

PUBLIC UTILITIES COMMISSION

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April 2, 2019

Dear Mr. Jacobson:

Energy Division approves Pacific Gas and Electric Company's (PG&E) 2019 Annual Budget Advice Letter (4011-G/5375-E, 4011-G-A/5375-E-A, and 4011-G-B/5375-E-B), effective January 1, 2019, with conditions related to PG&E's primary lighting program and modifications to the approved budget. PG&E's 2019 spending request for \$319,511,700 is approved, while unspent and uncommitted funds accrued through December 31, 2018, are \$198,295,672, reducing PG&E's approved 2019 budget for recovery to \$153,866,574.

Background

On September 4, 2018, PG&E filed its Annual Budget Advice Letter (ABAL) 4011-G/5375-E. On October 4, 2018, the California Public Advocated Office (CalPA); the City and County of San Francisco, the City of San Jose and East Bay Energy Watch (the Joint Parties); the Local Government Sustainable Energy Coalition (LGSEC) and The Utility Reform Network (TURN) protested PG&E's ABAL and PG&E replied to the protests on October 11, 2018. On October 29, 2018, PG&E filed supplemental ABAL 4011-G-A/5375-E-A. CalPA protested the supplemental ABAL 4011-G-A/5375-E-A on November 5, 2018, and PG&E responded to the protest on November 13, 2018. In response to CalPA's November 2018 protest, PG&E filed a second supplemental ABAL 4011-G-B/5375-E-B on January 23, 2019. CalPA protested the supplemental ABAL 4011-G-B/5375-E-B on February 12, 2019, and PG&E responded on February 20, 2019.

On April 2, 2019, PG&E filed substitute sheets to ABAL 4011-G-B/5375-E-B, in which it corrected the amount of unspent and uncommitted funds to be returned to ratepayers via a reduced 2019 budget recovery request. Per Table 3 in the substitute sheet, PG&E will return the electric portion of the unspent and uncommitted funds accrued through December 31, 2018, to ratepayers in the amount of \$165,645,126, thereby reducing PG&E's 2019 budget recovery request to \$153,866,574 and bringing PG&E's total budget recovery request, which includes funding for RENs and CCAs, to \$186,491,441. Unspent and uncommitted gas funds in the amount of \$32,650,546 will be returned to ratepayers as soon as feasible via the Annual Gas True-up process and no later than 2020.

Public Advocates Office Protest and Reply Comments

Required use of 2019-2020 Draft DEER Resolution E-4952

In its October 4, 2018, protest, CalPA requests that the Program Administrators (PAs) file supplemental advice letters updating their 2019 ABALs based on the 2019-2020 Draft DEER Resolution E-4952. CalPA states that the Draft Resolution E-4952 would make numerous changes to DEER such as adjustments to net-to-gross ratios and the expected useful life of certain measures. Many of these changes will reduce the claimable savings from energy efficiency measures. CalPA states that “if Draft Resolution E-4952 is adopted by the Commission, the Program Administrators’ (PAs’) energy efficiency portfolios will immediately become less cost-effective than currently forecast.”¹

CalPA concludes that “given the fact that Draft Resolution E-4952 is likely to have a significant impact on the cost-effectiveness of EE portfolios, the Commission should require all EE PAs to submit supplemental advice letters after the resolution is adopted. In these supplemental advice letters, each PA should provide a revised cost-effectiveness forecast based on the updated DEER values.”²

Discussion

While CalPA’s protest requests that Energy Division require all PAs to refile their ABALs using the relevant updates in the then Draft DEER Resolution E-4952, there is no Commission direction requiring the PAs to do so. Energy Division acknowledges that the approved Resolution E-4952 may change the PAs’ portfolio cost effectiveness, but the PAs must use the current DEER inputs in their ABALs, not DEER values approved for future planning. OP 3 of Resolution E-4952 states that E-4952 is only applicable to reporting savings claims in 2019 and for portfolio planning in 2020.³ OP 2 of the August 2017 DEER Resolution E-4867 states that approved DEER values from Resolution E-4867 must be used for 2019 portfolio planning.⁴ Requiring PG&E to resubmit their ABAL to Energy Division using relevant DEER updates from Resolution E-4952 would contradict both of these Commission-adopted resolutions. Consequently, Energy Division rejects CalPA’s protest and will not require PG&E to resubmit their ABAL.

¹ CalPA protest to PG&E Advice Letter 4011-G/5375-E, SCE Advice Letter 3589-E, SCG Advice Letter 5349-G, SDG&E Advice Letter 3267-E/2700-G, and MCE Advice Letter 33-E, filed October 4, 2018, pp. 4-5.

² Ibid.

³ E-4952, OP 3 states that “Pacific Gas and Electric Company (PG&E), Southern California Electric Company (SCE), Southern California Gas Company (SoCalGas), and San Diego Gas & Electric (SDG&E), the San Francisco Bay Area Regional Energy Network (BayREN), Southern California Regional Energy Network (SoCalREN), Tri-County Regional Energy Network (3CREN), Local Government Sustainable Energy Coalition (LGSEC), Lancaster Choice Energy (LCE), and Marin Clean Energy (MCE) must use the updated assumptions, methods and values for 2019 savings claims and 2020 planning, implementation and reporting.”

⁴ E-4876, OP 2 states that: “Pacific Gas and Electric Company (PG&E), Southern California Electric Company (SCE), Southern California Gas Company (SoCalGas), and San Diego Gas & Electric (SDG&E), the San Francisco Bay Area Regional Energy Network (BayREN), Southern California Regional Energy Network (SoCalREN), Tri-County Regional Energy Network (3CREN), Local Government Sustainable Energy Coalition (LGSEC), and Marin Clean Energy (MCE) must use the updated assumptions, methods and values for 2017, 2018 savings claims and 2019 planning, implementation and reporting.”

Commission should reject PG&E, MCE and SoCalGas ABALs for insufficient explanation of path to evaluated Total Resource Cost of 1.0

CalPA's October 4, 2018, protest of PG&E's ABAL asserts that "PG&E, MCE and SoCalGas do not adequately explain how they will each achieve an evaluated Total Resource Cost (TRC) ratio of 1.0, as required by D. 18-05-041", specifically by not addressing:

- Why the PA is not proposing a portfolio that meets a 1.25 TRC;
- Why the PA is confident that it will meet the evaluated 1.0 TRC for that year; and
- How the PA intends to lower costs or increase savings going forward.⁵

In its reply, PG&E disagrees with CalPA's assertion regarding the perceived inadequacy of PG&E's explanation of how it will improve cost-effectiveness and reach an evaluated TRC of 1.0 for 2019. PG&E refers to the ABAL filing of September 4, 2018, in which it describes: challenges to achieving cost-effectiveness, including updated avoided costs and the current cost-effectiveness framework; optimizing existing third-party programs; and, portfolio adjustments to sunset under-performing programs, expand existing programs that are cost-effective, and reduce program overhead.⁶

Discussion

D. 18-05-041, Section 7.2, describes the required content to be included in a PA's ABAL filing. Specifically, the PA(s) must "include a discussion of proposed program and portfolio changes, to facilitate Commission staff and stakeholder review of the ABAL submissions and understanding of future portfolio considerations and composition." While CalPA is correct in that PAs' ABALs were required to address this content, D. 18-05-041 goes on to state that "there will be minimal to no review/oversight by staff of the provided information, but the information must be provided." Therefore, Energy Division interprets the decision language to indicate that a PA must provide an explanation why they believe their portfolio will achieve an evaluated TRC of 1.0.

Subsequent review by Energy Division of PG&E's initial and supplemental ABAL, as well as PG&E's response to CalPA's protest, finds PG&E met the requirements of D. 18-05-041 by including the required content in their ABAL filings. Specifically, PG&E has:

- Provided a list cost-effective programs it will expand in 2019, including On-Bill Financing and Residential Pay-for-Performance;
- Provided a list of non-cost-effective programs it will reduce or sunset in 2019;
- Described its intent to improve measure cost accounting;
- Stated a clear intent to address and reduce contract and administrative spending.⁷

⁵ See CalPA protest filed October 4, 2018, pp. 5-8.

⁶ "PG&E Reply to Protests from the Public Advocates Office, The Utility Reform Network, the Local Government Sustainability Coalition, and the Joint Parties of Bay Area local government partners, regarding Advice Letter 4011-G/5375-E (PG&E's 2019 Energy Efficiency Annual Budget Advice Letter in Compliance with Decision 15-10-028, OP 4)" (PG&E Reply to Protest), October 11, 2019, pp. 2-4

⁷ See PG&E's 2019 Energy Efficiency Annual Budget Advice Letter in Compliance with Decisions 15-10-028 and 18-05-041 (PG&E ABAL), September 4, 2018 pp. 22-36; and PG&E Reply to Protest, pp. 2-4.

Energy Division finds that PG&E has met the annual budget advice letter review criteria listed above and has provided an adequate explanation of why it is not forecasting a portfolio TRC of 1.25 and how it plans to achieve an evaluated portfolio TRC of 1.0 during the transition period. Consequently, the Energy Division rejects CalPA's protest.

