, SDG&E, PG&E on November 2, 2015 and the CalEPA SB 535 List of Disadvantaged Communities, October 2014, <http://www.calepa.ca.gov/EnvJustice/GHGInvest/Documents/SB535List.xls>, and sourced information on the number of customers in each IOU. See Attachment A to this filing for complete information.

Table 1: IOU Residential customers in top 25% statewide CES DACs

	Total # of Residential Electric Meters*	Total # of Residential Customers in Top 25% CES DACs*	% of Residential Customers in top 25% CES DACs
SCE	1,890,000	1,134,579	60.03%
SDG&E	1,266,000	32,168	2.54%
PG&E	4,700,000	662,409	14.09%

**See Attachment A for data sources and summary*

This disparity between population distribution in the 3 IOUs territories is further evident from viewing the statewide map and observing that the vast majority of the top 25% DACs statewide are in the Central Valley, Inland Empire, and Los Angeles regions.⁸

GRID recommends the Commission consider the framework established in the CPUC’s Electric Vehicles proceedings⁹ and select the metric of either the top 25% most disadvantaged statewide OR the top 25% most disadvantaged within each IOU – whichever is broader – as this will increase opportunity for residents in SDG&E and PG&E to benefit from the program and is more equitable than a 25% statewide metric.

3. GRID refers to its response to question #1 for documentation recommendations around Section 2852(a)(3)(A)(i). For 2870(a)(3)(A) – the DACs – this can be simply ascertained by cross referencing CalEPA’s maps and lists, assuming the CES DACs are utilized. Should CalEPA update or change these maps, the new or refined census tracts should be eligible if they meet the designated percent disadvantaged addressed in question #2.

For 2870(a)(3)(B), a regulatory agreement or equivalent documentation showing the properties’ current rent restrictions and Area Median Income (AMI) limits could demonstrate compliance. This type of regulatory agreement is required in the LIWP multi-family program which GRID helps administer.

4. GRID has no comment on this question at this time.

5. GRID does not recommend establishing a split incentive budget between properties qualifying under Section 2870(3)(A) and Section 2870(3)(B). Both Section 2870(3)(A) and

⁸ Cal EPA CalEnviroScreen Version 2.0, October 1, 2014.
<http://oehha.maps.arcgis.com/apps/Viewer/index.html?appid=dae2fb1e42674c12a04a2b302a080598>.

⁹ D.16-01-023, January 14, 2016 at pg. 41. and D.16-01-045, January 28, 2016 at pg. 138.

Section 2870(3)(B) refer to properties that first meet the definition of deed-restricted affordable housing pursuant to P.U. Code 2852 (a)(3)(A)(i). This is the same deed-restriction allowable in the MASH program, and describes qualified affordable housing properties in which at least 20% of the units are designated for “lower-income households,” defined in the Health and Safety code as households with incomes that are 80% or less of Area Median Income (AMI).¹⁰ As such, there is already a more stringent income requirement in place for the “low-income” qualifying properties under Section 2870(3)(B) as 80% of the households must be at 60% or less of AMI. This is a stricter income requirement than the income requirement for properties located in a DAC and qualifying under Section 2870(3)(A) (as only 20% of units need to be at or below 80% AMI). Therefore, the definition inherently incentivizes installations in DACs because the income requirements are less restrictive than for properties outside of DACs.

6. Similar to the reasoning in #5, above, GRID does not recommend establishing a split MW budget between properties qualifying under Section 2870(3)(A) and Section 2870(3)(B).

7. In terms of incentive structure, GRID supports an up-front incentive as it is transparent, providing the funding certainty that will allow property owners to make decisions regarding solar and energy efficiency investments at their property. Clearly the language of Section 2870(f)(4) requires the Commission to consider the Federal Investment Tax Credit (ITC) and other financing resources in addition to the ITC that are being brought to the project when determining the incentive structure and level. The LIWP program is an example of a real-world application where there are differential incentives based on the other funding the project leverages; though, it should be noted that the program is nascent, having officially launched earlier in 2016. The LIWP program contains a “matrix” by which the incentive is set based upon the project cost and the other types of funding the project leverages (ex. ITC, Low-income Housing Tax Credit (LIHTC), MASH) and is further delineated based on the percentage of common load versus tenant offset load. The LIWP program also has parameters for incentive level review once certain MW targets are attained in the program, allowing flexibility to make adjustments when market conditions change.

¹⁰ CA’s Health and Safety Code, Chapter 2, Section 50079.5.

Basing the incentive level on system costs; however, has an overarching challenge in the lack of accurate cost data in this sector. The CPUC’s 2015 MASH program evaluation report conducted by Navigant Consulting identified that for program years 2011-2013, the reported MASH costs for projects did not decline – in sharp contrast to both general market project costs and the SASH program costs – which declined in direct relation to the overall dramatic reductions in solar costs for projects across the state and country at that time.¹¹ Navigant further described these unexpected results in MASH by stating, “Typically, equipment and installation costs decline on a dollar per watt basis as the project size increases.”¹² GRID includes this finding to suggest that AB 693’s incentive levels should not be based on historically-reported MASH program data as it appears inaccurate. GRID highlights the importance of having tight cost-controls in place in AB 693’s Program so that the available incentive dollars can benefit the most low-income tenants, as possible.

An ideal outcome for AB 693 is to develop an incentive structure that does not over-subsidize projects; but rather, drives additional public-private-nonprofit investment dollars to projects and considers the multitude of funding sources a project could leverage. Though the systems must “primarily” offset tenants loads as described in Section 2870(f)(2), there must be some accommodation for a percentage of common load offset, as otherwise the property owners will have little impetus to participate in the program. GRID interprets “primarily” to mean a majority, or > 50%. While GRID makes no specific recommendation as to what percentage of common load areas could comprise of the overall system, GRID recommends differing the incentive amount based on the percentage of common load area offset and affording systems that benefit tenants in a higher proportion to common load areas a higher incentive amount. In sum, GRID suggests developing an incentive structure that accounts for other typical financing that is often leveraged for multi-family solar installations, maintaining flexibility to make modifications in subsequent program years, and erring on the side of prudence to not over-incent projects.

¹¹ Lawrence Berkeley National Laboratory: “*Tracking the Sun VIII: The Installed Price of Residential and Non-Residential Photovoltaic Systems in the United State*” August 2015 at pg. 15.

¹² Navigant Consulting: “*California Solar Initiative – Biennial Evaluation Studies for the SASH and MASH Programs, Impact and Cost Benefit Analysis Program Years 2011-2013*” January 28, 2016 at pg. 43.

8. A “solar energy system” by definition refers to, among other things, a system that “must have the primary purpose of providing for the collection and distribution of solar energy for the generation of electricity.”¹³ *Collection* of energy pursuant to this definition provides a basis for batteries to be eligible components for a system incentivized by the Program. However, given the lack of precedence in providing incentives for battery storage systems in existing CPUC low-income solar programs, it seems requisite that the Commission clarify its determination on this matter for purposes of AB 693 implementation.

9. GRID is generally supportive of battery storage for this Program. Given the fact that, theoretically, this Program could run until 2030, the Program design today should leave room and flexibility to incorporate a host of emerging technologies that could come on line in the near future. GRID does not think this means all of the incentive structures need to be set today to incorporate these technologies, but rather, it is important to leave the room and flexibility to do so during the Program’s lifespan. As such, GRID has no specific recommendation on incentive levels as related to battery storage.

10. As an active party to the proceeding to implement SASH/MASH for over 8 years, as well as the co-sponsor of AB 217 to extend SASH/MASH, GRID recognizes the hard work, effort, and valuable time that has been committed by parties, the Commission, MASH program administrators, and other stakeholders to develop and refine the MASH program.

AB 693 implementation affords the Commission and stakeholders the unique opportunity to build upon this 8-year body of work and take the parts of the MASH program that worked well across the board and maintain them, while also taking a critical look at what could be done differently in MASH to improve the AB 693 Program. GRID does not think a complete “reinvention of the wheel” is required here, but there are certainly aspects of MASH that should be refined and modified for AB 693, while many of the functioning framework pieces should remain intact.

To illustrate, some MASH program elements that are fundamental for a rebate-funded solar installation and should be maintained include: the warranty requirement, a comprehensive program handbook, the interconnection requirement, system sizing parameters, performance and

¹³ Section 25781(e), Public Resources Code.

permanency requirements, compliance with criteria established by the CEC pursuant to Section 25782 of the Public Resources Code, and requirements that participating installers have active contractor's licenses and are in good standing, etc.

In contrast, some aspects of the MASH program that GRID does not support replicating for AB 693's Program include the incentive structure and levels (see question #7), energy efficiency requirements, (see question #22), program administrator structure (see question #17), and the job training program requirements (see question #12). GRID also suggests modifications to the MASH program's project milestone and reservation requirements to help ensure only viable projects in AB 693's Program receive reservations and are installed in reasonable timelines (see question #15).

GRID recommends streamlining the MASH program's inspection process in the AB 693 Program to ensure field inspections are completed within 30 calendar days. Furthermore, GRID recommends that incentive payments should not be delayed by the inspection timeline. If any issues are identified in the inspection, the contractor should have an opportunity to remedy them and/or be required to return incentive payment (if the installed system size is determined to be smaller than reported, for example).

11. It is important within the Program structure that safeguards are put into place to ensure additional costs of the system are not passed on to tenants. It could be part of the application process to require an affidavit from the property owner formally affirming that costs from the system will not be passed on to the tenants in any form such as by utility increases, rent increases, or by any other possibility. This affidavit could also note that any risk of default of the third-party system owner on their rights and obligations under the agreement are to be borne solely by the property owner/operator. One part of the Program's third-party evaluation could include working directly with tenants through interviews and surveys to ensure they are receiving the intended benefits and not experiencing any additional costs.

In regards to operations and maintenance (O&M) of the system, investors in a third-party ownership (TPO) structure are expecting an annual return on their investment in the system so O&M costs are generally standard and included and covered in the TPO arrangement. The AB 693 Program administrator(s) could verify this by reviewing project contracts. Investors in a TPO model are often expecting a 20-year revenue stream that makes the system economics of

leveraging the ITC feasible, and so they are typically unable to allow the system to under-produce for an extended time – corrective actions would be taken to bring the system in line with its expected output and revenue generation. For this reason, a performance guarantee can be redundant in these arrangements. However, GRID supports transparency around the production of solar electric systems funded through the Program, and suggests including an assessment of performance and kWh output in the Program’s third-party evaluation cycles.

12. The workforce development component should be an integral component of the AB 693 Program. Installations funded through AB 693’s investments should provide robust and substantive job training opportunities, thereby increasing the Program’s overall benefits to California communities.

GRID Alternatives recommends:

- A. Job training requirements that are structured similarly to the SASH and MASH programs, but with modifications to offer a more substantive training experience for job trainees, and eliminating the 50-mile exemption in MASH.¹⁴
- B. The Program administrator(s) offer resources to participating contractors seeking to hire job trainees, as well as employment resources and support to the Program’s job trainees to help them obtain gainful employment in the industry.
- C. The Program implement strategies for tracking job trainees in the Program and assessing their success in obtaining full-time positions in the industry.

A. Job Training Requirement

GRID Alternatives understands that the job training requirement must be easy to navigate for participating installers, and designed in such a way as to not be overly cumbersome for contractors. GRID reiterates here that the job training requirement for SASH SPP – hiring a trainee for a paid 8-hour workday for an average < 3kW system – has not been a barrier to any installer to participate and the majority of SPP partners are small, locally-based companies.¹⁵ GRID also recognizes that contractors who are required to hire job trainees to comply with

¹⁴ MASH Program Handbook, http://www.gosolarcalifornia.ca.gov/documents/MASH_Handbook.pdf. Section 2.5.3, at pg. 25.

¹⁵ GRID Alternatives Reply Comments Regarding the Staff Proposal for Assembly Bill 217 Implementation, August 1, 2014, at pg. 8.

Commission-approved programs – SASH, MASH, and now AB 693 – require individuals who have experience and training in solar installation and safety protocols and can be an asset to the work crew. GRID supports the 40-hour classroom and/or hands-on experience requirement that has been established in the SASH SPP and MASH program¹⁶ as the baseline requirement in the AB 693 Program for its for-profit installers.

GRID is cognizant that requiring a high number of individual trainees on the job site is challenging for contractors to manage and adds project costs. Also, the workforce development experience is more meaningful for a job trainee when they are able to have multiple workdays on the project. As such, GRID recommends revising the requirements for hours and the number of trainees in the existing MASH program for AB 693's Program in such a way as to provide more training hours, but for fewer trainees. GRID also recommends removing the exemption to allow existing staff to count toward the MASH job training requirement¹⁷ in AB 693's Program.

For projects installed by nonprofit solar installers, be it GRID Alternatives or any other nonprofit solar installer, GRID recommends the Commission adopt a similar framework as SASH and allow volunteer positions to qualify, such as job trainees in GRID's Team Leader, Solarcorps, and Job Training Group Installation volunteer training programs, or their equivalents. The Commission recognized the value of these unique hands-on training experiences provided by non-profit installers in SASH¹⁸ and GRID believes a similar reasoning should apply to the AB 693 Program.

Exemptions: GRID Alternatives' job training organization partners are located throughout the state and its volunteers and job trainees live in nearly every CA county. The SASH SPP program installs projects throughout the IOU territories, from the Chemehuevi tribal nation on the CA/AZ border to the remote north coast regions to tribal communities in the eastern sierras. There is never an exception made for the job training requirement in the SASH SPP based on the location of the project and its proximity to a job training program, and GRID does not think the 50-mile exception in MASH, or a similar exception, should be replicated in AB 693. Students of job

¹⁶ MASH Program Handbook, http://www.gosolarcalifornia.ca.gov/documents/MASH_Handbook.pdf. Section 2.5.2, at pg. 24.

¹⁷ MASH Program Handbook, http://www.gosolarcalifornia.ca.gov/documents/MASH_Handbook.pdf. Section 2.5.2, at pg. 24.

¹⁸ Decision 15-01-027, January 29, 2015, at pg. 69.

training programs do not necessarily live near the training program, and GRID has observed that its network of volunteers and SPP job trainees are willing to travel much more than 50 miles to a job site for a hands-on solar training experience or paid workday.

B. Resources for contractors and trainees

From GRID's experience working with contractors hiring in SASH SPP, and from inquiries GRID's staff members receive regularly from MASH contractors across the state seeking job trainees, it is evident that contractors benefit when they are provided resources for job training programs, and resumes of eligible job trainees to support their endeavors to hire in compliance with SASH and MASH.

GRID has established relationships with 70 CA job training programs – from community colleges, to organizations providing training for formerly incarcerated individuals, to technical apprenticeship programs, to high schools, and more. GRID also has an active volunteer base of over 6,000 individuals in CA, many of whom are volunteering in order to obtain training and certification on specific skillsets such as through GRID's Team Leader and Solarcorps programs.¹⁹ When SASH SPP installers and MASH contractors inquire about eligible job trainees, GRID's staff provides them resources for job training organization partners and job trainees who are seeking employment opportunities through both direct referral information and an online resume bank. While GRID supports allowing contractors to hire from a broad variety of training programs and encourages companies to make new connections in the solar training space, the reality is that many contractors do not have established relationships with job training programs and appreciate the availability of support to connect training programs and trainees to employers that GRID provides.

For the AB 693 Program, GRID envisions that the program administrator(s) could develop a database that contains a list of potential job training programs and a resume bank for trainees seeking positions on these projects as a valuable resource for both installers and job trainees. Furthermore, AB 693's trainees could be provided employment resources from the program administrator(s) to help them obtain full-time employment after their AB 693 installation

¹⁹ GRID Alternatives' website, <http://gridalternatives.org/programs/workforce-development>.

experience. GRID believes that a statewide third-party program administrator with the mandate to provide workforce development resources could best provide these tools for contractors and job trainees in the AB 693 Program (GRID further elaborates on this point in response to question #17)

C. Tracking and job placement

GRID suggests developing a tracking system for the Program's job trainees to assess how many of them are successful in parlaying their experience as a job trainee in the Program into full-term employment in the industry. Though tracking of job placement is inherently challenging, doing so will enable the Program to better quantify the benefits and outcomes of its job training requirements.

GRID Alternatives has implemented strategies in the SASH program to track the job trainees in the Sub-contractor Partnership Program (SPP) that could be applicable to the AB 693 Program. In the SASH SPP program, the job trainees are hired directly by the participating sub-contractors. GRID provides resources to the sub-contractors such as contact information for its local job training program partners, and resumes of qualified Team Leaders (experienced volunteers who meet the SPP job training requirement) through an online resume bank, but it is the sub-contractors who directly hire the job trainees. GRID has recently required the SPP job trainees to register on GRID's website portal, so that GRID can establish a relationship with the trainee as well. Through the portal, GRID communicates regularly with the SPP job trainees, provides employment resources such as job postings, and offers incentives for the SPP job trainees to report to GRID when they obtain full-time employment. Similarly, GRID requests the SPP contractors provide updates when they hire an SPP trainee full-time. Though it is not a perfect system, GRID has been able to improve its ability to assess full-time employment as an outcome of its job training experiences by implementing these straightforward strategies.

The AB 693 Program will be reviewed and referenced for years to come by other states, Commissions, and a wide variety of interested stakeholders. While the number of workdays and the training hours provided to job trainees is an important metric, a more meaningful metric is the *result* of those workdays: the number of trainees who were able to parlay their experience as a trainee in the Program into full-time employment in the industry. If the Program is able to track the outcomes of the job training experiences it creates, it can better quantify and assess the

workforce development benefits. Therefore, GRID recommends the Commission implement a tracking system for job trainees at the Program's onset.

Local hiring: GRID does not take a strong position on the "local" hiring component. GRID does think the overall hiring requirement should be in relation to job training programs and individual job trainees, and not businesses such as suppliers or distributors of solar equipment.

GRID understands how parties could interpret the statute to mean that only job training programs and trainees located or living in the DACs that are deemed eligible for the Program be eligible for the Program's projects. GRID's experience has shown that community-based job training programs and individuals who could benefit from a job training experience are found throughout the state. If the Commission uses the CES, the CES DACs include many factors to assess "disadvantaged" and not just economic factors that directly correspond to unemployment and underemployment and the need for employment opportunities. As has been documented by numerous parties in discussions on the CES DACs,²⁰ these designations invariably exclude areas in dire need of economic investments that should have the opportunity to participate in AB 693's job training programs but may not count as disadvantaged for CES. Tangible examples are tribal reservations in northern California where unemployment and poverty rates are well over the state and national averages, but these areas would not be included in the CES DACs even if the cutoff point changed to include the top 50% or higher of CES scores due to their relatively more favorable pollution factors.²¹ An overly restrictive requirement on location of where the trainee lives or where the job training program is located could have the unintended consequence of limiting the participation of job trainees and community job training programs GRID strongly believes the Program's intent is to serve.

13. As GRID described in the Introduction Section I (b.) "Primary purpose(s) of AB 693's Program," the Program's primary purpose should be maximizing economic benefits to low-income tenants. GRID interprets the requirement in Section 2870(f)(6) that the electricity generated by incented systems be used to "primarily" offset tenant usage to mean at least the

²⁰ See for example, *Comments of Brightline Defense Project in Response to Successor Net Energy Metering Tariff Proposals*, Sept. 1, 2015 at pgs. 5-6; *Comments of the Greenlining Institute on Proposals for a Net Energy Metering Successor Tariff for Disadvantaged Communities*, Sept. 1, 2015 at pgs. 3-6.

²¹ <http://www.bia.gov/cs/groups/public/documents/text/idc1-024782.pdf>. At pgs. 10, 33, 36.
<http://oehha.maps.arcgis.com/apps/Viewer/index.html?appid=dae2fb1e42674c12a04a2b302a080598>

majority (> 50%) of the system should be dedicated to tenant load offsets. Some accommodation will need to be made for common load offsets to address the split incentive issue identified in MASH. A differential incentive structure could provide an incentive based on the percentage of tenant versus common load that the system is designed to cover thereby incenting building owners to maximize the percentage of tenant offset.

The nuances of affordable housing, particularly the utility allowances in federally-subsidized housing through the Department of Housing and Urban Development (HUD), require special consideration in the Program design. In these types of housing arrangements, a low-income tenants' monthly financial obligation for rent and utilities is based on a percentage of their income, usually 30%.²² Without deliberate incorporation of the utility allowance in the Program, it is plausible that low-income tenants could receive credits for electrical generation on their utility bills, thereby reducing their utility cost; however, their rent would simply increase in the exact amount as their utility bill decreased – rendering them with no net economic benefit at the end of the month. Section 2870(g)(2) requires the Commission to ensure a direct economic benefit to tenants, so the role of the utility allowance must be thoughtfully incorporated in the Program design. One way this could be addressed is using the affidavit structure established in the MASH program, whereby the property owners verify that tenants under a utility allowance structure will receive net monthly savings and ensure rent increases do not occur when utility costs are reduced.

Likewise, master metered buildings merit additional consideration in the Program design. Often these properties are managed by non-profit housing providers or public housing authorities and serve vulnerable populations. In a master metered building, the owner of the building is financially responsible for all building electric loads and must offset this operating expense through a combination of rental income and subsidies. With careful consideration, the Program can offer substantial savings to the operators of these buildings while ensuring direct tenant benefits are also achieved as a primary outcome. As part of the Program's third-party evaluations

²² Navigant Consulting: “California Solar Initiative – Biennial Evaluation Studies for the SASH and MASH Programs, Market and Program Administrator Assessment, Program Years 2011-2013” January 28, 2016 at pg. 74.

and audits, particular focus could be given to outreaching with participating tenants to verify they are receiving the economic savings described in the affidavits.

14. GRID supports the inclusion of a VNM tariff into the AB 693 Program, akin to MASH. Although Resolution E-4792 has approved the IOU's Time-of-Use (TOU) rate structure for NEM 2.0 customers,²³ GRID believes it is important to acknowledge the potential negative repercussions of TOU rates on low-income tenants in this Program and supports an exemption to TOU rates for both low-income tenants and property owners in the Program. In the Decision establishing the SASH program, the Commission acknowledged concerns from stakeholders such as SDG&E that TOU pricing could have "unintended consequences and actually increase energy costs" for low-income customers and concludes, "...as the Commission develops new TOU tariffs, it should ensure TOU impacts on low-income solar customers are considered."²⁴ GRID points out that low-income households have increased limitations on adapting their electric use to meet price signals in a TOU structure as compared to households with greater economic resources. Low-income families may have work schedules that prevent them from being able to modify their behaviors such as using appliances with high electric load at off-peak times. They are less likely to own a "smart device" that would advise them of on-peak and off-peak hours. GRID advises the Commission protect low-income tenants in this Program and allow an exception for these households to remain on a tiered rate structure to help ensure they realize maximum savings from solar. GRID also supports a similar exception for property owners in the Program to have the option to stay on tiered rates rather than moving to TOU rates.

15. GRID Alternatives appreciates the spirit of this question, and believes it is important in the Program design to avoid the result of the MASH 1.0 and MASH 2.0 programs in which all of the incentive reservations "sold out" quickly, often with projects that were effectively "placeholders" and did not come to fruition,²⁵ closing the door on additional participation in future program years. A result such as the one observed in MASH might suggest that there were flaws in the program design including over-incenting projects.

²³ Resolution E-4792, June 23, 2016, at pg. 22.

²⁴ Decision 07-11-045 November 16, 2007, at pg. 38.

²⁵ The most recent MASH program report notes an average dropout rate of ~40%, meaning that 40% of projects that obtained a reservation were withdrawn or cancelled. Multifamily Affordable Solar Housing Semiannual Progress Report August 1, 2016, at pg. 13.

For the AB 693 Program, GRID believes there should be a way to allow fair participation over the course of a year, and that such guidelines apply only to installers and to developers/financiers. GRID does not think suppliers should be held to this standard as a supplier is envisioned as a manufacturer, and it would not be reasonable or effective to limit the types of equipment that can be used.

There are a number of ways in which fair participation for installers and developers/financiers could be encouraged by the Program, some examples are:

- A. Designing how the reservations are determined and approved so that only “viable” projects are accepted as reservations, rather than “placeholder” applications that may or may not have a fully-developed project behind them. The LIWP program which GRID helps administer is an example of how this could function in practice. In the LIWP program, projects have aggressive timelines for milestones that must be met in order to hold the reservation. For example, a signed contract is required within 60 days after the application is submitted and a building permit required 30 days after that. These types of benchmarks and milestones help ensure only viable projects receive and maintain reservations.
- B. There could be a percentage limitation on the number of projects for any one installer or developer/financier during a funding cycle. For example, in the first 3 months of an annual funding cycle each installer or developer/financier is capped at a certain percentage of the available incentives, such as 10%. After the 3-month time period, the reservation cap is removed which will help ensure annual funding has adequate time to be programmed.
- C. There could be a lottery for reservations in each funding cycle. The Commission could refer to CT’s SREC program for a functioning example.²⁶

Any limitation on installers or developers/financiers will need to be thoughtfully designed and consider the complex business structures and relationships in this space. GRID does not hold a position as to the right avenue for such a Program design element, but urges the Commission to

²⁶ <https://www.eversource.com/Content/docs/default-source/ct---pdfs/rec-solicitation-planbba08b0f1b5267e39dbdff0000e2e88e.pdf?sfvrsn=0>.

consider various approaches to address this issue that was clearly identified and documented in the MASH program so that it less likely to be repeated in the Program.

16. GRID’s comments to this question mirror the comments in #15, above. GRID appreciates the spirit of this question and believes it warrants further consideration. To GRID, it is a moot point if the limitations are placed on incentives or on MWs – the point is that some type of limiting mechanism on one or both is an important component to consider in Program design.

17. GRID believes that the participants of the AB 693 Program could be best served by having a single, third-party statewide program administrator that is a not-for-profit or public-benefit entity with expertise in affordable housing, solar technologies for multi-family dwellings, and job training programs, among other aptitudes. This view is informed by GRID’s experience with the multi-family LIWP program and by envisioning the types of services and resources a program administrator (“PA”) could provide that could help maximize the benefits of the Program.

As described in the Introduction Section I (a) “AB 693’s Program,” the primary participants of this Program who will be making the decision to participate and adopt solar on their property are the low-income housing owners and operators. Many of these owners are non-profit operators or public-benefit housing authorities. GRID’s experience supporting the development of the statewide multi-family LIWP program and as a national technical assistance provider has demonstrated that many property owners in this sector require support and a trusted consumer advocate in order to successfully navigate the complicated tax financing structures of these properties, understand the technical aspects and costs of solar and energy efficiency measures, and ensure the contractual structure they are agreeing to ensures long-term benefit for their property and its tenants. A single statewide administrator could provide assistance, expertise, and be a consumer advocate for these building owners/operators – many of whom will be navigating solar for the first time if the Program is to make significant inroads in impact and scope.

GRID envisions that the comprehensive services a PA(s) for this Program could provide would be in stark contrast to the services the existing MASH PAs provide. In essence, the existing MASH PAs review projects for accuracy and completeness and issue incentive payments as core

functions, but they do not provide services in the areas of technical assistance for solar, contract support, bid review, or job training program support for participating installers – these types of PA services would be of great benefit to the AB 693 Program’s participants.

A single statewide program administrator for the AB 693 Program offers many other benefits: there are economies of scale that can be realized by having one entity oversee a program. A single statewide program administrator is likely to be nimbler in implementing Program modifications statewide and in integrating AB 693’s Program with other programs, be it energy efficiency (EE), distributed energy resources (DER), or others that come on line in the future. As GRID has observed from administering the SASH program for 8 years, it is very efficient to coordinate communications between the Energy Division and single PA and to effectively implement program changes statewide.