Because PG&E met the ABAL review criteria of a forecasted 1.0 TRC, but fell short of forecasting 1.25 TRC threshold, D. 18-05-041 requires PG&E to participate in the workshop process⁸ in which PG&E will:

- explain why its forecasted TRC does not meet or exceed 1.25;
- describe how it intends to achieve a portfolio TRC that meets or exceeds 1.0 on an evaluated basis;
- describe how it will transition to and achieve a forecast TRC of at least 1.25 by program year 2023.

As part of this process, PG&E should:

- identify any programs it intends to discontinue or modify due to consistently poor or declining cost-effectiveness results; and
- describe how the PA is communicating this intention to those programs' beneficiaries.

Energy Division staff, working with PG&E in planning the workshop, may also ask PG&E to address additional issues related to portfolio cost-effectiveness, administrative costs and program accounting practices.

This workshop process is the appropriate venue for CalPA to gather more substantive information on PG&E's portfolio cost-effectiveness and provide constructive feedback to PG&E via the review and comment process. While D. 18-05-041 provides a specific timeline, as part of this workshop process the PAs must deliver a report that summarizes the workshop. Per Commission guidance, parties may file comments on PG&E's proposed portfolio composition in response to the PG&E workshop report.

The PAs should be required to show their portfolios comply with the statewide funding requirements of D.18-05-041

Decision D.18-05-041 states that:

- PG&E should spend at least 25% of their portfolio budget on statewide programs, where such statewide programs conform to the new definition per D.16-08-019.
- Each IOU funds each statewide program in proportion to its load share⁹, and that such funding not deviate from load share by more than 20 percent.¹⁰
- All the IOU PAs shall propose a mechanism to track funding for statewide programs, including funding flows from other IOUs within 90 days of the issuance of this decision.¹¹

⁸ See D. 18-05-041 at <http://docs.cpuc.ca.gov/PublishedDocs/Published/G000/M215/K706/215706139.PDF> , pp. 134-137.

⁹ D.18-05-041 OP22

¹⁰ D.18-05-041 pg. 83

¹¹ D.18-05-041, OP 24

In its October 4, 2018, protest, CalPA argues the IOUs have not presented a plan for determining load share or how statewide program costs will be allocated across funding the IOUs. For this reason, CalPA argues, the Commission cannot be assured of compliance with the statewide requirements. CalPA asks that the Commission require the PAs to file in a supplemental filing the load-proportional funding shares by fuel type (gas and electric) for each statewide program, to demonstrate compliance.

Discussion

Statewide programs conforming to the definition in D.16-08-019 will not be implemented until program year 2020. For this reason, Energy Division staff submitted a request to the IOUs for planned budgets for statewide program areas and a methodology for determining load-proportional funding shares by fuel type (gas and electric) for each statewide program to demonstrate compliance. This information was requested as a supplemental to the PAs' co-funding mechanism advice letters, submitted pursuant to D.18-05-041 OP24.¹² The PAs submitted the requested supplemental information on November 16, 2018, within the co-funding mechanism advice letter review process. A 20-day comment period for Parties to react to the supplemental advice letters closed on Thursday December 6, 2018, with no protests. Energy Division staff are working on the related dispositions, that will consider their demonstration of compliance with statewide program policies of D.16-08-019 and D.18-05-041, and the degree to which they sufficiently address CalPA protests.

The programs areas that are slated to become statewide are currently cooperatively managed by the PAs but are not delivered uniformly by a third-party implementer—or implementers—that are under contract to the lead IOU PA that holds full decision-making authority. For this reason, the current set of programs are not statewide programs under the new definition. The PAs plan to conduct solicitations throughout 2019 to hire third party implementers to launch compliant statewide programs in 2020. Consequently, Energy Division finds that the statewide program issues raised in CalPA's protest are more appropriate to address in the context of the statewide co-funding advice letters and rejects CalPA's protest in that there are insufficient grounds to withhold approval of 2019 ABAL filings on the basis of the statewide program issues.

Administrative Costs

CalPA's October 4, 2018, protest asks the Commission to require each of the IOU PAs to minimize administrative costs, arguing that the IOUs must be out of compliance due to the perceived effect those costs, as filed on CEDARS, have on portfolio cost-effectiveness. CalPA also asks the Commission to require each IOU to file a supplemental advice letter that uses consistent accounting methods for administrative costs vis a vis portfolio cost-effectiveness with and without these costs. However, CalPA's protest commends PG&E for reducing administrative costs by 29 percent since 2016, and acknowledges that PG&E's ABAL provides evidence that PG&E's administrative costs are under the Commission's 10 percent cap.¹³

¹² Supplemental Advice Letters filed November 16 regarding the IOU's Shared Funding Mechanism Proposal Pursuant to D.18-05-041: Advice Letter 3268-E-A/2701-G-A (SDG&E U902 M), Advice Letter 5346-G-A (SCG U904 G), Advice Letter 3861-E-A (SCE U338 E), Advice Letter 5373-E-A/4009-G-A (PG&E U39 M).

¹³ California Public Advocates protest to MCE, PG&E, SCE, SDG&E and SoCalGas ABALs in proceeding R.13-11-015, October 11, 2019, pp.12-15.

PG&E responds to CalPA's protest that its administrative costs are non-compliant with the Commission's 10 percent cap is correct by describing how IOU costs are currently incorporated into the Commission's Cost-effectiveness Tool (CET). As submitted on the (CET), IOU administrative costs include those required to be under the Commission's cap as well as those not subject to the cap. Consequently, when CalPA used the "TRC-no admin" filter to determine portfolio cost-effectiveness both with and without administrative costs, it received a misleading estimate of the magnitude of the effect "TRC-no admin" has on the portfolio, concluding that such an effect must mean that the IOUs are out of compliance with the Commission cap on administrative costs.

Additionally, PG&E's, SDG&E's and SoCalGas' responses to CalPA's protest all provide clarification as to the specific administrative costs subject to the Commission's 10 percent cap.

Lastly, PG&E's ABAL provides a line item for portfolio administrative costs of \$16.4 million, which are 5.2 percent of PG&E's portfolio budget.¹⁴

Discussion

PG&E's response to CalPA's protest is correct, in that the Commission's CET currently includes administrative costs required to be under the Commission's cap as well as those not subject to the cap. By including all administrative costs, the CET generates a misleading estimate of the magnitude of the effect "TRC-no admin" has on the portfolio, suggesting that such an effect must mean that the IOUs are out of compliance with the Commission cap on administrative costs.

Consequently, due to issues related to how administrative costs are reported on the Commission's CEDARS website as well as guidance provided in the Energy Efficiency Policy Manual V5¹⁵ on what costs are included and excluded in determining whether a PA meets the Commission's 10 percent administrative costs cap, Energy Division finds that the IOUs' ABALs are in compliance with CPUC rules on administrative costs and therefore rejects CalPA's protest.

PG&E incorrectly uses a market effects adjustment to increase its forecast of portfolio savings and cost-effectiveness, without which it fails to meet the Commission's cost-effectiveness and savings goals ABAL review criteria

In its protest filed February 12, 2019, CalPA asserts that PG&E "improperly relies on a market effects adjustment to increase its forecasts of energy savings and cost-effectiveness", and that this adjustment, as applied in PG&E's portfolio by the addition of 0.05 to each measure's net-to-gross value, is different than a five percent portfolio adjustment. In citing prior Commission guidance in D. 12-11-015 on whether and how program administrators should apply a market effects adjustment (spillover) to their respective portfolios, CalPA also argues that the Commission did not intend for the adjustment to be applied to portfolio forecasts but rather that the adjustment would only be used in the aftermath of portfolio evaluation.

¹⁴ See PG&E ABAL 4011-G/5375-E, Attachment 3, "2019 PG&E Energy Efficiency Cap and Target Expenditure Projections".

¹⁵ see Energy Efficiency Policy Manual V5 at [http://www.cpuc.ca.gov/uploadedFiles/CPUC_Public_Website/Content/Utilities_and_Industries/Energy - Electricity and Natural Gas/EEPPolicyManualV5forPDF.pdf](http://www.cpuc.ca.gov/uploadedFiles/CPUC_Public_Website/Content/Utilities_and_Industries/Energy_Electricity_and_Natural_Gas/EEPPolicyManualV5forPDF.pdf)

Additionally, CalPA states that only by an improper application of the market effects adjustment to its forecast is PG&E able to meet its gas savings goal and achieve a portfolio cost-effectiveness TRC of 1.04. CalPA's protest estimates that, absent the market effects adjustment applied to PG&E's forecast, PG&E's portfolio cost-effectiveness is .98 and it misses its gas savings goal by approximately 1.3 million therms. Consequently, CalPA asserts that PG&E fails to meet two of the three ABAL review criteria established in D. 18-05-041 - specifically that an ABAL must forecast a portfolio TRC in excess of 1.00 and meet energy, demand and gas savings goals - and must file a new business plan.

In its response filed February 19, 2019, PG&E states that:

- PG&E is correctly using the Commission's approved Cost-Effectiveness Tool (CET) and is unable to remove or modify the market effects adjustment to calculate cost-effectiveness and net energy savings without market effects.
- PG&E's gas forecast meets its gas savings goal, as Commission guidance "does not explicitly prohibit the inclusion of market effects in net savings estimates for forecasts or otherwise", leading PG&E to believe that the CET's inclusion of market effects in the calculation of net savings is reasonable
- PG&E's forecast meets cost-effectiveness thresholds for ABAL approval, both with and without the market effects adjustment, therefore negating the need for PG&E to file a new business plan¹.

Discussion

PG&E does not incorrectly use a market effects adjustment to increase its savings and cost-effectiveness forecasts, as this adjustment is embedded in the cost-effectiveness tool (CET) and PG&E correctly used the CET. The cost-effectiveness tool used by program administrators to submit portfolio forecast data on the California Energy Data and Reporting System (CEDARS) is administered by the Commission. In the aftermath of D. 12-11-015, Commission staff (not utilities) was responsible for developing the CET in adherence with Commission guidance on a market effects adjustment as interpreted at the time.

While it is unclear whether Commission guidance on a market effects adjustment has been interpreted in the manner most consistent with the relevant Decisions, the tool has been used equally by all program administrators and stakeholders.

To date, ABALs for SoCalGas, SDG&E, 3CREN, SoCalREN and BayREN have all been approved based on forecasts submitted via CEDARS that include the 5 percent market effects adjustment. It is inappropriate and inconsistent to review one set of ABALs using the current iteration of the CET but subject PG&E's ABAL to a different iteration of the CET.

Energy Division staff will work with program administrators and stakeholders, within the scope of a formal proceeding if significant evidentiary or policy analysis is required as appears to be the case at this point, in a review of the CET and Commission guidance on the market effects adjustment in order to have an updated CET in place prior to the next round of ABAL filings in September 2019.

PG&E's On-Bill Finance Alternative Pathway claims savings with no approved workpaper

In its October 4, 2018 protest, CalPA states that PG&E's On-Bill Finance-Alternate Pathway (OBF-AP) forecasts energy savings without an approved workpaper with cost-effectiveness inputs and savings forecasts and did not comply with Energy Division's direction.¹⁶

In its response PG&E states that the OBF-AP does not require an approved workpaper because program forecasts assume that cost-effective savings will come predominately from custom projects.¹⁷ PG&E adds that workpapers substantiate deemed measure savings and not custom measure estimates and because OBF-AP predominately supports custom projects, workpapers are not required to forecast custom savings estimates.

Discussion

The Commission's rules for custom projects review do not require approved workpapers in order to claim savings. PG&E's OBF-AP loans target the custom projects market; therefore, Energy Division rejects CalPA's claim that OBF-AP should not be allowed to claim savings without an approved workpaper and will allow PG&E to forecast savings for projects that go through the OBF-AP program using custom savings estimates. However, when OBF-AP loan projects install measures that have approved workpapers or DEER values, PG&E must use those approved savings estimates.

PG&E should substantiate their forecasted energy savings and cost effectiveness for OBF-AP

In its November 5, 2018, protest, CalPA states that PG&E's forecasted TRC of 6.01 for OBF-AP is implausibly high.¹⁸ CalPA acknowledges that while OBF-AP has no associated incentive costs, there are measure costs associated with each financed project.¹⁹ CalPA argues that since OBF-AP's TRC ratio includes measure costs, the program's TRC ratio should reflect the cost-effectiveness of the measures eligible for OBF, which presumably include many of the same measures that are incentivized in PG&E's energy efficiency portfolio. However, OBF-AP TRC ratio is the highest of any sub-program in PG&E's entire EE portfolio, by a wide margin.²⁰ In addition, CalPA claims that not only did PG&E lack any similarly cost-effective *programs*, no other *measures* in PG&E's entire portfolio have a TRC ratio comparable to OBF-AP.²¹ CalPA concludes that for OBF-AP to have such a high cost-effectiveness, OBF-AP must be relying only on measures that are far more cost effective than those incentivized in any other sub-program in PG&E's portfolio, which CalPA argues is not credible.

CalPA also questions the validity of savings forecasts for PG&E's OBF-AP. According to CalPA, the OBF-AP accounts for 11 percent of PG&E's total kilowatt-hour (kWh) savings forecast and 21 percent of its

¹⁶California Public Advocates protest to MCE, PG&E, SCE, SDG&E and SoCalGas ABALs in proceeding R.13-11-015, October 11, 2019, pg 2.; and email from Peter Franzese to PG&E, October 1, 2018: "PAs must base their 2019 savings forecasts entirely on existing and Commission-approved workpaper values as of 9/4/2018. In the supplemental filing, please present forecasts that are based entirely on Commission-approved workpaper values as of 9/4/2018."

¹⁷ PG&E response to CalPA protest, October 11, 2018, pg 2.

¹⁸ CalPA protest to PG&E Supplemental ABAL 4011-G-A/5375-E-A, November 5, 2018, pg 3.

¹⁹ Ibid.

²⁰ CalPA points out that at the time of their protest the program with the second highest TRC ratio is Residential Primary Lighting, with a TRC ratio of 2.8. CEDARS – PG&E 2019 Program List.

²¹ CalPA protest to PG&E Supplemental ABAL 4011-G-A/5375-E-A, November 5, 2018, pg 3.

total therm savings forecast in 2019.²² PG&E's net electricity savings forecast for OBF-AP of 63 million kWh makes the sub-program the third largest source of electricity savings in PG&E's portfolio, excluding codes and standards advocacy.²³ In terms of gas savings, PG&E expects this program to produce the second-largest savings in the portfolio (excluding codes and standards advocacy), with forecast net savings of 3.9 million therms.²⁴ CalPA concludes that while Energy Division directed PG&E to substantiate the savings for financing,²⁵ PG&E had not provided information or analysis that supports the cost-effectiveness and savings projections for OBF-AP.²⁶

In its response, PG&E acknowledges CalPA's concerns regarding OBF-AP and agrees to review program planning inputs and supporting analysis in a supplemental ABAL.²⁷ PG&E also states that it may alter its portfolio forecast if the review warrants an adjustment to the OBF-AP cost-effectiveness and savings forecast.²⁸

On January 23, 2019, PG&E filed supplemental ABAL 4011-G-B/5375-E-B. The supplemental updated cost-effectiveness assumptions for OBF-AP, specifically: higher incentive and measure costs, a reduction in the program's net-to-gross ratio from 0.9 to 0.6, changes to the effective useful life, and a different set of load shapes.²⁹ These changes to OBF-AP decrease net kWh and kW forecast savings from the first supplemental forecast by 25 percent each, while the net therm forecast increases by 56 percent and the OBF-AP forecast TRC ratio drops from 6.0 in the first supplemental to 1.6.³⁰

On February 12, 2019, CalPA filed its protest of supplemental ABAL 4011-G-B/5375-E-B.³¹ CalPA argues that PG&E's gas savings forecast is implausible as PG&E was assuming Commission approval of PG&E's Petition for Modification (PFM) to increase the cap on OBF loans originally established in D.09-09-047. CalPA notes that PG&E's supplemental ABAL forecasts a 56 percent increase in net gas savings compared to PG&E's OBF-AP therm savings forecast in the first supplemental filed on October 29, 2018. The second supplemental ABAL forecasts that 93 percent of the gas savings from the OBF-AP will come from large projects that requires the approval of the PFM.³² CalPA adds that even if the PFM is approved, this would not likely occur until the second or third quarter of 2019 and "the Commission has not yet issued a proposed decision (PD) on the PFM".³³

PG&E's response of February 20, 2019, states "a PD on the PFM was issued on February 8, 2019, granting PG&E's request to increase the loan cap for OBF." PG&E adds that approval of the PD's proposed increase in loan caps would enable PG&E to achieve their OBF-AP savings forecast. PG&E states its belief that it is reasonable to expect Commission approval of the PD that would allow loan caps to be raised by June 30, 2019.³⁴

²² CEDARS – PG&E 2019 Program List; PG&E Supplemental, pp. 18 (Table 10) and 20 (Table 12).

²³ CEDARS – PG&E 2019 Program List.

²⁴ CEDARS – PG&E 2019 Program List.

²⁵ Email from Peter Franzese to PG&E, October 1, 2018.

²⁶ CalPA protest to PG&E Supplemental ABAL 4011-G-A/5375-E-A, November 5, 2018 pg 4-5.

²⁷ PG&E response to CalPA protest to PG&E Supplemental ABAL 4011-G-A/5375-E-A, November 13, 2018, pg. 2.

²⁸ Ibid.

²⁹ PG&E AL 4011-G-B/5375-E-B, see Table 7 on pg 15.

³⁰ Ibid.

³¹ CalPA did not protest cost effectiveness in their February 12, 2019 protest filing.

³² CalPA protest to PG&E Supplemental ABAL 4011-G-B/5375-E-B, February 23, 2019, pg 6.

³³ Ibid, pg. 6.

³⁴ PG&E response to CalPA protest to PG&E Supplemental ABAL 4011-G-B/5375-E-B, February 20, 2019, pg. 2.