Another important benefit is that there would be a consistent marketing and outreach message that can be maintained by having one entity oversee the program messaging. The Commission has observed some of these benefits in action in the SASH program, whereby one trusted entity – GRID Alternatives as the program administrator – markets the program statewide to the target market which are considered vulnerable populations, low-income households. For the AB 693 Program, a statewide PA that also functions as a consumer advocate could provide mission-aligned guidance and services and ensure there is a consistent statewide message around the potential full range of services that could be integrated in the solar installation, such as EE, DER, job training, etc.

AB 693’s statutory mandate for geographic diversity also lends itself well to a single statewide program administrator. Such as PA could monitor applications based on location, and when certain areas (be it based on region, county, etc.) are underrepresented in the Program, the PA could increase its marketing and outreach to qualified building operators in those regions.

Additionally, the installers participating in the Program could benefit from having a single third-party program administrator. Having more than one program administrator can create confusion for participating installers due to the lack of uniformity and consistency, as documented in the

CPUC's 2015 MASH program evaluation.²⁷ Furthermore, many participating installers would be well-served by having a Program administrator who could help them identify eligible job trainees, as further described in GRID's response to question #12. In the existing MASH program, there are limited resources, if any, provided by the PAs to installers seeking eligible job training programs and job trainees. GRID Alternatives receives inquiries regularly from MASH contractors around the state who are looking for job training organizations and job trainees to hire for their MASH projects. Though GRID does not administer MASH, the organization has been providing resources to MASH contractors free of charge as a mission-aligned activity; however, this suggests a shortcoming in the services provided by the existing MASH PAs that could be remedied in AB 693's Program by requiring the Program administrator to provide services related to workforce development.

18. GRID has no comment on this question at this time.

19. GRID has no comment on this question at this time.

20. GRID has no comment on this question at this time.

21. GRID has no comment on this question at this time.

22. GRID Alternatives generally supports some degree of leveraging and integrating existing energy efficiency (EE) programs with the AB 693 Program in a synergistic fashion. For the types of properties that qualify for the Program, there are likely considerable opportunities for savings through energy efficiency at the common load level, though tenant units can also realize EE savings and contribute to overall reduced electric load at the property.

GRID believes it is important to incentivize energy efficiency measures being actually implemented in coordination with the solar Program, but is cognizant that an overly strict, costly, or complex EE requirement could have the unintended consequence of preventing projects in this Program from being built. For example, a hypothetical requirement that all low-income tenants in a building enroll in and complete the IOUs' free Energy Savings Assistance Programs (ESAP) as a condition of receiving a solar incentive would be unreasonable and unworkable as ESAP

²⁷ Navigant Consulting: "California Solar Initiative – Biennial Evaluation Studies for the SASH and MASH Programs, Market and Program Administrator Assessment, Program Years 2011-2013" January 28, 2016 at pg. 61.

administration is out of the control of the Program participants; yet, enrolling as many tenants as possible into ESAP and having them complete the ESAP services is one of many ideal outcomes. Moreover, installing energy efficiency measures at the properties for the common load area is an important objective and one that will have positive multiplier effects for the buildings' operating costs, the state's climate goals, and the Program's reach and impact.

a) GRID does not support the Commission adopting EE requirements equal to Section 2852. That requirement takes the form of a building audit, or enrollment in whole-building energy efficiency program. This mirrors the current MASH program requirement, which in addition requires referring all tenants to ESAP providers.²⁸ GRID views these elements as a reasonable starting point, but inadequate as a complete response. Ultimately, GRID would like to see the Program be successful in inducing energy efficiency measures to be implemented, rather than simply identified through an audit.

One way this outcome could be achieved is by incentivizing energy efficiency in the Program structure. For example, there could be a higher incentive available for projects that actually complete a designated portion of the energy efficiency measures possible and identified in an audit before installing solar. Similarly, if some percentage of tenants complete (not just enroll in) ESAP program services before the solar is installed, then that property could be eligible for such an "energy efficiency adder." The costs for the EE measures in the common load area could be quite considerable, so the "energy efficiency adder" could help offset the upfront costs and induce more building operators to invest in such measures.

Another possibility is to build off the structure developed for the multi-family LIWP program, whereby properties must make a good faith effort to implement EE measures that reduce overall electric load by 15% in order to be eligible for the LIWP program's incentives. Additionally, there can be limitations placed on system size to further incent EE measures being implemented. However, in many cases the available roof space is the primary limiting factor for system sizing so including EE into the system sizing calculation may not result in the desired outcome. Under any EE requirement in the AB 693 Program, it will be important to allow time and flexibility for

²⁸ MASH Program Handbook, http://www.gosolarcalifornia.ca.gov/documents/MASH_Handbook.pdf. Section 2.4, at pg. 23-24.

property owners to adopt and implement EE measures, as the EE financing and timelines may not align with the solar installation.

In addition to incenting the implementation of EE measures, GRID has found in working with thousands of low-income families that one of the most important and effective strategies to increase energy efficiency at the household level is to provide comprehensive energy efficiency education. GRID provides energy efficiency educations to every family served in a culturally-sensitive, technically-appropriate education session conducted in the language spoken in their home. For many households, the education GRID provides proves to be illuminating, and they are able to make simple changes around their house to reduce their electric costs as well as enroll in ESAP services to realize additional savings. For AB 693's Program, GRID suggests building off of this successful strategy and offer EE education sessions for tenants in the building as part of the solar installation. The program administrator(s) could oversee this requirement, compile the EE programming and ensure it is conducted, either through the PA(s) own efforts or as a requirement for the installer. This will not only increase tenant engagement in the solar project, but also will educate families and enable households to realize additional cost savings, as well as increase the likelihood that tenants go through with arranging appointments for ESAP services. GRID has observed that families are more likely to participate in the ESAP program once GRID's staff has reviewed how the program will work and reassure them of its benefits.

23. GRID does not think the Commission should establish interim capacity targets for the Program at the onset. Because the amount of available funding is variable each year, it would be difficult to accurately set attainable targets now without the certainty of funding, or the clear delineation of the program timeline. GRID does think 300MW should be a floor, rather than a ceiling for the Program's installed capacity, and that incentives should be structured in a way as to exceed the 300MW. Since the legislation requires the 300MW at minimum, it will be critical that the program administrator(s) ensure that the capacity goals are met. It would be appropriate for the program administrator(s) to include such interim goals in a Program implementation plan, but the inclusion of those benchmarks at this juncture seems premature and unnecessary.

24. The Commission has established a solid framework for program reporting, auditing, monitoring and evaluation with its existing low-income solar programs, SASH and MASH.

GRID thinks this framework can be used as a starting place for the Program and expanded upon to capture information unique to the Program.

For program monitoring and evaluation, GRID supports regular third-party program evaluations, such as those undertaken by the CPUC in 2011 and 2015 for the SASH and MASH programs. In evaluations for the Program, it will be important to gather information directly from participating tenants – this will help answer the question as to whether tenants are receiving the envisioned level of benefit (see question #11 and question #13). The Program evaluation should also consider the job training program, and conduct outreach with past job trainees to assess what percentage were able to parlay their trainee experience in the Program into full-time employment in the industry. The evaluation can also assess the production and performance of the solar electric systems incented by the Program similar to the analysis conducted in the SASH and MASH programs' evaluations.

Regular auditing of program administration such as what is conducted presently in SASH and MASH will ensure all program administration and incentive funds are applied appropriately. GRID also suggests reporting audited project costs as a way to increase the overall cost-effectiveness of the Program. Issues identified as a result of the audit or evaluation can be addressed by modifying the Program structure or requirements.

For data collection and reporting, GRID supports collecting similar information for the Program as is currently collected in MASH and at the interconnection point for IOU projects, with some modifications to increase information collected around project financing and job training, as this is of interest to the public and stakeholders. GRID supports reporting the data collected in this Program to Cal DG Stats so that it is publicly accessible.

25. Safety is paramount in any solar installation. GRID recommends the Program's installations and participants (including job trainees) be subject to and protected by all industry standards for quality and safety, such as those prescribed by the Occupational Health and Safety Administration (OHSA). GRID has not identified additional safety issues to consider in Program implementation aside from what is already in place with industry standard regulations and best practices.

26. GRID has no comment on this question at this time.

III. CONCLUSION

GRID Alternatives appreciates the opportunity to provide comments and hopes they are helpful to the Commission and stakeholders. GRID looks forward to continuing to collaborate with parties in developing AB 693's Program.

Respectfully submitted,

/s/ Cathleen Monahan

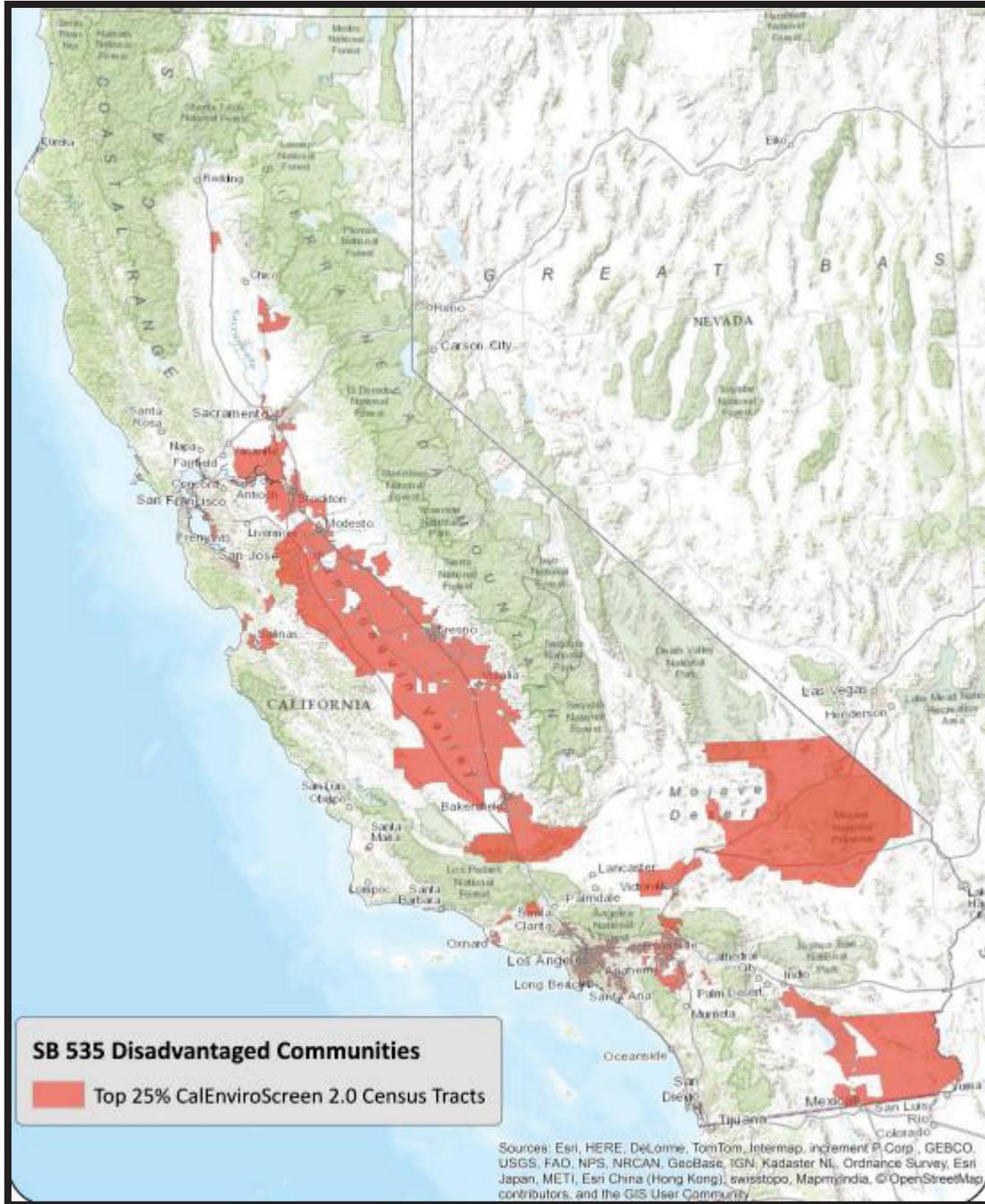
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August 3, 2016

Appendix A

Data Representing CalEnviroScreen Disadvantaged Communities Distribution Across
Investor Owned Utility Territories

Top 25% of impacted census tracts in California



	Total # of Residential Electric Meters*	Total # of Residential Customers in Top 25% CES DACs	% of Residential Customers in top 25% CES DACs
SCE	1,890,000	1,134,579	60.03%
SDGE	1,266,000	32,168	2.54%
PG&E	4,700,000	662,409	14.09%

*See following pages for data sources.

Top 25% of impacted census tracts in California – SCE territory only

Total # of Residential Electric Meters*	Total # of Residential Customers in Top 25% CES DACs**	% of SCE Residential Customers in top 25% CES DACs
1,890,000	1,134,579	60.03%

*Data pulled from SCE's 2015 Annual Report (pg 105)

**Data pulled from “Southern California Edison Company’s (U 338-E) Comments on Assembly Bill 693”, November 2, 2015, Appendix A

Census Tract	County	City	Residential Electric Meters
6037239202	Los Angeles	Los Angeles	713
6037239330	Los Angeles	Los Angeles	434
6037239501	Los Angeles	Los Angeles	521
6037239502	Los Angeles	Los Angeles	509
6037532700	Los Angeles	Los Angeles	451
6037532800	Los Angeles	Los Angeles	665
6037532900	Los Angeles	Los Angeles	1008
6037533001	Los Angeles	Los Angeles	683
6037533002	Los Angeles	Los Angeles	426
6037534900	Los Angeles	Los Angeles	991
6037535001	Los Angeles	Los Angeles	653
6037535002	Los Angeles	Los Angeles	556
6037535101	Los Angeles	Los Angeles	1103
6037535300	Los Angeles	Los Angeles	943
6037240700	Los Angeles	Los Angeles	440
6037242000	Los Angeles	Los Angeles	282
6037242100	Los Angeles	Los Angeles	194
6037242200	Los Angeles	Los Angeles	469
6037242300	Los Angeles	Los Angeles	328
6037243000	Los Angeles	Los Angeles	484
6037535102	Los Angeles	Los Angeles	323
6037535200	Los Angeles	Los Angeles	416
6037535400	Los Angeles	Los Angeles	250
6037236000	Los Angeles	Los Angeles	157
6037236100	Los Angeles	Los Angeles	201
6037530301	Los Angeles	Los Angeles	597
6037530302	Los Angeles	Los Angeles	1806
6037530500	Los Angeles	Los Angeles	1258
6037531502	Los Angeles	Los Angeles	901
6037531504	Los Angeles	Los Angeles	1216
6037531602	Los Angeles	Los Angeles	1238
6037531603	Los Angeles	Los Angeles	983

Top 25% of impacted census tracts in California – SCE territory only

6037531604	Los Angeles	Los Angeles	986
6037531701	Los Angeles	Los Angeles	1575
6037531702	Los Angeles	Los Angeles	1309
6037531800	Los Angeles	Los Angeles	1395
6037531901	Los Angeles	Los Angeles	1798
6037531902	Los Angeles	Los Angeles	1123
6037204920	Los Angeles	Los Angeles	400
6037531202	Los Angeles	Los Angeles	730
6037531301	Los Angeles	Los Angeles	862
6037531302	Los Angeles	Los Angeles	1032
6037532302	Los Angeles	Los Angeles	724
6037201402	Los Angeles	Los Angeles	12
6037201602	Los Angeles	Los Angeles	8
6037201700	Los Angeles	Los Angeles	14
6037532303	Los Angeles	Los Angeles	1683
6037532304	Los Angeles	Los Angeles	1504
6037234501	Los Angeles	Los Angeles	235
6037234902	Los Angeles	Los Angeles	345
6037235202	Los Angeles	Los Angeles	393
6037238200	Los Angeles	Los Angeles	632
6037240300	Los Angeles	Los Angeles	683
6037240401	Los Angeles	Los Angeles	646
6037240402	Los Angeles	Los Angeles	462
6037241201	Los Angeles	Los Angeles	348
6037241202	Los Angeles	Los Angeles	593
6037241300	Los Angeles	Los Angeles	277
6037291110	Los Angeles	Los Angeles	421
6037600100	Los Angeles	Los Angeles	798
6037600201	Los Angeles	Los Angeles	552
6037600303	Los Angeles	Los Angeles	439
6037600304	Los Angeles	Los Angeles	411
6037602801	Los Angeles	Los Angeles	458
6037602802	Los Angeles	Los Angeles	516
6037600302	Los Angeles	Los Angeles	579
6037600400	Los Angeles	Los Angeles	696
6037532400	Los Angeles	Los Angeles	1
6037241002	Los Angeles	Los Angeles	361
6037242600	Los Angeles	Los Angeles	442
6037242700	Los Angeles	Los Angeles	529
6037243100	Los Angeles	Los Angeles	536
6037540400	Los Angeles	Los Angeles	239
6037540600	Los Angeles	Los Angeles	428
6037540700	Los Angeles	Los Angeles	302
6037540800	Los Angeles	Los Angeles	505

Top 25% of impacted census tracts in California – SCE territory only

6037241001	Los Angeles	Los Angeles	649
6037241400	Los Angeles	Los Angeles	497
6037540901	Los Angeles	Los Angeles	756
6037540902	Los Angeles	Los Angeles	682
6037203900	Los Angeles	Los Angeles	482
6037530601	Los Angeles	Los Angeles	562
6037530602	Los Angeles	Los Angeles	260
6037530700	Los Angeles	Los Angeles	362
6037530801	Los Angeles	Los Angeles	1036
6037530802	Los Angeles	Los Angeles	601
6037530901	Los Angeles	Los Angeles	668
6037530902	Los Angeles	Los Angeles	681
6037531000	Los Angeles	Los Angeles	922
6037531101	Los Angeles	Los Angeles	834
6037531102	Los Angeles	Los Angeles	581
6037531201	Los Angeles	Los Angeles	874
6037531503	Los Angeles	Los Angeles	510
6037533601	Los Angeles	Bell	999
6037533602	Los Angeles	Bell	1208
6037533603	Los Angeles	Bell	1475
6037533803	Los Angeles	Bell	1406
6037533804	Los Angeles	Bell	1013
6037533805	Los Angeles	Bell	803
6037533806	Los Angeles	Bell	928
6037533901	Los Angeles	Bell	1352
6037533902	Los Angeles	Bell	903
6037534001	Los Angeles	Bell	1251
6037534002	Los Angeles	Bell	970
6037534101	Los Angeles	Bell	512
6037534102	Los Angeles	Bell	1396
6037534201	Los Angeles	Bell	989
6037534202	Los Angeles	Bell	1291
6037534203	Los Angeles	Bell	714
6037534301	Los Angeles	Bell	1033
6037534302	Los Angeles	Bell	819
6037534403	Los Angeles	Bell	657
6037534404	Los Angeles	Bell	813
6037534405	Los Angeles	Bell	957
6037534406	Los Angeles	Bell	1027
6037541100	Los Angeles	Compton	809
6037542502	Los Angeles	Compton	1043
6037542602	Los Angeles	Compton	1338
6037542700	Los Angeles	Compton	1393
6037542800	Los Angeles	Compton	760

Top 25% of impacted census tracts in California – SCE territory only

6037542900	Los Angeles	Compton	800
6037543000	Los Angeles	Compton	1058
6037543100	Los Angeles	Compton	1646
6037543201	Los Angeles	Compton	878
6037543202	Los Angeles	Compton	1185
6037543305	Los Angeles	Compton	649
6037541604	Los Angeles	Compton	1348
6037541605	Los Angeles	Compton	1156
6037541606	Los Angeles	Compton	544
6037542000	Los Angeles	Compton	1245
6037542103	Los Angeles	Compton	894
6037542104	Los Angeles	Compton	765
6037542105	Los Angeles	Compton	1129
6037542106	Los Angeles	Compton	733
6037542200	Los Angeles	Compton	1512
6037542401	Los Angeles	Compton	1067
6037542402	Los Angeles	Compton	685
6037541200	Los Angeles	Compton	1305
6037541300	Los Angeles	Compton	1393
6037541400	Los Angeles	Compton	1686
6037541500	Los Angeles	Compton	1345
6037541603	Los Angeles	Compton	688
6037542601	Los Angeles	Compton	695
6037275603	Los Angeles	Culver City	1333
6037550500	Los Angeles	Downey	2407
6037550700	Los Angeles	Downey	2133
6037550800	Los Angeles	Downey	2509
6037551000	Los Angeles	Downey	2519
6037551300	Los Angeles	Downey	1897
6037551401	Los Angeles	Downey	1501
6037551101	Los Angeles	Downey	966
6037551102	Los Angeles	Downey	1354
6037551700	Los Angeles	Downey	1611
6037551800	Los Angeles	Downey	1854
6037553400	Los Angeles	Downey	950
6037291210	Los Angeles	Gardena	1463
6037291220	Los Angeles	Gardena	988
6037603001	Los Angeles	Gardena	2103
6037603005	Los Angeles	Gardena	1647
6037603102	Los Angeles	Gardena	1203
6037603302	Los Angeles	Gardena	1121
6037291120	Los Angeles	Gardena	259
6037291130	Los Angeles	Gardena	419
6037291300	Los Angeles	Gardena	305

Top 25% of impacted census tracts in California – SCE territory only

6037541001	Los Angeles	Gardena	136
6037603200	Los Angeles	Gardena	325
6037602600	Los Angeles	Gardena	2663
6037602900	Los Angeles	Gardena	1491
6037603400	Los Angeles	Gardena	1470
6037603500	Los Angeles	Gardena	1035
6037602002	Los Angeles	Hawthorne	872
6037602103	Los Angeles	Hawthorne	1909
6037602104	Los Angeles	Hawthorne	1478
6037602105	Los Angeles	Hawthorne	1166
6037602200	Los Angeles	Hawthorne	1996
6037602508	Los Angeles	Hawthorne	1917
6037602509	Los Angeles	Hawthorne	1124
6037602700	Los Angeles	Hawthorne	831
6037603704	Los Angeles	Hawthorne	1733
6037532500	Los Angeles	Huntington Park	955
6037532603	Los Angeles	Huntington Park	777
6037532604	Los Angeles	Huntington Park	657
6037532605	Los Angeles	Huntington Park	870
6037532606	Los Angeles	Huntington Park	1003
6037533103	Los Angeles	Huntington Park	838
6037533104	Los Angeles	Huntington Park	1020
6037533105	Los Angeles	Huntington Park	604
6037533106	Los Angeles	Huntington Park	408
6037533107	Los Angeles	Huntington Park	854
6037533201	Los Angeles	Huntington Park	657
6037533202	Los Angeles	Huntington Park	647
6037533203	Los Angeles	Huntington Park	428
6037533501	Los Angeles	Huntington Park	724
6037533502	Los Angeles	Huntington Park	502
6037534501	Los Angeles	Huntington Park	1218
6037534502	Los Angeles	Huntington Park	997
6037534700	Los Angeles	Huntington Park	1003
6037534802	Los Angeles	Huntington Park	673
6037534803	Los Angeles	Huntington Park	1155
6037534804	Los Angeles	Huntington Park	908
6037603801	Los Angeles	Lawndale	1342
6037603802	Los Angeles	Lawndale	1243
6037603900	Los Angeles	Lawndale	2253
6037604001	Los Angeles	Lawndale	1338
6037604100	Los Angeles	Lawndale	2112
6037540000	Los Angeles	Lynwood	1471
6037540101	Los Angeles	Lynwood	1368
6037540102	Los Angeles	Lynwood	1471

Top 25% of impacted census tracts in California – SCE territory only

6037540202	Los Angeles	Lynwood	1444
6037540203	Los Angeles	Lynwood	1180
6037540300	Los Angeles	Lynwood	1111
6037540501	Los Angeles	Lynwood	1465
6037540502	Los Angeles	Lynwood	1382
6037541700	Los Angeles	Lynwood	1343
6037541801	Los Angeles	Lynwood	1034
6037541802	Los Angeles	Lynwood	1146
6037533300	Los Angeles	Maywood	792
6037533401	Los Angeles	Maywood	1114
6037533402	Los Angeles	Maywood	914
6037533403	Los Angeles	Maywood	662
6037533701	Los Angeles	Maywood	876
6037533702	Los Angeles	Maywood	798
6037533703	Los Angeles	Maywood	943
6037535501	Los Angeles	South Gate	913
6037535503	Los Angeles	South Gate	590
6037535603	Los Angeles	South Gate	825
6037535604	Los Angeles	South Gate	1047
6037535605	Los Angeles	South Gate	981
6037535606	Los Angeles	South Gate	439
6037535607	Los Angeles	South Gate	1128
6037535701	Los Angeles	South Gate	1429
6037535702	Los Angeles	South Gate	1304
6037535803	Los Angeles	South Gate	1053
6037535901	Los Angeles	South Gate	1359
6037535902	Los Angeles	South Gate	1539
6037536000	Los Angeles	South Gate	878
6037536102	Los Angeles	South Gate	747
6037536103	Los Angeles	South Gate	1303
6037536104	Los Angeles	South Gate	957
6037536200	Los Angeles	South Gate	1721
6037601100	Los Angeles	Inglewood	2064
6037601211	Los Angeles	Inglewood	892
6037601401	Los Angeles	Inglewood	1480
6037600902	Los Angeles	Inglewood	2447
6037601302	Los Angeles	Inglewood	2537
6037602003	Los Angeles	Inglewood	1472
6037602004	Los Angeles	Inglewood	1185
6037601501	Los Angeles	Inglewood	825
6037601502	Los Angeles	Inglewood	840
6037601600	Los Angeles	Inglewood	927
6037601700	Los Angeles	Inglewood	1197
6037601801	Los Angeles	Inglewood	803

Top 25% of impacted census tracts in California – SCE territory only

6037292000	Los Angeles	Torrance	1279
6037293202	Los Angeles	Torrance	1317
6037543502	Los Angeles	Torrance	1439
6037543503	Los Angeles	Torrance	1795
6037543602	Los Angeles	Torrance	2450
6037650101	Los Angeles	Torrance	1979
6037650200	Los Angeles	Torrance	1963
6037408303	Los Angeles	Whittier	1057
6037501400	Los Angeles	Whittier	1044
6037501504	Los Angeles	Whittier	943
6037501803	Los Angeles	Whittier	2130
6037502003	Los Angeles	Whittier	1219
6037502004	Los Angeles	Whittier	1973
6037503105	Los Angeles	Whittier	1011
6037503202	Los Angeles	Whittier	1241
6037502901	Los Angeles	Whittier	1554
6037503000	Los Angeles	Whittier	1739
6037503104	Los Angeles	Whittier	781
6037501001	Los Angeles	Whittier	961
6037502100	Los Angeles	Whittier	1512
6037502200	Los Angeles	Whittier	1949
6037502301	Los Angeles	Whittier	1616
6037502302	Los Angeles	Whittier	888
6059110302	Orange	Buena Park	1501
6059110500	Orange	Buena Park	2148
6059110603	Orange	Buena Park	3523
6059110606	Orange	Buena Park	1893
6059001202	Orange	La Habra	1262
6059001304	Orange	La Habra	1338
6059001404	Orange	La Habra	1398
6037503902	Los Angeles	La Mirada	1401
6037504101	Los Angeles	La Mirada	1549
6037530003	Los Angeles	Montebello	872
6037530004	Los Angeles	Montebello	1080
6037530005	Los Angeles	Montebello	1270
6037530006	Los Angeles	Montebello	1158
6037530101	Los Angeles	Montebello	1579
6037530102	Los Angeles	Montebello	1496
6037530202	Los Angeles	Montebello	1188
6037530203	Los Angeles	Montebello	947
6037530204	Los Angeles	Montebello	1076
6037532001	Los Angeles	Montebello	998
6037532002	Los Angeles	Montebello	921
6037532101	Los Angeles	Montebello	1948