CalPA also questions the appropriateness of PG&E's forecast that 33 percent of the program savings will come from "projects yet to be identified." PG&E's response states that the "projects yet to be identified" will largely be opportunities that program implementers or PG&E account representatives had previously identified, but been unable to move forward due to the customer's inability to allocate appropriate capital, and PG&E's current inability to provide an attractive financial instrument for large commercial and industrial projects that typically have higher costs and longer construction and payback periods. PG&E intends to address these hurdles with increasing loan caps and change of terms in order to actively seek out these large projects that were previously shelved or delayed because of the OBF loan cap.³⁵ PG&E adds that it has already taken steps to promote the OBF-AP non-incentive finance offering. In early February 2019, PG&E's energy efficiency team informed and trained their account representatives about the OBF non-incentive offering as a tool to drive therm savings. PG&E also presented to members of California Large Energy Consumers Association in September 2018 about PG&E's OBF non-incentive offerings and was scheduled to present again in late February 2019.³⁶

Discussion

Energy Division agrees with CalPA that the savings for the OBF-AP program as filed in the original and supplemental ABAL did not look feasible. However, the updated forecasts in the second supplemental appear achievable and thus Energy Division rejects the CalPA protest that the OBF-AP savings forecast is "implausible." D.19-03-001, which is the decision that increased the loan limits for PG&E's on-bill finance program, was approved by the Commission on March 14, 2019, and granted PG&E's request for larger incentive caps for the OBF program. Because the PFM was approved three and a half months before June 30, 2019, Energy Division rejects the assertion by CalPA that the forecasted gas savings in the second supplemental are implausible since PG&E should have more than enough time in 2019 to achieve their saving goal due to the adoption of the decision.

Energy Division also rejects CalPA's assertion that PG&E's forecasts are not appropriate because 33 percent of the savings come from yet to be identified projects. We find PG&E's argument of the existing project opportunities, such as those projects PG&E was unable to move forward with due to loan caps, and new opportunities projected to result from more attractive loan terms and larger loan caps, to be sufficient.

OBF-AP is a new approach and has fairly high forecasted TRC and savings. Energy Division will therefore closely monitor the performance of the program in 2019, specifically looking at whether the program's energy savings claims meet PG&E's forecasts. Ordering paragraph 4 of D.19-03-001 directs PG&E to "file a status report annually, as part of the Energy Efficiency Annual Reports, with the Commission showing default rates, energy savings, status of efforts to replace incentives with loans, and the degree of free ridership, if any, associated with energy efficiency projects financed through the OBF program..." Energy Division also expects ongoing communication from PG&E regarding the success or failure of OBF-AP, particularly in light of the new higher loan limits.

Energy Division expects OBF-AP to achieve the forecasted TRC and savings, as this program is very important for PG&E to meet its threshold goals for evaluated TRC and savings. Approval of this ABAL provides PG&E with the opportunity, and requirement, to demonstrate its approach to OBF and gather data proving its forecasts are reasonable. Approval of PG&E's next ABAL will be based on data that

³⁵ Ibid, pg. 5.

³⁶ Ibid, pg. 6.

becomes available from the work that stems from this year's approval and from the opportunity and requirements of D.19-03-001. PG&E should use its work in 2019 to build its data-based proof of its savings and TRC forecasts. Should a lack of data-based evidence for savings and TRC forecasts continue or should there be a large shortfall in the OBF-AP program's claimed vs. forecasted TRCs and/or savings, PG&E should expect rejection of their 2020 ABAL filing, especially if the program is again a large contributor towards portfolio the savings goals.

The reasonableness of PG&E's lighting forecast

CalPA's protest argues that PG&E's forecast portfolio TRC of 1.04 in supplemental ABAL 4011-G-B/5375-E-B relies on a "large and unsubstantiated forecast for electrical savings from its Primary Lighting program", which features a budget nearly 7 times higher than in 2018. CalPA argues that the Commission should determine that PG&E's forecast is unreasonable for the following reasons:

- PG&E proposes a dramatic change in its Primary Lighting forecast, relying on an extremely high volume of efficient lighting installations in 2019 without any supporting evidence;
- PG&E's delayed second supplemental ABAL, filed in late January 2019 and likely approved in March 2019, leaves PG&E with less than a full-year in which to implement the program and achieve these elevated forecasts
- PG&E acknowledges the risk associated with an increased reliance on a single measure and that forecast savings may not materialize on an evaluated basis.³⁷

In its response to CalPA's protest of February 12, 2019, PG&E explains "as a result of the OBF Alternative Pathway program changes, PG&E is forecasting an additional \$12 million of incentives in the Primary Lighting program, PG&E's most cost-effective program." PG&E also states that the net portfolio budget increase is only \$10 million due to other PG&E, REN, and CCA budget changes.

In further response to CalPA's protest, PG&E states that it "believes it will be able to deliver on this forecast because of sufficient demand in the lighting market and clarifies that its forecasted incentive budget of \$14 million is likely a conservative estimate compared to what the program could deliver in response to lighting market demand."³⁸

In terms of lighting volumes, PG&E forecasts an uptake of 6.9 million units. PG&E also states that the 2019 Primary Lighting program lamp volume will be primarily composed of reflectors and decorative lamps. However, PG&E has not provided any actual market data or saturation study projections to support its assertions.

PG&E responds to CalPA's concerns about the abbreviated program year by stating that the Primary Lighting program is "sufficiently flexible to influence mid-year adjustments to manufacturer sales volumes."

PG&E also states that the "Point of Sale" method requires participating retailers to provide sales data to the manufacturers in a trackable and verifiable way. However, PG&E does not explain how

³⁷ PG&E AL 4011-G-B/5375-E-B, pg. 25

³⁸ PG&E reply to protest of al 4011-G-B/5375-E-B, pg 7.

manufacturer shipments of a higher-than-normal number of units to the participating retailers will necessarily result in larger number of sales.

Discussion

PG&E has not provided any data that substantiates that there are at least 6.9 million sockets within its territory that do not already have a high efficiency product for the proposed measure groups. While PG&E's response to CalPA's protest does not have sufficient data in support of program assumptions, PG&E's need to lean on the Primary Lighting Program is understandable in that it allows PG&E to ramp up other long-term programs in its portfolio and reach the required cost-effectiveness threshold. Consequently, CalPA's protest is rejected considering the need to view PG&E's portfolio and the approach more holistically.

The founding premise of ratepayer-funded programs is to drive increased energy efficiency beyond what would normally take place. Therefore, if the PAs are confident in their ability to increase market penetration of certain products, Energy Division does not believe it is appropriate to prevent this effort. At the same time, the Commission must balance market realities with ambition. Therefore, the additional funds requested for the Primary Lighting Program are approved on the condition that:

- With its first monthly report filing following the approval of its ABAL, PG&E shall provide an annual sales plan for the remainder of the year backed with market sales data,³⁹ for each of the lighting measures delivered through the Primary Lighting Program. The plan must include monthly sales projections based on year to date actual sales data from "Point of Sale" retailers and/or other delivery channels used in the program. The plan must also explain what steps PG&E is taking to ensure that there is minimal free ridership in the program to increase the probability of the evaluated TRC not being significantly less than the claimed TRC.
- For each monthly report filing thereafter following the approval of this supplemental ABAL, PG&E shall provide verifiable data of number of units sold (which more accurately reflects savings achievable from program than number of units shipped) within its Primary Lighting Program in that month. PG&E shall upload the data on a publicly accessible website and share the weblink, along with a link to its monthly CEDARS filing with all appropriate listservs.

The return of unspent and uncommitted funds from prior years to ratepayers

In its protest filed February 12, 2019, CalPA disagrees with PG&E's request to hold on to approximately \$157 million in unspent and uncommitted ratepayer funds from previous program years. CalPA asks the Commission to require PG&E to update its 2019 ABAL as well as its 2019 Annual Gas and 2019 Annual Electric True-up Advice Letters to reflect the return of \$157 million (\$104.4 million from pre-2018 and \$52.6 million from 2018) in unspent and uncommitted energy efficiency funds to ratepayers, per prior Commission guidance in D. 12-11-015 and D. 14-10-046.¹

³⁹ We understand that no market data is perfect. However, since PG&E is hinging heavily on this program to meet its portfolio TRC, PG&E must then also undertake the additional work to collect historic and current sales data from third party vendors and/or retailers

Discussion

PG&E's 2019 budget spending request is for \$319,511,700, while unspent and uncommitted funds accrued through December 31, 2018 are \$198,295,672. On March 29, 2019, PG&E filed substitute sheets to ABAL 4011-G-B/5375-E-B, in which it corrected the amount of unspent and uncommitted funds to be returned to ratepayers via a reduced 2019 budget recovery request. Per Table 3 in the substitute sheet, PG&E will return the electric portion of the unspent and uncommitted funds accrued through December 31, 2018, to ratepayers in the amount of \$165,645,126, thereby reducing PG&E's 2019 budget recovery request to \$153,866,574 and bringing PG&E's total budget recovery request, which includes funding for RENs and CCAs, to \$186,491,441. Unspent and uncommitted gas funds in the amount of \$32,650,546 will be returned to ratepayers as soon as feasible via the Annual Gas True-up process and no later than 2020.

Protest of City and County of San Francisco, East Bay Energy Watch and Silicon Valley Energy Watch (the Joint Parties) and the Local Government Sustainable Energy Coalition (LGSEC) and Reply Comments

PG&E's sweeping cuts to the Local Government Partnerships is beyond the scope of the advice letter process

LGSEC argues that the sweeping cuts proposed by PG&E's ABAL 4011-G/5375-E are beyond the scope of the AL process including: the IOUs' plan that all future Local Government Partnerships (LGPs) will result from competitive solicitation and be implemented by third parties; that all LGPs must be cost-effective under the TRC; and, that non-resource LGPs will be severely curtailed or eliminated.⁴⁰ LGSEC adds that these changes are far beyond the scope appropriate for dispositions by Energy Division and have not been reviewed and approved in any previous Commission proceeding.⁴¹ LGSEC also states that instead of working with LGPs, the IOUs have begun implementing drastic program funding cuts, eliminations or downsizing longstanding programs such as PG&E's Energy Watch.⁴²

Likewise, the Joint Parties protest claims that PG&E's ABAL raises issues that are beyond the scope of the Advice Letter process, because the impact of the ABAL and related administrative actions will result in large scale reductions to LGPs and may eliminate LGPs after 2020.⁴³ The Joint Parties recognized that D.18-05-041 acknowledged that some LGP programs could be reduced or eliminated due to cost-effectiveness concerns, but the Decision did not authorize the elimination of the LGP sector, nor has the Commission reviewed, addressed or authorized such action in any formal proceeding or decision.⁴⁴ Therefore, the Joint Parties believe the foreseeable impact of the ABAL is beyond the scope of the advice letter process.⁴⁵

⁴⁰ LGSEC protest to the ABALs of PG&E, SCE, SDG&E, SoCalGas in Proceeding R.13-11-005, pgs 1 and 2.

⁴¹ LGSEC protest, pg 2.

⁴² LGSEC protest, pg 3.

⁴³ ABAL, at. 23, Table 8. The ABAL cuts Public Sector programs by 44 percent even though the Total Resource Cost ("TRC") requirement for the ramp years of 2019-2022 is 1.0. With the adjustment of the TRC to 1.25 in 2023, it is likely that LGP programs will be cut even further or possibly eliminated after the ramp year period.

⁴⁴ Joint Parties protest of PG&E Advice Letter 4011-G/5375-E, PG&E's 2019 Energy Efficiency Annual Budget Advice Letter in Compliance with Decisions 15-10-028 and 18.05-041 in Proceeding R.13-11-005, pg 4.

⁴⁵ Joint Parties protest, pg 7.

The Joint Parties point to the section of D.15-10-028 (below) to further support their claim that PG&E's proposed cuts to LGPs' budgets are inappropriate for its ABAL:

"The annual review we contemplate here should be relatively ministerial. However, if a PA departs in significant ways from that PA's most recent budget, the PA can expect a higher degree of scrutiny from Commission Staff, and possibly a suspension of the advice letter."⁴⁶ The ABALs must include a discussion of proposed program changes and specifically, if a PA proposes to significantly reduce a program "i.e., more than a 40 percent change in funding"⁴⁷

Finally, the Joint Parties claim that PG&E's explanation for the budget cuts to LGPs does not comply with the Commission's requirements for specific, detailed information on significant changes to programs in the ABALs and certainly does not provide sufficient information to "facilitate Commission staff and stakeholder review of the ABAL submission and understanding of future portfolio considerations and composition."⁴⁸

In response PG&E states that the primary reason for the budget reduction for LGPs is to improve PG&E's portfolio cost-effectiveness.⁴⁹ PG&E adds that it is confident that these cuts and others were both necessary and reasonable in the context of the overall portfolio needs and individual LGP's performance.⁵⁰ In its reply, PG&E adds that it has never proposed, nor intend to propose, to categorically eliminate LGPs in their service territory.⁵¹

Discussion

Energy Division notes that according to D.18-05-041 the "standard of review for staff disposition of the ABALs does not include review of program administrators' decisions on reducing, cancelling, expanding or adding individual programs or program areas."⁵² We also note that D.15-10-028, which adopted the rolling portfolio cycle, clearly states that the ABAL is the place where the PAs would file an annual report on "portfolio changes, annual spending and fund shifts (OP 4)."⁵³ Thus, Energy Division rejects the Joint Parties and LGSEC's protests that argue that the reductions to PG&E's LGP's budget are beyond the scope of the AL process.

Regarding the specific cuts themselves, Energy Division disagrees with the assertion by the Joint Parties that PG&E's explanation for the budget cuts to LGPs does not comply with the Commission's requirements for specific, detailed information on significant changes to programs in the ABALs. After reviewing pages 29-32 of PG&E's ABAL, which explains the budgetary and programmatic changes to PG&E's Public Sector, which include the LGPs programs, staff has determined that PG&E provided

⁴⁶ D.15-10-028, pg 60.

⁴⁷ D.18-05-041, pg 138.

⁴⁸ D.18-05-041, pg 127.

⁴⁹ PG&E Reply to Protests from the Public Advocates Office, the Utility Reform Network, the Local Government Sustainability Coalition, and the Joint Parties of Bay Area local government partners regarding Advice Letter 4011-G/5375-E (PG&E's 2019 Energy Efficiency Annual Budget Advice Letter in Compliance with Decision 15-10-028, Ordering Paragraph 4) in Proceeding R.13-11-005, pg 8.

⁵⁰ PG&E reply to protests pg 8.

⁵¹ PG&E reply to protests pg 14.

⁵² D.18-05-041, pg 138.

⁵³ D.15-10-028, OP 4.

adequate detail to satisfy the requirements in D.18-05-041.⁵⁴ We also accept PG&E's explanation that it needed to make cuts to the LGPs and other programs to achieve the threshold cost effectiveness forecast.

LGP Program Transitions

LGSEC states that the IOUs' ABALs ignore the Commission mandate in D.16-08-019, OP 14 which states "PA's shall ensure a smooth transition between existing energy efficiency program activities and the changes outlined in this decision, to be proposed in the business plans due January 15, 2017, minimizing program disruptions and avoiding any funding hiatus for ongoing efforts or partnerships."⁵⁵ LGSEC believes both the budget cuts to the LGP programs and move to competitively bid out LGPs to third-party competitive solicitation are out of compliance with OP 14 of D.16-08-019.⁵⁶

The Joint Parties have two concerns with LGP Program transition. The Joint Parties state the IOUs verbally informed LGPs in stakeholder meetings that the LGPs would be required to bid into third-party solicitations for funding in 2020 and beyond. The Joint Parties are concerned with this as well as the IOUs' Joint Motion for Approval of Standard Contract for Local Government that a "pay for performance" contracting structure is preferred.⁵⁷

First, the Joint Parties note that LGPs have never been required to bid into competitive solicitations and instead have been treated as a unique category of programs. The Joint Parties point to D.05-01-055 which states, "it would be counterproductive to require open bids in instances where, for example, current or future partnerships between the IOUs and local governments can take advantage of the unique strengths that both partners bring to the table to deliver cost-effective energy efficiency services."⁵⁸ The Joint Parties add that they are not suited for third-party solicitations, since LGPs were not created to pursue the low-hanging fruit with an eye to making a profit.⁵⁹ They add that the Commission found that to be true stating, "Increasing and streamlining support of the LGPs is an effective an [sic] essential component in serving hard-to-reach and disadvantaged communities."⁶⁰

Second, the Joint Parties state that the IOUs' strong preference for pay-for-performance contracts that are included in the IOUs' proposed standard contract for LGPs puts LGPs at a major disadvantage vis-à-vis private companies.⁶¹ They state that local governments are prohibited by the State Constitution from making gifts of public funds and it is not clear that local governments can enter into pay-for-performance contracts.⁶² The Joint Parties add that under a pay-for-performance structure, a local government must expend public resources but may ultimately be denied compensation for those resources. They add that local governments may be legally vulnerable if they entered into such

⁵⁴ D.18-05-041, pg 138 states "for programs the PA proposes to significantly expand or reduce (i.e., more than 40 percent change in funding): a reason for these changes, and specifically what changes are being made, e.g., changes to design, incentive levels, eligible measures, and/or eligibility requirements, etc."

⁵⁵ D.16-08-019, OP 14.

⁵⁶ LGSEC protest, pg 2.

⁵⁷ Joint Motion for Approval of Standard Contract for Local Government in A.17-01-013, pg 11.

⁵⁸ D.05-01-055, FoF 34.

⁵⁹ The Joint Parties protest, pg 5.

⁶⁰ D.18-05-041, FoF 72.

⁶¹ The Joint Parties protest, pg 6.