Top 25% of impacted census tracts in California – SCE territory only

6037532200	Los Angeles	Montebello	1998
6037550100	Los Angeles	Norwalk	1857
6037550201	Los Angeles	Norwalk	727
6037550300	Los Angeles	Norwalk	1909
6037551900	Los Angeles	Norwalk	1320
6037552100	Los Angeles	Norwalk	1455
6037552200	Los Angeles	Norwalk	1689
6037552301	Los Angeles	Norwalk	1211
6037552302	Los Angeles	Norwalk	901
6037552400	Los Angeles	Norwalk	690
6037552602	Los Angeles	Norwalk	1035
6037554600	Los Angeles	Norwalk	1081
6037500402	Los Angeles	Pico Rivera	1215
6037500403	Los Angeles	Pico Rivera	996
6037500404	Los Angeles	Pico Rivera	1187
6037500500	Los Angeles	Pico Rivera	730
6037500600	Los Angeles	Pico Rivera	1408
6037500700	Los Angeles	Pico Rivera	1608
6037500900	Los Angeles	Pico Rivera	1416
6037502401	Los Angeles	Pico Rivera	1175
6037502500	Los Angeles	Pico Rivera	1043
6037502601	Los Angeles	Pico Rivera	1769
6037502602	Los Angeles	Pico Rivera	1070
6037502700	Los Angeles	Santa Fe Springs	1837
6037502801	Los Angeles	Santa Fe Springs	1634
6037502802	Los Angeles	Santa Fe Springs	364
6037502902	Los Angeles	Santa Fe Springs	1068
6059087801	Orange	Stanton	1314
6059087802	Orange	Stanton	1759
6059087803	Orange	Stanton	1393
6059087902	Orange	Stanton	1486
6059088104	Orange	Stanton	1176
6037554801	Los Angeles	Artesia	872
6037554521	Los Angeles	Cerritos	1835
6037553200	Los Angeles	Bellflower	2052
6037554002	Los Angeles	Bellflower	1646
6037554101	Los Angeles	Bellflower	1105
6037554105	Los Angeles	Bellflower	1329
6037554204	Los Angeles	Bellflower	1277
6037554301	Los Angeles	Bellflower	1034
6037554302	Los Angeles	Bellflower	1139
6037554403	Los Angeles	Bellflower	1595
6037554405	Los Angeles	Bellflower	884
6037555102	Los Angeles	Lakewood	1641

Top 25% of impacted census tracts in California – SCE territory only

6037555211	Los Angeles	Hawaiian Gardens	1735
6037553502	Los Angeles	Paramount	972
6037553503	Los Angeles	Paramount	643
6037553504	Los Angeles	Paramount	1248
6037553601	Los Angeles	Paramount	1104
6037553602	Los Angeles	Paramount	1099
6037553701	Los Angeles	Paramount	971
6037553702	Los Angeles	Paramount	1139
6037553801	Los Angeles	Paramount	970
6037553802	Los Angeles	Paramount	1474
6037553901	Los Angeles	Paramount	1603
6037553902	Los Angeles	Paramount	1350
6037980015	Los Angeles	San Pedro	42
6037980031	Los Angeles	San Pedro	96
6037543306	Los Angeles	Carson	1784
6037543501	Los Angeles	Carson	1683
6037543604	Los Angeles	Carson	1390
6037543801	Los Angeles	Carson	1301
6037543802	Los Angeles	Carson	1762
6037543903	Los Angeles	Carson	941
6037543905	Los Angeles	Carson	1115
6037541002	Los Angeles	Carson	1344
6037543322	Los Angeles	Carson	2768
6037543400	Los Angeles	Carson	1713
6037573401	Los Angeles	Signal Hill	573
6037575901	Los Angeles	Long Beach	1641
6037575101	Los Angeles	Long Beach	1760
6037575102	Los Angeles	Long Beach	1670
6037570202	Los Angeles	Long Beach	1722
6037570203	Los Angeles	Long Beach	1066
6037570204	Los Angeles	Long Beach	1109
6037570301	Los Angeles	Long Beach	1967
6037570303	Los Angeles	Long Beach	1140
6037570304	Los Angeles	Long Beach	1388
6037570402	Los Angeles	Long Beach	938
6037570403	Los Angeles	Long Beach	1231
6037570404	Los Angeles	Long Beach	940
6037570501	Los Angeles	Long Beach	1991
6037570502	Los Angeles	Long Beach	1776
6037570601	Los Angeles	Long Beach	1455
6037570602	Los Angeles	Long Beach	1706
6037570603	Los Angeles	Long Beach	1190
6037571600	Los Angeles	Long Beach	547
6037571701	Los Angeles	Long Beach	1705

Top 25% of impacted census tracts in California – SCE territory only

6037571703	Los Angeles	Long Beach	984
6037572100	Los Angeles	Long Beach	293
6037572201	Los Angeles	Long Beach	1740
6037573002	Los Angeles	Long Beach	1121
6037573003	Los Angeles	Long Beach	506
6037573004	Los Angeles	Long Beach	1447
6037573201	Los Angeles	Long Beach	1385
6037573202	Los Angeles	Long Beach	1750
6037573300	Los Angeles	Long Beach	1214
6037544001	Los Angeles	Long Beach	1161
6037572301	Los Angeles	Long Beach	929
6037572302	Los Angeles	Long Beach	844
6037572500	Los Angeles	Long Beach	816
6037572600	Los Angeles	Long Beach	1302
6037572700	Los Angeles	Long Beach	1333
6037572800	Los Angeles	Long Beach	203
6037572900	Los Angeles	Long Beach	1273
6037575201	Los Angeles	Long Beach	1357
6037575202	Los Angeles	Long Beach	1429
6037575300	Los Angeles	Long Beach	1438
6037575401	Los Angeles	Long Beach	1499
6037575402	Los Angeles	Long Beach	1182
6037575801	Los Angeles	Long Beach	711
6037575802	Los Angeles	Long Beach	1502
6037575803	Los Angeles	Long Beach	825
6037576401	Los Angeles	Long Beach	1389
6037576402	Los Angeles	Long Beach	1506
6037576403	Los Angeles	Long Beach	1463
6037461000	Los Angeles	Altadena	2166
6037431400	Los Angeles	Arcadia	1273
6037430101	Los Angeles	Duarte	1305
6037430102	Los Angeles	Duarte	1284
6037431200	Los Angeles	Duarte	1719
6037460401	Los Angeles	La Canada Flintridge	299
6037431100	Los Angeles	Monrovia	2307
6037104201	Los Angeles	San Fernando	701
6037106114	Los Angeles	San Fernando	862
6037109500	Los Angeles	San Fernando	631
6037320201	Los Angeles	San Fernando	551
6037320202	Los Angeles	San Fernando	850
6037320300	Los Angeles	San Fernando	1019
6037104204	Los Angeles	Sylmar	29
6037106648	Los Angeles	Sylmar	33
6037404201	Los Angeles	Azusa	266

Top 25% of impacted census tracts in California – SCE territory only

6037404202	Los Angeles	Azusa	242
6037404302	Los Angeles	Azusa	179
6037404402	Los Angeles	Azusa	367
6037404501	Los Angeles	Azusa	169
6037404503	Los Angeles	Azusa	214
6037404504	Los Angeles	Azusa	378
6037404600	Los Angeles	Baldwin Park	324
6037404701	Los Angeles	Baldwin Park	1336
6037404702	Los Angeles	Baldwin Park	1338
6037404703	Los Angeles	Baldwin Park	723
6037404801	Los Angeles	Baldwin Park	1662
6037404802	Los Angeles	Baldwin Park	986
6037404803	Los Angeles	Baldwin Park	396
6037404901	Los Angeles	Baldwin Park	1288
6037404902	Los Angeles	Baldwin Park	904
6037404903	Los Angeles	Baldwin Park	661
6037405001	Los Angeles	Baldwin Park	1404
6037405002	Los Angeles	Baldwin Park	728
6037405101	Los Angeles	Baldwin Park	1207
6037405102	Los Angeles	Baldwin Park	1153
6037405201	Los Angeles	Baldwin Park	1184
6037405202	Los Angeles	Baldwin Park	1189
6037405203	Los Angeles	Baldwin Park	793
6071001903	San Bernardino	Chino	1147
6071000404	San Bernardino	Chino	1361
6071000603	San Bernardino	Chino	1718
6071000604	San Bernardino	Chino	1750
6071000605	San Bernardino	Chino	1625
6037402001	Los Angeles	Claremont	966
6037402002	Los Angeles	Claremont	1227
6037405301	Los Angeles	Covina	874
6037406200	Los Angeles	Covina	2515
6071002101	San Bernardino	Rancho Cucamonga	1544
6071002103	San Bernardino	Rancho Cucamonga	1630
6071002105	San Bernardino	Rancho Cucamonga	1767
6071002107	San Bernardino	Rancho Cucamonga	1744
6071002110	San Bernardino	Rancho Cucamonga	2463
6037432300	Los Angeles	El Monte	777
6037432401	Los Angeles	El Monte	745
6037432402	Los Angeles	El Monte	1241
6037432700	Los Angeles	El Monte	1035
6037432801	Los Angeles	El Monte	505
6037432802	Los Angeles	El Monte	1145
6037433101	Los Angeles	El Monte	449

Top 25% of impacted census tracts in California – SCE territory only

6037433200	Los Angeles	El Monte	1212
6037432500	Los Angeles	El Monte	1942
6037432601	Los Angeles	El Monte	1553
6037432602	Los Angeles	El Monte	1077
6037433302	Los Angeles	El Monte	377
6037433304	Los Angeles	El Monte	1118
6037433305	Los Angeles	El Monte	1157
6037433306	Los Angeles	El Monte	788
6037433307	Los Angeles	El Monte	809
6037433403	Los Angeles	El Monte	1106
6037433901	Los Angeles	El Monte	1323
6037433902	Los Angeles	El Monte	894
6037434001	Los Angeles	El Monte	1040
6037434003	Los Angeles	El Monte	1011
6037433102	Los Angeles	South El Monte	1260
6037433401	Los Angeles	South El Monte	835
6037433402	Los Angeles	South El Monte	1183
6037433501	Los Angeles	South El Monte	484
6037433503	Los Angeles	South El Monte	770
6037433504	Los Angeles	South El Monte	1159
6037433700	Los Angeles	South El Monte	816
6037433801	Los Angeles	South El Monte	1535
6037433802	Los Angeles	South El Monte	689
6037434004	Los Angeles	South El Monte	693
6071002207	San Bernardino	Rancho Cucamonga	1178
6037407200	Los Angeles	La Puente	1618
6037407302	Los Angeles	La Puente	774
6037407501	Los Angeles	La Puente	976
6037407601	Los Angeles	La Puente	966
6037407602	Los Angeles	La Puente	886
6037407701	Los Angeles	La Puente	1195
6037407801	Los Angeles	La Puente	1122
6037407802	Los Angeles	La Puente	804
6037408138	Los Angeles	La Puente	1313
6037408140	Los Angeles	La Puente	848
6037408141	Los Angeles	La Puente	1205
6037408202	Los Angeles	Hacienda Heights	583
6037408401	Los Angeles	Hacienda Heights	1228
6037408501	Los Angeles	Hacienda Heights	949
6037408623	Los Angeles	Hacienda Heights	866
6037408630	Los Angeles	Hacienda Heights	664
6037408631	Los Angeles	Hacienda Heights	1457
6037406901	Los Angeles	La Puente	812
6037407001	Los Angeles	La Puente	1020

Top 25% of impacted census tracts in California – SCE territory only

6037407002	Los Angeles	La Puente	657
6037407101	Los Angeles	La Puente	835
6037407102	Los Angeles	La Puente	941
6037408301	Los Angeles	La Puente	938
6037408302	Los Angeles	La Puente	697
6065040503	Riverside	Mira Loma	835
6065040603	Riverside	Mira Loma	512
6065040605	Riverside	Mira Loma	763
6065040606	Riverside	Mira Loma	717
6037481713	Los Angeles	Monterey Park	886
6037481714	Los Angeles	Monterey Park	901
6037482001	Los Angeles	Monterey Park	975
6037482101	Los Angeles	Monterey Park	1614
6037482701	Los Angeles	Monterey Park	1518
6037482702	Los Angeles	Monterey Park	847
6037530400	Los Angeles	Monterey Park	1301
6037481711	Los Angeles	Monterey Park	1327
6037481712	Los Angeles	Monterey Park	1531
6037482201	Los Angeles	Monterey Park	1117
6037482600	Los Angeles	Monterey Park	2012
6037482800	Los Angeles	Monterey Park	1194
6071001600	San Bernardino	Ontario	1395
6071001803	San Bernardino	Ontario	679
6071001808	San Bernardino	Ontario	1004
6071001809	San Bernardino	Ontario	1018
6071001810	San Bernardino	Ontario	1023
6071001812	San Bernardino	Ontario	983
6071001813	San Bernardino	Ontario	1041
6071001001	San Bernardino	Ontario	1664
6071001002	San Bernardino	Ontario	1844
6071001101	San Bernardino	Ontario	1364
6071001103	San Bernardino	Ontario	1333
6071001104	San Bernardino	Ontario	1686
6071001400	San Bernardino	Ontario	974
6071001702	San Bernardino	Ontario	1609
6071001704	San Bernardino	Ontario	1686
6071001706	San Bernardino	Ontario	2077
6071001707	San Bernardino	Ontario	1989
6071000201	San Bernardino	Montclair	899
6071000203	San Bernardino	Montclair	959
6071000205	San Bernardino	Montclair	1015
6071000207	San Bernardino	Montclair	994
6071000208	San Bernardino	Montclair	884
6071000301	San Bernardino	Montclair	1885