⁶² California Constitution, Art. XVI, §6.

agreements without alternative funding.⁶³ Finally, the Joint Parties add that local governments have stringent budgeting and risk management policies which also make pay-for-performance contracting difficult.⁶⁴

PG&E replies that it is inaccurate for the Joint Parties to claim that PG&E intend for all LGPs to go through a competitive solicitation. PG&E has stated publicly that they intend to competitively bid out all *resource* activities such as program implementation, “but to sole-source *non-resource* activities such as many of those performed by LGPs.”⁶⁵

Discussion

As noted in the previous section of this disposition, the “standard of review for staff disposition of the ABALs does not include review of program administrators' decisions on reducing, cancelling, expanding or adding individual programs or program areas.” Staff interprets the plain language of this decision to include IOU decision-making on whether to competitively solicit programs to third parties, award sole source contracts to third parties or continue to administer their own programs, provided that the IOUs comply with the schedule by which the IOUs shall allow third parties to design and implement programs provided in OP 1 of D.18-01-004. Thus, Energy Division rejects the claim by LGSEC that the third-party solicitation proposal by the IOUs is out of compliance with OP 14 of D.16-08-019 or D.05-01-055 as the Joint Parties claim.

Finally, we acknowledge the Joint Parties' concern that the IOUs' Joint Motion for a Standardized Contract with LGPs emphasizing pay-for-performance contracts may not be ideal for LGPs. However, any issue regarding the IOUs' Joint Motion for a Standardized Contract with LGPs should be addressed through that motion, not the ABAL review process (especially given the recent ALJ ruling seeking party input on the IOU's Joint Motion for a Standardized Contract with LGPs⁶⁶).

IOUs failed to work with the LGPs on Cost-Effectiveness

LGSEC states that despite the language in D.18-05-041 OP 30 requiring the IOUs to work with local governments to improve cost effectiveness, compliance with this OP has not yet occurred.⁶⁷

The Joint Parties note that with regard to PA administrative costs, the Commission stated:

“[W]e find it reasonable to allow time for a thoughtful examination of energy efficiency cost-effectiveness policy as it related to the Commission's other energy efficiency policy goals, particularly in light of issue such as [San Francisco's] asserting that PG&E imposed administrative costs constituting 30 percent of the San Francisco Energy Watch LGP budget.”⁶⁸

⁶³ The Joint Parties protest, pg 6.

⁶⁴ The Joint Parties protest, pg 6.

⁶⁵ PG&E reply to protests, pg 14.

⁶⁶ On February 28, 2019, ALJ Kao mailed “Administrative Law Judge's Ruling Regarding Joint Motion for Approval of Standard Contracts for Local Government Partnerships.”

⁶⁷ LGSEC protest, pg 3

⁶⁸ D.18-05-041, pg 147.

The City and County San Francisco estimates that the administrative costs imposed by PG&E in the ABAL are approximately 22 percent of the SF Energy Watch budget.⁶⁹ While D.18-05-041 required the IOUs to work with the local governments to improve cost effectiveness, the PG&E administrative costs were never discussed during the development of the ABAL.

Discussion

Energy Division is confident that the IOUs working together with LGPs to leverage their unique strengths will allow IOUs to achieve more cost-effective savings from LGP programs as directed in OP 30 of D.18-05-041. Furthermore, program administrators should include LGPs in their portfolio where the LGPs further the ability to support California's aggressive energy and climate goals. Energy Division staff reviewed PG&E's stated efforts to work with local governments on improving cost-effectiveness. However, Energy Division refers to Section 7.2 of D.18-05-041, which includes the criteria for approving the ABALs. We note that this section does not require the IOUs to include a plan for working with their local governments to improve cost-effectiveness as part of Energy Division's review of the IOUs' ABALs. In addition, OP 30 of D.18-05-041 does not include a date for compliance with this requirement or state how the IOUs should demonstrate compliance with the requirement. Thus, we reject LGSEC's protest, but remind PG&E that they and the other IOUs must demonstrate compliance with D.18-05-041 OP 30 by working with local governments on cost-effectiveness.

Regarding the Joint Parties protest, Energy Division is concerned that administrative costs attributed to LGPs are opaque to the LGPs.⁷⁰ D.09-09-047 OP 13 states LGPs are excluded from the 10% cap on administrative costs.⁷¹ IOUs are to provide transparency and consistency and appropriateness in treatment of administrative costs with commission policy through the workshop process and should any inconsistency and inappropriate placement of IOUs' costs into LGP administrative costs be identified, affected stakeholders should enter this into the record of R.13.11.005 proceeding pertaining to accounting and funding issues scope therein. Compliance with OP 30 of D.18-05-041 or the dicta on page 147 related to the LGP's high administrative costs are not a criterion for review before Energy Division can approve an IOU's ABAL. If the Joint Parties and LGSEC have concern over compliance with OP 30 or the previous Commission decision to eliminate LGP administrative cost from the overall IOU Administrative cost cap, they should file a motion in the proceeding to address this concern.

IOUs did not quantify non-energy benefits provided by LGPs

LGSEC claims the IOUs have not complied with OP 30, which orders the IOUs to work with the local governments to improve cost effectiveness or quantify co-benefits and local economic benefits for hard-to-reach and disadvantaged communities.⁷² The Joint Parties agreed and stated that PG&E failed to quantify co-benefits and local economic benefits for LGPs.

PG&E responds that neither the CPUC nor PG&E currently have a method for quantifying LGP non-energy benefits, and non-energy benefits unique to LGPs are not accounted for in the total resource cost test and thus do not contribute to program or portfolio cost-effectiveness.⁷³

⁶⁹ Note, SF Energy Watch is the LGP run by the City and County of San Francisco.

⁷⁰ Joint Parties protest pg 7.

⁷¹ D.09-09-047, OP 13, A states "Administrative costs for utility energy efficiency programs (excluding third party and/or local government partnership budgets) are limited to 10% of total energy efficiency budgets."

⁷² LGSEC protest pg 3.

⁷³ PG&E reply to protests, pg 10.

Discussion

Energy Division again notes any issue regarding the IOUs' Joint Motion for a Standardized Contract with LGPs should be handled through that motion and not the ABAL review process.

Energy Atlas

LGSEC claims that the IOUs did not include sufficient detail on the expansion of Energy Atlas, designate a lead utility or provide specific information on funding allocations for Energy Atlas.⁷⁴

Discussion

In the IOUs' supplemental ABALs filed on October 29, 2018, the IOUs selected SCE as the utility lead for Energy Atlas, provided an anticipated budget and a projected timeline for awarding the contract to a third-party implementer, and suggest that the implementer will be awarded a contract and begin expansion in 2020. Thus, the supplementals have provided more than an adequate amount of detail on Energy Atlas to satisfy LGSEC's protest. Energy Division rejects the protest by LGSEC that the IOUs have not provided sufficient details on the expansion of Energy Atlas.

PG&E's reductions to LGP programs conflicts with the SB 350 mandate to develop specific strategies to maximize EE savings in disadvantaged communities.

In their comments, the Joint Parties remind Energy Division that the SB 350 Legislation directed the Energy Commission to produce two reports assessing specific strategies to reduce barriers and maximize energy savings in disadvantaged communities, known as the "Low Income Barriers Studies"⁷⁵ (the first report was adopted by the Energy Commission on December 14, 2016).⁷⁶ The Joint Parties also point out that as the Commission recognized, LGP programs are focused on serving these communities and are a critical part of the state's goal to serve disadvantaged and hard-to-reach communities: "increasing and streamlining support of the LGPs is an effective and essential component in serving hard-to-reach and disadvantaged communities."⁷⁷ The Joint Parties add that D.18-05-041 directs the IOUs to "conform their portfolios with the State's overall efforts toward maximizing the contribution of energy efficiency in disadvantaged communities."⁷⁸

The Joint Parties state the combined impact of the budget cuts, changes to cost-effectiveness metrics such as the net-to-gross ratio for hard-to-reach direct install programs proposed by the draft of DEER resolution E-4952, and the lack of support for LGP programs will mean that small businesses, hard-to-reach and disadvantaged customers will be not just under-served but left behind. They believe this result is in clear opposition to the State's important policy goal of ensuring that the benefits of ratepayer funded energy efficiency programs be spread equally and equitably across all ratepayers.

⁷⁴ LGSEC protest, pg 3.

⁷⁵ "SB 350 Low Income Barriers Study, Part A, located at [file:///C:/Users/nbstr/AppData/Local/Packages/Microsoft.MicrosoftEdge_8wekyb3d8bbwe/TempState/Downloads/TN21483020161215T184655_SB_350_LowIncome_Barriers_Study_Part_A_Commission_Final_Report%20\(3\).pdf](file:///C:/Users/nbstr/AppData/Local/Packages/Microsoft.MicrosoftEdge_8wekyb3d8bbwe/TempState/Downloads/TN21483020161215T184655_SB_350_LowIncome_Barriers_Study_Part_A_Commission_Final_Report%20(3).pdf)

⁷⁶ Public Utilities Code §§913.10, 913.11. SB 350 also required the Energy Commission to conduct a study on barriers to participation by low income customers in energy efficiency and weatherization programs,

⁷⁷ D.18-05-041, FoF 72.

⁷⁸ D.18-05-041, pg 53.