Top 25% of impacted census tracts in California – SCE territory only

6071000303	San Bernardino	Montclair	1537
6071000304	San Bernardino	Montclair	1259
6071001305	San Bernardino	Ontario	1468
6071001307	San Bernardino	Ontario	1143
6071001308	San Bernardino	Ontario	1400
6071001309	San Bernardino	Ontario	1316
6071001310	San Bernardino	Ontario	1596
6071001312	San Bernardino	Ontario	1275
6071001501	San Bernardino	Ontario	1112
6071001503	San Bernardino	Ontario	1152
6071001504	San Bernardino	Ontario	1558
6037402402	Los Angeles	Pomona	1798
6037402501	Los Angeles	Pomona	1417
6037402502	Los Angeles	Pomona	1836
6037402801	Los Angeles	Pomona	1313
6037402803	Los Angeles	Pomona	873
6037402804	Los Angeles	Pomona	1038
6037402902	Los Angeles	Pomona	1637
6037402903	Los Angeles	Pomona	1051
6037402904	Los Angeles	Pomona	915
6037403000	Los Angeles	Pomona	1736
6037408800	Los Angeles	Pomona	950
6037401704	Los Angeles	Pomona	1739
6037402101	Los Angeles	Pomona	1380
6037402102	Los Angeles	Pomona	1437
6037402600	Los Angeles	Pomona	2224
6037402702	Los Angeles	Pomona	1884
6037402703	Los Angeles	Pomona	1398
6037402705	Los Angeles	Pomona	993
6037402706	Los Angeles	Pomona	1177
6037402200	Los Angeles	Pomona	1496
6037402301	Los Angeles	Pomona	1239
6037402303	Los Angeles	Pomona	908
6037402304	Los Angeles	Pomona	874
6037402403	Los Angeles	Pomona	1222
6037402405	Los Angeles	Pomona	683
6037402406	Los Angeles	Pomona	1085
6037403200	Los Angeles	Pomona	89
6037432201	Los Angeles	Rosemead	1143
6037432202	Los Angeles	Rosemead	1119
6037432901	Los Angeles	Rosemead	1175
6037432902	Los Angeles	Rosemead	917
6037433601	Los Angeles	Rosemead	1296
6037433602	Los Angeles	Rosemead	738

Top 25% of impacted census tracts in California – SCE territory only

6037481300	Los Angeles	Rosemead	830
6037482303	Los Angeles	Rosemead	1532
6037482304	Los Angeles	Rosemead	936
6037482401	Los Angeles	Rosemead	990
6037482402	Los Angeles	Rosemead	1835
6037482502	Los Angeles	Rosemead	888
6037482503	Los Angeles	Rosemead	1147
6037482521	Los Angeles	Rosemead	1515
6037481103	Los Angeles	San Gabriel	1652
6037481202	Los Angeles	San Gabriel	2040
6037481401	Los Angeles	San Gabriel	1871
6037482301	Los Angeles	San Gabriel	1594
6037432102	Los Angeles	Temple City	1919
6037481201	Los Angeles	Temple City	1226
6071000821	San Bernardino	Upland	1279
6071000824	San Bernardino	Upland	1872
6071000825	San Bernardino	Upland	1436
6071000826	San Bernardino	Upland	1498
6071000901	San Bernardino	Upland	1692
6071000903	San Bernardino	Upland	1595
6071000904	San Bernardino	Upland	1194
6037405302	Los Angeles	West Covina	1685
6037405500	Los Angeles	West Covina	2144
6037406702	Los Angeles	West Covina	1834
6037406800	Los Angeles	West Covina	1552
6037407400	Los Angeles	West Covina	672
6037408006	Los Angeles	West Covina	957
6037408133	Los Angeles	West Covina	1421
6037408137	Los Angeles	West Covina	1028
6037481001	Los Angeles	Alhambra	1489
6037481002	Los Angeles	Alhambra	2111
6037481500	Los Angeles	Alhambra	1690
6037481604	Los Angeles	Alhambra	1528
6037481605	Los Angeles	Alhambra	1313
6037480903	Los Angeles	Alhambra	991
6037481606	Los Angeles	Alhambra	1506
6037481901	Los Angeles	Alhambra	1784
6037481902	Los Angeles	Alhambra	1037
6065044000	Riverside	Beaumont	918
6065046200	Riverside	Blythe	1488
6071009116	San Bernardino	Adelanto	1780
6071009117	San Bernardino	Adelanto	2190
6071011700	San Bernardino	Apple Valley	642
6071010300	San Bernardino	Baker	183

Top 25% of impacted census tracts in California – SCE territory only

6071009400	San Bernardino	Barstow	1287
6071009500	San Bernardino	Barstow	2613
6071012002	San Bernardino	Barstow	1977
6071007107	San Bernardino	Grand Terrace	819
6071007109	San Bernardino	Grand Terrace	1504
6071003302	San Bernardino	Bloomington	943
6071003403	San Bernardino	Bloomington	707
6071003605	San Bernardino	Bloomington	660
6071003606	San Bernardino	Bloomington	798
6071003609	San Bernardino	Bloomington	761
6071004001	San Bernardino	Bloomington	744
6071004003	San Bernardino	Bloomington	965
6071003612	San Bernardino	Colton	98
6071004004	San Bernardino	Colton	116
6071006601	San Bernardino	Colton	105
6071006604	San Bernardino	Colton	98
6071006700	San Bernardino	Colton	103
6071007000	San Bernardino	Colton	181
6071012500	San Bernardino	Colton	98
6071002204	San Bernardino	Fontana	1425
6071002401	San Bernardino	Fontana	2076
6071002402	San Bernardino	Fontana	1957
6071002501	San Bernardino	Fontana	1355
6071002502	San Bernardino	Fontana	1869
6071002803	San Bernardino	Fontana	924
6071002804	San Bernardino	Fontana	1257
6071002901	San Bernardino	Fontana	1032
6071002902	San Bernardino	Fontana	1528
6071003000	San Bernardino	Fontana	724
6071003101	San Bernardino	Fontana	1170
6071003102	San Bernardino	Fontana	1269
6071003200	San Bernardino	Fontana	1858
6071003301	San Bernardino	Fontana	1124
6071003401	San Bernardino	Fontana	1741
6071003405	San Bernardino	Fontana	1186
6071002037	San Bernardino	Fontana	2535
6071002301	San Bernardino	Fontana	3184
6071002801	San Bernardino	Fontana	1804
6071002601	San Bernardino	Fontana	2592
6071002602	San Bernardino	Fontana	1834
6071002604	San Bernardino	Fontana	1374
6071002607	San Bernardino	Fontana	1878
6071007410	San Bernardino	Highland	2349
6071007603	San Bernardino	Highland	1960

Top 25% of impacted census tracts in California – SCE territory only

6071007303	San Bernardino	Loma Linda	2476
6071007305	San Bernardino	Loma Linda	2082
6071007604	San Bernardino	Redlands	1018
6071008001	San Bernardino	Redlands	1539
6071008002	San Bernardino	Redlands	1715
6071003404	San Bernardino	Rialto	1359
6071003503	San Bernardino	Rialto	1509
6071003505	San Bernardino	Rialto	1640
6071003506	San Bernardino	Rialto	1320
6071003507	San Bernardino	Rialto	1343
6071003509	San Bernardino	Rialto	1327
6071003510	San Bernardino	Rialto	1240
6071003607	San Bernardino	Rialto	1476
6071003700	San Bernardino	Rialto	1073
6071003803	San Bernardino	Rialto	1301
6071003804	San Bernardino	Rialto	1258
6071003900	San Bernardino	Rialto	1507
6071004401	San Bernardino	Rialto	1205
6071002704	San Bernardino	Rialto	2619
6071002705	San Bernardino	Rialto	1338
6071009800	San Bernardino	Victorville	1416
6071009912	San Bernardino	Victorville	1344
6071009913	San Bernardino	Victorville	1712
6071010025	San Bernardino	Victorville	2089
6071005701	San Bernardino	San Bernardino	551
6071005200	San Bernardino	San Bernardino	1203
6071006100	San Bernardino	San Bernardino	2425
6071006201	San Bernardino	San Bernardino	1041
6071006203	San Bernardino	San Bernardino	1386
6071006204	San Bernardino	San Bernardino	1306
6071006301	San Bernardino	San Bernardino	1547
6071006302	San Bernardino	San Bernardino	2561
6071007407	San Bernardino	San Bernardino	854
6071007408	San Bernardino	San Bernardino	1215
6071004604	San Bernardino	San Bernardino	1805
6071005300	San Bernardino	San Bernardino	1923
6071005400	San Bernardino	San Bernardino	2298
6071005500	San Bernardino	San Bernardino	3005
6071002706	San Bernardino	San Bernardino	1347
6071004101	San Bernardino	San Bernardino	1154
6071004103	San Bernardino	San Bernardino	1141
6071004104	San Bernardino	San Bernardino	1064
6071010802	San Bernardino	San Bernardino	1081
6071007200	San Bernardino	San Bernardino	2354

Top 25% of impacted census tracts in California – SCE territory only

6071012400	San Bernardino	San Bernardino	1253
6071004301	San Bernardino	San Bernardino	989
6071004403	San Bernardino	San Bernardino	1194
6071004404	San Bernardino	San Bernardino	1178
6071004900	San Bernardino	San Bernardino	1605
6071005600	San Bernardino	San Bernardino	1502
6071005800	San Bernardino	San Bernardino	842
6071006401	San Bernardino	San Bernardino	707
6071006402	San Bernardino	San Bernardino	1047
6071006500	San Bernardino	San Bernardino	1774
6071007601	San Bernardino	San Bernardino	1539
6071004201	San Bernardino	San Bernardino	1736
6071004202	San Bernardino	San Bernardino	1311
6071004302	San Bernardino	San Bernardino	1118
6071004700	San Bernardino	San Bernardino	1467
6071004800	San Bernardino	San Bernardino	831
6065030104	Riverside	Riverside	325
6065030200	Riverside	Riverside	218
6065041403	Riverside	Riverside	452
6065041409	Riverside	Riverside	2436
6065041412	Riverside	Riverside	722
6065030800	Riverside	Riverside	897
6065030900	Riverside	Riverside	425
6065031701	Riverside	Riverside	378
6065040902	Riverside	Riverside	3
6065041004	Riverside	Riverside	3
6065042209	Riverside	Riverside	231
6065042300	Riverside	Riverside	343
6065042009	Riverside	Riverside	366
6065040101	Riverside	Riverside	1048
6065040102	Riverside	Riverside	1131
6065040201	Riverside	Riverside	1441
6065040203	Riverside	Riverside	886
6065040204	Riverside	Riverside	908
6065040301	Riverside	Riverside	1920
6065040303	Riverside	Riverside	792
6065040402	Riverside	Riverside	1032
6065040403	Riverside	Riverside	1418
6065040404	Riverside	Riverside	809
6065040501	Riverside	Riverside	1681
6065040502	Riverside	Riverside	1516
6065046700	Riverside	March Air Reserve Base	503
6065043005	Riverside	Lake Elsinore	1478
6065043006	Riverside	Lake Elsinore	1377

Top 25% of impacted census tracts in California – SCE territory only

6065043401	Riverside	Hemet	2116
6065043405	Riverside	Hemet	1541
6065043507	Riverside	Hemet	2449
6065042507	Riverside	Moreno Valley	1122
6065042508	Riverside	Moreno Valley	1095
6065048800	Riverside	Moreno Valley	1011
6065042505	Riverside	Moreno Valley	1048
6065042506	Riverside	Moreno Valley	2732
6065042510	Riverside	Moreno Valley	1454
6065042511	Riverside	Moreno Valley	953
6065042512	Riverside	Moreno Valley	922
6065042513	Riverside	Moreno Valley	974
6065042514	Riverside	Moreno Valley	912
6065042515	Riverside	Moreno Valley	1096
6065042516	Riverside	Moreno Valley	1204
6065042519	Riverside	Moreno Valley	492
6065042404	Riverside	Moreno Valley	600
6065042405	Riverside	Moreno Valley	1472
6065042007	Riverside	Perris	1268
6065042010	Riverside	Perris	1721
6065042800	Riverside	Perris	2707
6065042901	Riverside	Perris	2159
6065042902	Riverside	Perris	1441
6065042903	Riverside	Perris	1677
6065042904	Riverside	Perris	2734
6065042620	Riverside	Perris	2495
6065043517	Riverside	San Jacinto	2245
6059099402	Orange	Huntington Beach	2832
6059099701	Orange	Midway City	987
6059099601	Orange	Westminster	1938
6059099801	Orange	Westminster	1606
6059099802	Orange	Westminster	1412
6059099803	Orange	Westminster	1591
6059099903	Orange	Westminster	1588
6059099904	Orange	Westminster	1754
6059074405	Orange	Santa Ana	1475
6059074501	Orange	Santa Ana	1743
6059074602	Orange	Santa Ana	2320
6059075002	Orange	Santa Ana	2180
6059075004	Orange	Santa Ana	1329
6059074806	Orange	Santa Ana	849
6059074901	Orange	Santa Ana	1540
6059075201	Orange	Santa Ana	978
6059075202	Orange	Santa Ana	966

Top 25% of impacted census tracts in California – SCE territory only

6059089001	Orange	Santa Ana	1201
6059089004	Orange	Santa Ana	1177
6059074108	Orange	Santa Ana	999
6059074802	Orange	Santa Ana	1117
6059074403	Orange	Santa Ana	1369
6059074407	Orange	Santa Ana	1612
6059074003	Orange	Santa Ana	635
6059074300	Orange	Santa Ana	888
6059074502	Orange	Santa Ana	1148
6059075515	Orange	Tustin	4832
6059086601	Orange	Anaheim	18
6059086701	Orange	Anaheim	17
6059086802	Orange	Anaheim	11
6059086803	Orange	Anaheim	14
6059087504	Orange	Anaheim	9
6059087103	Orange	Anaheim	563
6059087805	Orange	Anaheim	462
6059087806	Orange	Anaheim	379
6059011403	Orange	Fullerton	1641
6059011502	Orange	Fullerton	1209
6059011602	Orange	Fullerton	1544
6059011601	Orange	Fullerton	3070
6059001801	Orange	Fullerton	1474
6059001802	Orange	Fullerton	1902
6059001903	Orange	Fullerton	909
6059076103	Orange	Garden Grove	2439
6059088101	Orange	Garden Grove	502
6059088106	Orange	Garden Grove	1121
6059088501	Orange	Garden Grove	1390
6059089003	Orange	Garden Grove	822
6059089104	Orange	Garden Grove	1101
6059089106	Orange	Garden Grove	814
6059088802	Orange	Garden Grove	1324
6059076202	Orange	Orange	2114
6059075806	Orange	Orange	1631
6059075812	Orange	Orange	2181
6059076204	Orange	Orange	1491
6059076101	Orange	Orange	2717
6059011720	Orange	Placentia	2176
6059011721	Orange	Placentia	1492
6059011722	Orange	Placentia	702
6065041410	Riverside	Corona	921
6065041411	Riverside	Corona	893
6065041600	Riverside	Corona	1746

Top 25% of impacted census tracts in California – SCE territory only

6065041813	Riverside	Corona	1877
6065040808	Riverside	Corona	2565
6065041500	Riverside	Corona	751
6065041909	Riverside	Corona	1550
6065041703	Riverside	Corona	1465
6065041704	Riverside	Corona	1006
6065041904	Riverside	Corona	1232
6111000200	Ventura	Fillmore	674
6111004902	Ventura	Oxnard	1156
6111009100	Ventura	Oxnard	1198
6111003900	Ventura	Oxnard	1361
6111004503	Ventura	Oxnard	792
6111004704	Ventura	Oxnard	265
6111004715	Ventura	Oxnard	907
6111000500	Ventura	Somis	206
6107004500	Tulare	California Hot Springs	337
6029004800	Kern	Delano	2539
6029004901	Kern	Delano	1566
6029005003	Kern	Delano	968
6107004300	Tulare	Earlimart	1047
6107004400	Tulare	Earlimart	1018
6107001400	Tulare	Exeter	1698
6107001601	Tulare	Farmersville	2671
6029003306	Kern	Frazier Park	1656
6031000100	Kings	Hanford	995
6031000500	Kings	Hanford	1577
6031000800	Kings	Hanford	1399
6031000900	Kings	Hanford	2320
6031001001	Kings	Hanford	1202
6031001002	Kings	Hanford	1274
6031001003	Kings	Hanford	1641
6031001100	Kings	Hanford	1904
6031001200	Kings	Hanford	722
6107002500	Tulare	Lindsay	1085
6107002601	Tulare	Lindsay	1211
6107002602	Tulare	Lindsay	1597
6107002800	Tulare	Lindsay	975
6029004604	Kern	MC Farland	762
6029004702	Kern	MC Farland	195
6107004200	Tulare	Pixley	1409
6107003400	Tulare	Porterville	2169
6107003700	Tulare	Porterville	1833
6107003802	Tulare	Porterville	1274
6107003901	Tulare	Porterville	2221

Top 25% of impacted census tracts in California – SCE territory only

6107003902	Tulare	Porterville	1807
6107004101	Tulare	Porterville	2989
6107004102	Tulare	Porterville	627
6107003300	Tulare	Strathmore	1679
6107003200	Tulare	Tipton	898
6107002100	Tulare	Tulare	782
6107002202	Tulare	Tulare	1733
6107002304	Tulare	Tulare	544
6107002400	Tulare	Tulare	3587
6107002901	Tulare	Tulare	1166
6107003001	Tulare	Tulare	1455
6107003002	Tulare	Tulare	1100
6107003100	Tulare	Tulare	1123
6107001902	Tulare	Visalia	1587
6107002002	Tulare	Visalia	1909
6107002007	Tulare	Visalia	3235
6107002008	Tulare	Visalia	1094
6107002009	Tulare	Visalia	1729
6107000701	Tulare	Woodlake	853
6107000702	Tulare	Woodlake	1746
6107000900	Tulare	Visalia	2517
6107001004	Tulare	Visalia	2537
6107001100	Tulare	Visalia	2151
6107001200	Tulare	Visalia	412
6107000800	Tulare	Visalia	1997
6107001302	Tulare	Visalia	2164
6107001602	Tulare	Visalia	1547
6107001701	Tulare	Visalia	1647
6029006007	Kern	Rosamond	1409
		Total	1,134,579

Top 25% of impacted census tracts in California – PG&E territory only

Total # of Residential Electric Meters*	Total # of Residential Customers in Top 25% CES DACs**	% of PG&E Residential Customers in top 25% CES DACs
4,700,000	662,409	14.09%

*Estimate received from PGE Customer Energy Solutions, Data Analytics and Governance, Solution Development representative via informal email request on 4.20.16.

**Data pulled from "Pacific Gas and Electric Company (U 39 E) Reply Comments on Party Proposals and Staff Papers", September 15, 2015, Appendix B at pg. 40.

Census Tract	County	City	Residential Electric Meters
6029004702	Kern	MC Farland	4
6077004404	San Joaquin	Lodi	6
6077004501	San Joaquin	Lodi	7
6107003200	Tulare	Tipton	21
6107004200	Tulare	Pixley	23
6107000701	Tulare	Woodlake	26
6107000900	Tulare	Visalia	66
6047000201	Merced	Ballico	66
6029006007	Kern	Rosamond	97
6031000500	Kings	Hanford	101
6107000800	Tulare	Visalia	127
6107003100	Tulare	Tulare	163
6029004604	Kern	MC Farland	214
6029003900	Kern	Shafter	254
6019000100	Fresno	Fresno	256
6019000800	Fresno	Fresno	280
6099003400	Stanislaus	Newman	300
6019008402	Fresno	Firebaugh	356
6019005408	Fresno	Fresno	393
6029004200	Kern	Shafter	426
6019001408	Fresno	Fresno	441
6077003900	San Joaquin	Stockton	446
6107004300	Tulare	Earlimart	460
6039000400	Madera	Firebaugh	469
6085504318	Santa Clara	San Jose4	479
6031001200	Kings	Hanford	492
6029003306	Kern	Frazier Park	500
6039000201	Madera	Chowchilla	515
6001402500	Alameda	Oakland	554
6077000600	San Joaquin	Stockton	556
6077002402	San Joaquin	Stockton	567
6001402600	Alameda	Oakland	575
6019007801	Fresno	Huron	583

Top 25% of impacted census tracts in California – PG&E territory only

6019001303	Fresno	Fresno	594
6047001501	Merced	Merced	606
6047000503	Merced	Winton	636
6001407300	Alameda	Oakland	642
6013312000	Contra Costa	Pittsburg	645
6001409100	Alameda	Oakland	654
6019001500	Fresno	Fresno	655
6077001600	San Joaquin	Stockton	661
6019003004	Fresno	Fresno	667
6029006404	Kern	Lamont	668
6031001402	Kings	Corcoran	669
6001402700	Alameda	Oakland	707
6099000301	Stanislaus	Riverbank	708
6019004902	Fresno	Fresno	709
6115040302	Yuba	Marysville	715
6019000901	Fresno	Fresno	715
6047000303	Merced	Livingston	718
6107000202	Tulare	Cove	722
6067009900	Sacramento	Grove	726
6077003308	San Joaquin	Stockton	731
6019001100	Fresno	Fresno	732
6029001201	Kern	Bakersfield	732
6019001412	Fresno	Fresno	733
6077002503	San Joaquin	Stockton	734
6019006201	Fresno	Sanger	737
6099003300	Stanislaus	Patterson	738
6029001500	Kern	Bakersfield	746
6001406400	Alameda	Oakland	750
6029006201	Kern	Bakersfield	764
6053010101	Monterey	Moss Landing	789
6077002201	San Joaquin	Stockton	792
6085503117	Santa Clara	San Jose	794
6047001502	Merced	Merced	800
6019002904	Fresno	Fresno	802
6107000302	Tulare	Kingsburg	806
6085503105	Santa Clara	San Jose	809
6047001005	Merced	Merced	810
6019000501	Fresno	Fresno	815
6029000905	Kern	Bakersfield	815
6019000200	Fresno	Fresno	817
6077004001	San Joaquin	Lodi	827
6067009800	Sacramento	Isleton	834
6099000302	Stanislaus	Riverbank	835
6077000500	San Joaquin	Stockton	841

Top 25% of impacted census tracts in California – PG&E territory only

6031000200	Kings	Lemoore	842
6029002302	Kern	Bakersfield	859
6029004500	Kern	Lost Hills	873
6085512602	Santa Clara	Gilroy	873
6047001601	Merced	Merced	877
6019006900	Fresno	Del Rey	878
6095250701	Solano	Vallejo	881
6019003001	Fresno	Fresno	885
6085503122	Santa Clara	San Jose	893
6085503601	Santa Clara	San Jose	899
6029002100	Kern	Bakersfield	907
6077005129	San Joaquin	Lathrop	909
6019001900	Fresno	Fresno	912
6053000502	Monterey	Salinas	914
6077003216	San Joaquin	Stockton	926
6029001600	Kern	Bakersfield	928
6001409200	Alameda	Oakland	933
6001402400	Alameda	Oakland	934
6031000100	Kings	Hanford	943
6029006301	Kern	Arvin	945
6001410500	Alameda	Oakland	948
6029003103	Kern	Bakersfield	949
6029002600	Kern	Bakersfield	953
6001408900	Alameda	Oakland	962
6077003313	San Joaquin	Stockton	965
6019002905	Fresno	Fresno	981
6019002602	Fresno	Fresno	981
6047000301	Merced	Livingston	981
6085501501	Santa Clara	San Jose	995
6019004100	Fresno	Fresno	999
6019005608	Fresno	Clovis	1,002
6007003400	Butte	Gridley	1,005
6019000502	Fresno	Fresno	1,005
6077003312	San Joaquin	Stockton	1,007
6077003217	San Joaquin	Stockton	1,013
6107000502	Tulare	Dinuba	1,017
6019001000	Fresno	Fresno	1,018
6077000300	San Joaquin	Stockton	1,038
6019000300	Fresno	Fresno	1,039
6085501502	Santa Clara	San Jose	1,044
6077001700	San Joaquin	Stockton	1,045
6077003407	San Joaquin	Stockton	1,048
6019007400	Fresno	Laton	1,049
6077001800	San Joaquin	Stockton	1,050

Top 25% of impacted census tracts in California – PG&E territory only

6077002504	San Joaquin	Stockton	1,050
6047000701	Merced	Atwater	1,055
6001409000	Alameda	Oakland	1,059
6085501401	Santa Clara	San Jose	1,061
6019006802	Fresno	Reedley	1,063
6019003807	Fresno	Fresno	1,066
6019006502	Fresno	Orange Cove	1,070
6029006304	Kern	Arvin	1,071
6077002702	San Joaquin	Stockton	1,077
6001409500	Alameda	Oakland	1,079
6019008501	Fresno	Selma	1,082
6077003700	San Joaquin	Stockton	1,088
6013368002	Contra Costa	San Pablo	1,099
6013307201	Contra Costa	Antioch	1,104
6075012502	San Francisco	San Francisco	1,110
6019003701	Fresno	Fresno	1,113
6077003405	San Joaquin	Stockton	1,113
6047000901	Merced	Merced	1,118
6019007802	Fresno	Huron	1,119
6039000602	Madera	Madera	1,122
6001403000	Alameda	Oakland	1,125
6077002000	San Joaquin	Stockton	1,147
6019000700	Fresno	Fresno	1,153
6019003301	Fresno	Fresno	1,158
6019004601	Fresno	Fresno	1,166
6029003700	Kern	Buttonwillow	1,167
6053010506	Monterey	Salinas	1,169
6019005202	Fresno	Fresno	1,180
6019002701	Fresno	Fresno	1,182
6019001202	Fresno	Fresno	1,183
6019005305	Fresno	Fresno	1,183
6085503110	Santa Clara	San Jose	1,197
6029001103	Kern	Bakersfield	1,197
6019004404	Fresno	Fresno	1,220
6031001601	Kings	Kettleman City	1,235
6001436200	Alameda	Hayward	1,239
6013320001	Contra Costa	Martinez	1,248
6053014601	Monterey	Moss Landing	1,251
6019005407	Fresno	Fresno	1,251
6019000400	Fresno	Fresno	1,254
6085501700	Santa Clara	San Jose	1,255
6019005410	Fresno	Fresno	1,256
6085503602	Santa Clara	San Jose	1,258
6013375000	Contra Costa	Richmond	1,264

Top 25% of impacted census tracts in California – PG&E territory only

6029000507	Kern	Bakersfield	1,265
6077005131	San Joaquin	Manteca	1,265
6029000906	Kern	Bakersfield	1,267
6019002502	Fresno	Fresno	1,271
6019002000	Fresno	Fresno	1,271
6075023103	San Francisco	San Francisco	1,272
6053000900	Monterey	Salinas	1,274
6013306004	Contra Costa	Antioch	1,276
6047001302	Merced	Merced	1,285
6077002202	San Joaquin	Stockton	1,289
6029006403	Kern	Lamont	1,290
6077002401	San Joaquin	Stockton	1,290
6001409400	Alameda	Oakland	1,295
6047001503	Merced	Merced	1,296
6019002300	Fresno	Fresno	1,299
6019002800	Fresno	Fresno	1,301
6085503214	Santa Clara	San Jose	1,305
6031001300	Kings	Corcoran	1,305
6047001301	Merced	Merced	1,309
6019003003	Fresno	Fresno	1,309
6019004703	Fresno	Fresno	1,311
6077003601	San Joaquin	Stockton	1,313
6077003803	San Joaquin	French Camp	1,316
6085503709	Santa Clara	San Jose	1,316
6047001700	Merced	Merced	1,318
6047000802	Merced	Atwater	1,320
6001407500	Alameda	Oakland	1,321
6013314102	Pittsburg	Pittsburg	1,322
6001401700	Alameda	Oakland	1,323
6019002903	Fresno	Fresno	1,331
6085501102	Santa Clara	San Jose	1,333
6077002300	San Joaquin	Stockton	1,353
6047000801	Merced	Atwater	1,356
6019002400	Fresno	Fresno	1,358
6019007600	Fresno	Fresno	1,366
6001406000	Alameda	Oakland	1,368
6039000603	Madera	Madera	1,369
6019000902	Fresno	Fresno	1,370
6077000700	San Joaquin	Stockton	1,371
6019002501	Fresno	Fresno	1,375
6019002601	Fresno	Fresno	1,375
6107000600	Tulare	Cutler	1,379
6029006202	Kern	Arvin	1,385
6029004402	Kern	Wasco	1,387