PG&E's response to the Joint Parties states that even though reductions were made to the *lead local partner* budgets, the proposed budgets of *implementers* that bring in most energy savings for LGPs, including for savings for hard-to-reach customers, have not changed significantly.⁷⁹ PG&E adds that the local government partnership channel should not be assumed to be the only channel capable of serving hard-to-reach customers.⁸⁰ PG&E points out that most of the LGPs do not use in-house staff to deliver energy efficiency services, but instead hire an implementer to deliver direct install services.⁸¹ PG&E concludes that the cuts made were to the Government Partnership administrative budgets, but not implementer budgets for delivering savings, except in the case of program underperformance.⁸²

Discussion

The Joint Parties protest relates to PG&E's budget cuts to LGPs, which staff has already noted is not within the scope of staff ABAL review, per D.18-05-041. Nonetheless, staff acknowledges the Joint Parties' concern that reductions to PG&E's LGP budgets could conflict with the SB 350 mandate to address barriers for disadvantaged community customers to adopt energy efficiency.⁸³ However, as PG&E correctly points out, LGPs are not the only channel for delivering energy efficiency to disadvantaged and hard-to-reach customers. In addition, PG&E's resource programs to serve disadvantaged communities and hard-to-reach customers, such as direct install offerings, are not necessary going away, but instead are being competitively bid rather than sole-sourced to the local government administering an LGP. This change does not equate to a reduced realization of savings from energy efficiency to disadvantaged communities.

Finally, the Joint Parties note that the then-Draft DEER Resolution E-4952-proposed net-to-gross ratios for hard-to-reach customers would be a barrier to serving these customers. Energy Division notes that this issue is moot as the adopted DEER Resolution E-4952, does not adopt new net-to-gross ratios for hard-to-reach customers.

Consequently, we reject the Joint Parties' protest both on process, since the standard for staff ABAL review does not include review of program administrators' decisions on program reductions, and on merit, since the argument that SB350 mandates will not be met is flawed because it presumes only local government administered energy efficiency programs are capable of delivering savings to disadvantaged communities.

The Utility Reform Network Protest and Reply Comments

Over-reliance on savings from Home Energy Reports

On October 4, 2018, The Utility Reform Network (TURN) filed its protest of SDG&E, PG&E, SoCalGas, and SCE ABALS in which it expresses concerns regarding the IOUs' respective energy savings forecasts, the predominance of energy savings from Home Energy Reports, and how a failure to achieve savings from this behavior program may negatively affect the IOUs' respective portfolio TRCs for 2019.

⁷⁹ PG&E reply to protest, pg 12.

⁸⁰ PG&E reply to protest, pg 12.

⁸¹ PG&E reply to protest, pg 13.

⁸² PG&E reply to protest, pg 12.

⁸³ In the Joint Parties' October 4, 2018 protest of PG&E AL 4011-G/5375-e, PG&E's 2019 Energy Efficiency Annual Budget Advice Letter in Compliance with Decisions 15-10-028 and 18-05-041, the Joint Parties claim that between their LGP programs 70-90% of the customers they serve are considered hard-to-reach.

TURN does not ask the Commission to reject the IOUs' ABALs based on the reliance of behavior programs in the 2019 energy savings forecasts. Instead, TURN proposes that, if the Commission is "inclined to approve the 2019 ABALs of PG&E, SCE, SoCalGas and SDG&E," that the approval include the requirement that the IOUs submit a mid-year progress report on the performance of their behavior programs relative to their 2019 energy savings forecasts as presented in their respective ABALs.

In its response, PG&E asks the Commission to reject TURN's request for the IOUs to file a mid-year Tier 1 advice letter update on behavior programs, stating that an additional advice letter is unnecessary and burdensome, as the information TURN requests is available to all stakeholders in the monthly and quarterly reports that the IOUs file with the Commission on its public data website, the California Energy and Data Reporting System (CEDARS)⁸⁴.

PG&E also points to the California Energy Efficiency Coordinating Committee (CAEECC) discussions that will take place in July or August 2019 in advance of the 2020 ABAL filings as the more suitable venue for review of program administrators savings forecasts. Per Commission directive, program administrators must present drafts of their respective budget requests for 2020 and provide information portfolio- and program-level savings from prior and current years as part of the larger stakeholder review of the ABAL filings. SDG&E argues that TURN may request additional detail and reporting on Home Energy Reports within that larger discussion.

Discussion

The Commission requires the IOUs to file monthly and quarterly reports to CEDARS, a public data repository. The monthly reports provide program level information on gross and net savings achieved by a program in the given report month, as well as a year-to-date total for gross and net savings. The quarterly reports present a more refined variant of the same information presented in the monthly reports and represent the IOUs' "official" program savings claims for the quarter. TURN has full access to these data going back to the inception of the Home Energy Reports program in 2012.

Lastly, the Commission has evaluated various IOU Home Energy Reports programs from the 2010-2012 program cycle up to and through program year 2015; these evaluations are available on the CalMAC website (www.calmac.org), which is the repository of all Commission- and IOU-led evaluations (market, process and impact) dating back to the early 2000s.

Consequently, because of the abundance of program-level information for the IOUs Home Energy Reports program, including multiple impact evaluations from prior-program years, as well as the ABAL review process and parallel desire to reduce regulatory burden, the Commission rejects TURN's request that the IOUs file a mid-year advice letter on behavior program progress.

⁸⁴ See "PG&E Reply to Protests from the Public Advocates Office, The Utility Reform Network, the Local Government Sustainability Coalition, and the Joint Parties of Bay Area local government partners, regarding Advice Letter 4011-G/5375-E (PG&E's 2019 Energy Efficiency Annual Budget Advice Letter in Compliance with Decision 15-10-028, OP 4)" (PG&E Reply to Protest), pp. 7-8.

Please direct any questions regarding Energy Division's findings in this non-standard disposition to Peter Franzese for administrative costs, behavior programs, the ABAL workshop process, and PG&E's portfolio (peter.franzese@cpuc.ca.gov); Nils Strindberg for DEER issues and Local Government programs (nils.strindberg@cpuc.ca.gov); Christina Torok (christina.torok@cpuc.ca.gov) for Statewide programs; Abhi Wadhwa (abhilasha.wadhwa@cpuc.ca.gov) for lighting programs; and Kevin Feizi (kevin.feizi@cpuc.ca.gov) for Finance programs.

Sincerely,



Edward Randolph
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Cc: Service Lists R.13-11-005 and A.17-01-013

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January 23, 2019

Supplemental Advice 4011-G-B/5375-E-B
(Pacific Gas and Electric Company ID U 39 M)

Public Utilities Commission of the State of California

**Subject: Second Supplement: PG&E's 2019 Energy Efficiency Annual Budget
Advice Letter in Compliance with Decisions 15-10-028 and 18-05-041**

I. Purpose

This second supplement to Pacific Gas and Electric Company's (PG&E's) 2019 Energy Efficiency (EE) Annual Budget Advice Letter (ABAL) provides updates to the ABAL forecast, primarily the On-Bill Financing (OBF) Alternative Pathway and Primary Lighting programs, in addition to other minor portfolio changes. This supplemental advice letter also provides additional discussion of the OBF Alternative Pathway forecast assumptions, updated true-up and EM&V budget tables, and treatment of unspent funds. PG&E submitted the 2019 ABAL on September 4, 2018 and filed the first supplemental ABAL on October 29, 2018.¹

Based on the additional details and discussion provided below, PG&E respectfully requests that the Commission approve PG&E's 2019 ABAL with the changes presented in this second supplemental advice letter.

II. Discussion

This advice letter focuses largely on expectations for PG&E's financing programs. Keeping with existing portfolio trends, PG&E expects financing programs to play a larger

¹ PG&E's advice letter was submitted in compliance with the *Decision Re Energy Efficiency Goals for 2016 and Beyond* and *Energy Efficiency Rolling Portfolio Mechanics*, D. 15-10-028, Ordering Paragraph (OP) 4. PG&E's First Supplemental ABAL was submitted in response to California Public Utilities Commission (CPUC or Commission) Staff request on October 29, 2018.

role in its 2019 EE portfolio throughout the Rolling Portfolio period. PG&E believes its 2019 forecast meets Commission guidance to forecast such that that “*an energy efficiency expert would reasonably conclude the forecast will be achieved.*”²

The portfolio forecast presented in this advice letter contains a component in the OBF Alternative Pathway program that is reliant on the approval and implementation of PG&E’s petition to modify (PFM) D.09-09-047 to enable PG&E to provide large OBF loans up to \$4 million for cost-effective projects.³ Without approval of the PFM, PG&E will not be able to pursue the large-loan projects component forecasted under the OBF Alternative Pathway program, and PG&E would meet neither its gas savings goal nor the TRC requirement of 1.0 with the portfolio presented in this advice letter. Should the PFM’s approval be delayed, preventing PG&E to offer large-loan projects, PG&E would shift funds into incentive-only custom programs to achieve the gas savings goal, and into Primary Lighting to deliver a 1.0 TRC portfolio. The forecast achievability is discussed further in Section C of this advice letter.