Top 25% of impacted census tracts in California – PG&E territory only

6077005308	San Joaquin	Tracy	1,402
6099000304	Stanislaus	Riverbank	1,402
6029004102	Kern	Shafter	1,403
6085512310	Santa Clara	Morgan Hill	1,408
6077005126	San Joaquin	Manteca	1,408
6029000903	Kern	Bakersfield	1,411
6019001301	Fresno	Fresno	1,416
6077005109	San Joaquin	Manteca	1,417
6019001304	Fresno	Fresno	1,419
6001402800	Alameda	Oakland	1,426
6085503121	Santa Clara	Jose	1,427
6077001900	San Joaquin	Stockton	1,431
6047001003	Merced	Merced	1,431
6019005204	Fresno	Fresno	1,431
6019003808	Fresno	Fresno	1,433
6001432501	Alameda	San Leandro	1,438
6029003113	Kern	Bakersfield	1,445
6029001101	Kern	Bakersfield	1,447
6019003201	Fresno	Fresno	1,453
6019001800	Fresno	Fresno	1,455
6029000904	Kern	Bakersfield	1,456
6019005000	Fresno	Fresno	1,462
6019001201	Fresno	Fresno	1,463
6029001901	Kern	Bakersfield	1,469
6019005606	Fresno	Clovis	1,473
6047001401	Merced	Merced	1,473
6019005203	Fresno	Fresno	1,473
6019008302	Fresno	Mendota	1,473
6019002702	Fresno	Fresno	1,474
6019005406	Fresno	Fresno	1,475
6019004901	Fresno	Fresno	1,477
6019007300	Fresno	Selma	1,478
6081612000	San Mateo	Palo Alto	1,481
6077003112	San Joaquin	Stockton	1,482
6019007002	Fresno	Selma	1,486
6099000303	Stanislaus	Riverbank	1,487
6031001500	Kings	Corcoran	1,495
6019007500	Fresno	Caruthers	1,496
6013313102	Contra Costa	Pittsburg	1,504
6077005127	San Joaquin	Lathrop	1,505
6013365002	Contra Costa	Richmond	1,505
6075017801	San Francisco	San Francisco	1,516
6029000400	Kern	Bakersfield	1,526
6077003305	San Joaquin	Stockton	1,528

Top 25% of impacted census tracts in California – PG&E territory only

6029002815	Kern	Bakersfield	1,535
6077002100	San Joaquin	Stockton	1,538
6029003115	Kern	Bakersfield	1,539
6029006303	Kern	Arvin	1,540
6001433103	Alameda	San Leandro	1,543
6029002814	Kern	Bakersfield	1,547
6019003302	Fresno	Fresno	1,555
6047001901	Merced	Merced	1,564
6103000800	Tehama	Gerber	1,569
6019005403	Fresno	Fresno	1,573
6047002100	Merced	Los Banos	1,581
6019002906	Fresno	Fresno	1,583
6019005409	Fresno	Fresno	1,590
6001409300	Alameda	Oakland	1,593
6047000504	Merced	Winton	1,597
6019006602	Fresno	Reedley	1,599
6019003809	Fresno	Fresno	1,601
6029001202	Kern	Bakersfield	1,603
6019006501	Fresno	Reedley	1,603
6001401300	Alameda	Oakland	1,605
6007003700	Butte	Oroville	1,605
6077000100	San Joaquin	Stockton	1,611
6019004704	Fresno	Fresno	1,611
6019004801	Fresno	Fresno	1,627
6013311000	Contra Costa	Pittsburg	1,630
6029001102	Kern	Bakersfield	1,635
6019002200	Fresno	Fresno	1,639
6019001600	Fresno	Fowler	1,641
6019003702	Fresno	Fresno	1,642
6019001413	Fresno	Fresno	1,643
6029006401	Kern	Lamont	1,644
6115040400	Yuba	Olivehurst	1,644
6019007700	Fresno	Riverdale	1,645
6085501000	Santa Clara	San Jose	1,645
6029000300	Kern	Bakersfield	1,646
6113010203	Yolo	West Sacramento	1,653
6047000505	Merced	Atwater	1,656
6029002200	Kern	Bakersfield	1,657
6019004802	Fresno	Fresno	1,662
6001401400	Alameda	Emeryville	1,665
6077002800	San Joaquin	Stockton	1,666
6047001402	Merced	Merced	1,668
6053010504	Monterey	Salinas	1,671
6107000401	Tulare	Dinuba	1,673

Top 25% of impacted census tracts in California – PG&E territory only

6019003900	Fresno	Kerman	1,682
6085505100	Santa Clara	San Jose	1,687
6077003110	San Joaquin	Stockton	1,691
6001406100	Alameda	Oakland	1,692
6013313206	Contra Costa	Pittsburg	1,697
6077001400	San Joaquin	Stockton	1,704
6077000801	San Joaquin	Stockton	1,710
6019003202	Fresno	Fresno	1,724
6013314103	Pittsburg	Pittsburg	1,724
6039000506	Madera	Madera	1,737
6019005805	Fresno	Fresno	1,740
6019008200	Fresno	Cantua Creek	1,741
6047000902	Merced	Merced	1,744
6019006202	Fresno	Sanger	1,745
6077002701	San Joaquin	Stockton	1,759
6047001602	Merced	Merced	1,759
6077003802	San Joaquin	Stockton	1,763
6019001407	Fresno	Fresno	1,763
6013358000	Contra Costa	Rodeo	1,766
6047000304	Merced	Livingston	1,771
6113010204	Yolo	West Sacramento	1,774
6047000601	Merced	Atwater	1,776
6013310000	Contra Costa	Pittsburg	1,781
6029002813	Kern	Bakersfield	1,794
6001432400	Alameda	Leandro	1,801
6013307102	Contra Costa	Antioch	1,809
6053010606	Monterey	Salinas	1,810
6019007202	Fresno	Kingsburg	1,815
6019005607	Fresno	Clovis	1,822
6029003000	Kern	Bakersfield	1,824
6019003400	Fresno	Fresno	1,832
6029002700	Kern	Bakersfield	1,838
6019001700	Fresno	Fresno	1,840
6047001004	Merced	Merced	1,847
6001407200	Alameda	Oakland	1,856
6019004504	Fresno	Fresno	1,861
6019004205	Fresno	Fresno	1,862
6019008502	Fresno	Parlier	1,863
6029002816	Kern	Bakersfield	1,865
6107000501	Tulare	Dinuba	1,883
6029001902	Kern	Bakersfield	1,902
6029003112	Kern	Bakersfield	1,903
6029004000	Kern	Shafter	1,905
6019006604	Fresno	Reedley	1,906

Top 25% of impacted census tracts in California – PG&E territory only

6077005122	San Joaquin	Lathrop	1,913
6039000800	Madera	Madera	1,916
6019005301	Fresno	Fresno	1,930
6047000603	Merced	Atwater	1,932
6115040100	Yuba	Marysville	1,943
6001437101	Alameda	Union City	1,962
6087110400	Santa Cruz	Watsonville	1,965
6001436900	Alameda	Hayward	1,965
6047001200	Merced	Merced	1,967
6019007004	Fresno	Selma	1,967
6007003300	Butte	Oroville	1,978
6013382000	Contra Costa	Richmond	1,984
6077005305	San Joaquin	Tracy	1,995
6013379000	Contra Costa	Richmond	2,001
6019007100	Fresno	Selma	2,004
6019002100	Fresno	Fresno	2,016
6077000402	San Joaquin	Stockton	2,030
6077001300	San Joaquin	Stockton	2,037
6039001000	Madera	Madera	2,048
6039000508	Madera	Madera	2,051
6013376000	Contra Costa	Richmond	2,064
6001408800	Alameda	Oakland	2,068
6019000600	Fresno	Fresno	2,071
6029001700	Kern	Bakersfield	2,072
6019001411	Fresno	Fresno	2,078
6077000900	San Joaquin	Stockton	2,080
6019004505	Fresno	Fresno	2,092
6013381000	Contra Costa	Richmond	2,114
6019005100	Fresno	Fresno	2,124
6029002812	Kern	Bakersfield	2,129
6107000301	Tulare	Dinuba	2,129
6077005202	San Joaquin	Tracy	2,131
6019003500	Fresno	Fresno	2,133
6029001801	Kern	Bakersfield	2,141
6019004002	Fresno	Kerman	2,143
6029001300	Kern	Bakersfield	2,148
6077004902	San Joaquin	Escalon	2,155
6019005302	Fresno	Fresno	2,169
6029001400	Kern	Bakersfield	2,174
6019003805	Fresno	Fresno	2,178
6047002201	Merced	Los Banos	2,191
6019006100	Fresno	Sanger	2,194
6019004701	Fresno	Fresno	2,197
6107000201	Tulare	Orosi	2,202

Top 25% of impacted census tracts in California – PG&E territory only

6019008401	Fresno	Firebaugh	2,204
6029004301	Kern	Wasco	2,209
6001437200	Alameda	Hayward	2,216
6019007003	Fresno	Selma	2,228
6029004701	Kern	Farland	2,233
6029002400	Bakersfield	Bakersfield	2,235
6077005302	San Joaquin	Tracy	2,241
6029003122	Kern	Bakersfield	2,242
6019003103	Fresno	Clovis	2,269
6019006700	Fresno	Reedley	2,277
6077001500	San Joaquin	Stockton	2,281
6077005110	San Joaquin	Manteca	2,282
6077003113	San Joaquin	Stockton	2,282
6039000202	Madera	Chowchilla	2,315
6019005304	Fresno	Fresno	2,324
6029003114	Kern	Bakersfield	2,330
6039000900	Madera	Madera	2,372
6029002500	Kern	Bakersfield	2,387
6029002000	Kern	Bakersfield	2,389
6113010102	Yolo	Sacramento	2,394
6029002900	Kern	Bakersfield	2,409
6085501600	Santa Clara	San Jose	2,416
6085504319	Santa Clara	San Jose	2,426
6013302005	Contra Costa	Oakley	2,450
6013377000	Contra Costa	Richmond	2,460
6013314104	Contra Costa	Pittsburg	2,460
6081601300	San Mateo	Daly City	2,468
6077005119	San Joaquin	Lathrop	2,477
6029002301	Kern	Bakersfield	2,483
6019006300	Fresno	Reedley	2,496
6019005602	Fresno	Clovis	2,500
6019001414	Fresno	Fresno	2,504
6029003121	Kern	Bakersfield	2,534
6085500100	Santa Clara	San Jose	2,574
6029000600	Kern	Bakersfield	2,629
6077004102	San Joaquin	Lodi	2,676
6029001000	Kern	Bakersfield	2,728
6019003803	Fresno	Fresno	2,760
6019001410	Fresno	Fresno	2,816
6013313101	Contra Costa	Pittsburg	2,829
6077005135	San Joaquin	Manteca	2,856
6029000200	Kern	Bakersfield	2,865
6039000502	Madera	Madera	2,891
6039000507	Madera	Madera	2,911

Top 25% of impacted census tracts in California – PG&E territory only

6019004207	Fresno	Fresno	2,922
6039000503	Madera	Madera	2,935
6019003102	Fresno	Clovis	2,937
6001433200	Alameda	San Leandro	2,941
6047002202	Merced	Los Banos	2,962
6019007201	Fresno	Kingsburg	2,970
6047002000	Merced	Gustine	3,093
6019006000	Fresno	Sanger	3,196
6083002402	Santa Barbara	Santa Maria	3,328
6047002302	Merced	Los Banos	4,375
6029003202	Kern	Bakersfield	4,552
6095253500	Solano	Rio Vista	4,647
6029000101	Kern	Bakersfield	4,802
6029003206	Kern	Bakersfield	4,956
6077003500	San Joaquin	Stockton	5,764
		Total	662,409

Top 25% of impacted census tracts in California – SDG&E territory only

Total # of Residential Electric Meters*	Total # of Residential Customers in Top 25% CES DACs*	% of SDGE Residential Customers in top 25% CES DACs
1,266,000	32,168	2.54%

*Data from “San Diego Gas and Electric Company (U 902 E) Comments On Administrative Law Judge Ruling Regarding Assembly Bill 693”, November 2, 2015, Attachment A at pg. 21.

Census Tract	County	City	Residential Electric Meters
6073013205	San Diego	Chula Vista	532
6073021900	San Diego	National City	631
6073005000	San Diego	San Diego	663
6073003602	San Diego	San Diego	756
6073003601	San Diego	San Diego	760
6073004700	San Diego	San Diego	786
6073011602	San Diego	National City	811
6073015901	San Diego	El Cajon	932
6073003301	San Diego	San Diego	958
6073003603	San Diego	San Diego	1,018
6073003901	San Diego	San Diego	1,025
6073003501	San Diego	San Diego	1,094
6073003404	San Diego	San Diego	1,139
6073003303	San Diego	San Diego	1,155
6073003305	San Diego	San Diego	1,220
6073012502	San Diego	Chula Vista	1,239
6073003502	San Diego	San Diego	1,250
6073004000	San Diego	San Diego	1,255
6073003902	San Diego	San Diego	1,290
6073012401	San Diego	Chula Vista	1,386
6073004900	San Diego	San Diego	1,437
6073015802	San Diego	El Cajon	1,634
6073011601	San Diego	National City	1,805
6073020018	San Diego	San Marcos	1,867
6073003401	San Diego	San Diego	2,183
6073005100	San Diego	San Diego	3,342
		Total	32,168