Changes to the OBF Alternative Pathway forecast are detailed in section B.4 and summarized in Table 7. The OBF net kWh and kW forecast both decreased from the first supplemental forecast by 25 percent, while the net therm forecast has increased by 56 percent. These changes reflect new information on the many project opportunities available given that this second supplemental OBF forecast was refined nearly five months after the forecast was initially developed for the September 4, 2018 filing, as well as a drive for projects that can deliver therm savings. As discussed in Section B of this advice letter, PG&E expects a large shift away from incentive-based custom projects to OBF non-incentive projects, thus resulting in a significant increase in projects under the OBF Alternative Pathway, a move that is most prudent for ratepayers.

As a result of the OBF Alternative Pathway program changes, PG&E is forecasting an additional \$12 million of incentives in the Primary Lighting program, PG&E’s most cost-effective program.⁴ This change is necessary to maintain a portfolio TRC above 1.0 after OBF Alternative Pathway forecast changes (primarily a measure cost increase and a net-to-gross (NTG) decrease). The increase in Primary Lighting incentive spend results in a portfolio TRC of 1.04 without Codes and Standards (C&S) programs.

² D.18-05-041, p. 133

³ The PFM requests an increase to the maximum loan amount available per premise to \$250,000 for all customers, with up to \$4,000,000 available for projects that demonstrate high projected cost-effectiveness. Large loans would be offered to cost-effective projects through a new offering to be introduced in 2019 under the OBF Alternative Pathway subprogram.

⁴ PG&E is increasing its Primary Lighting incentive budget by \$12 million, however the net portfolio budget increase shown in Table 1 is only \$10 million (including MCE, BayREN, and 3C-REN budgets) due to other PG&E, REN, and CCA budget changes.

In addition to these changes, this second supplemental ABAL forecasts the continuation of Industrial Refrigeration Performance Plus Program (IRPP, PGE21036) to enable completion of a small number of remaining projects in 2019. Additionally, PG&E is closing the Small Petrochemical Energy Efficiency Program (SPEEP, PGE210213) because the implementer is discontinuing the program due to low savings achievement and decreased project prospects in the market. Table 1 shows how key parameters changed from the first supplemental and the second supplemental ABAL.

A comparison of portfolio budget, savings, and cost-effectiveness forecasts between PG&E's first and second supplemental ABALs is shown in Table 1.

Table 1: Comparison of First and Second Supplemental ABAL Portfolios^{1 5}

Forecast Component	First Supplemental ⁶	Second Supplemental
Budget ¹	\$343 million	\$353 million
Net GWh Savings ²	576	653
Net MW Savings ²	104	112
Net MMTherm Saving ²	19	19
Portfolio TRC excluding C&S	1.05	1.04
Portfolio PAC excluding C&S	1.44	1.56

¹ Budget amounts include PG&E, REN, and CCA portfolios.

² Savings include ESA estimates.

The Discussion section of this advice letter is organized as follows:

- A. Portfolio Summary
- B. On-Bill Financing Forecast
- C. Forecast Achievability
- D. Other Portfolio Adjustments
- E. Updated True-Up Tables
- F. Updated EM&V Budget Table
- G. Prior Years' Unspent Funds

⁵ PG&E adds the following caveat because it faces extraordinary uncertainties associated with wildfires that could significantly impact our ability to access capital on reasonable terms. These uncertainties have led and may continue to lead to credit rating downgrades and uncertain demand for PG&E Corporation and PG&E securities. These financial uncertainties could impact the amount of work PG&E can commit to financing. Should these financial uncertainties persist or should PG&E become unable to access capital on reasonable terms, execution of discretionary, non-safety projects, including those in this filing, may need to be reconsidered.

⁶ Supplemental Advice 4011-G-A/5375-E-A filed on October 29, 2018

A. Portfolio Summary

1. Budget

Table 2 provides PG&E's updated total 2019 EE budget of \$353 million. Table 3 provides an overview of PG&E's 2019 forecasted portfolio budget, savings, and cost-effectiveness resulting from OBF Alternative Pathway and Primary Lighting Program revisions, as well as other minor program adjustments.

Table 2: PG&E Total 2019 Energy Efficiency Budget^{1 7}

Program Name	2019 Budget (\$)
Residential	100,957,384
Commercial	68,111,272
Agriculture	14,596,507
Industrial	24,290,604
Public	40,464,830
Codes & Standards	20,811,065
Finance	6,496,567
OBF Loan Pool	13,500,000
Emerging Technologies	7,761,040
Workforce Education & Training (WE&T)	9,741,962
Programs Subtotal	306,731,232
Evaluation, Measurement, and Verification (EM&V) (PG&E only) ²	12,780,468
PG&E Subtotal	319,511,700
BayREN	24,033,828
MCE	6,946,418
3C-REN	2,833,090
Subtotal (Non-PG&E)	33,813,336
Total EE Budget	353,325,036

¹ Statewide Marketing, Education and Outreach (SW ME&O) was requested in A.12-08-007 and is not reflected in the total EE budget.

² BayREN, MCE, and 3C-REN's budgets include both EM&V funds requested for their use and EM&V funds allocated to the CPUC.

⁷ PG&E adds the following caveat because it faces extraordinary uncertainties associated with wildfires that could significantly impact our ability to access capital on reasonable terms. These uncertainties have led and may continue to lead to credit rating downgrades and uncertain demand for PG&E Corporation and PG&E securities. These financial uncertainties could impact the amount of work PG&E can commit to financing. Should these financial uncertainties persist or should PG&E become unable to access capital on reasonable terms, execution of discretionary, non-safety projects, including those in this filing, may need to be reconsidered.

Table 3: PG&E 2019 Budget and Savings Summary

Sector	Program Year (PY) Budget	PA PY FORECAST ENERGY SAVINGS (Net)		
		PA forecast kWh	PA forecast kW	PA forecast therms (MM)
Residential	\$100,957,384	288,539,048	51,263	5.3
Commercial	\$68,111,272	92,335,828	16,360	4.7
Industrial	\$24,290,604	36,593,528	4,424	2.4
Agriculture	\$14,596,507	30,377,733	9,145	0.5
Emerging Tech	\$7,761,040	na	na	na
Public ⁷	\$40,464,830	50,798,624	7,581	0.4
WE&T	\$9,741,962	na	na	na
Finance	\$6,496,567	46,827,490	8,897	6.1
OBF Loan Pool	\$13,500,000	na	na	na
IOU Subtotal	\$285,920,167	545,472,250	97,670	19.4
ESA Savings		107,235,450	14,739	(0.4)
IOU Total Program Savings (w/out C&S)		652,707,700	112,409	19.0
CPUC Program Savings Goal		524,000,000	100,000	19.0
Forecast savings as % of CPUC Program Savings Goal		125%	112%	100%
Codes and Standards	\$20,811,065	659,736,442	150,793	16.4
IOU EM&V	\$12,780,468			
IOU PY Spending Budget Request¹	\$319,511,700			
(LESS) IOU Uncommitted and Unspent Carryover Balance²	\$198,295,672			
IOU PY Budget Recovery Request³	\$153,866,574			
IOU Authorized PY Budget Cap (D.18-05-041)⁴	\$388,989,738			
MCE PY Budget Recovery Request (excl. CCA Uncommitted/Unspent Carryover)	\$6,454,930			
BayREN PY Budget Recovery Request (excl. REN Uncommitted/Unspent Carryover)	\$23,336,847			
3C-REN PY Budget Recovery Request (excl. REN Uncommitted/Unspent Carryover)	\$2,833,090			
Total PA (IOU+CCAs+RENs) PY Recovery Budget	\$186,491,441			
IOU Forecast PY TRC⁵	1.04			
IOU Forecast PY PAC⁵	1.56			
For reference only				
MCE EM&V PY Budget	\$277,857			
BayREN EM&V PY Budget	\$961,353			
3C-REN EM&V PY Budget	\$113,324			
EM&V PY PA Budget total	\$14,133,002			
PA Unspent Committed funds (from all prior PY through December 31, 2018)	\$69,580,750			

1 This is the amount by which Statewide 25% requirement will be measured, and what the IOU intends to spend in the PY, including carryovers.

2 The balance of all unspent and uncommitted reflects the total unspent uncommitted for all prior program years up to and through December 31, 2018. The electric portion of unspent funds is \$165,645,126 and will be returned to ratepayers in 2019. The gas portion of unspent funds is \$32,650,546 and will be returned to ratepayers in 2020, via the Annual Gas True-Up (AGT) filing that will take place in October 2019. The gas unspent and uncommitted funds cannot be returned to ratepayer mid-year in 2019 outside of the regular AGT cycle per D.04-08-010 (p.7), in which mid-year rate changes are only justified if failure to do so would result in a rate increase of 10% or more Jan 1, 2020. The rate impacts of failing to return the gas unspent funds do not meet the D.04-08-010 criteria for mid-year rate changes.

3 The amount of funds to be collected (budget recovery) for the Program Year. This total reflects PG&E's PY 2019 Spending Budget Request (\$319,511,700) less the electric portion of unspent funds (\$165,645,126) that will be returned to ratepayers in 2019. The gas portion of unspent funds (\$32,650,546) will be returned to ratepayers in 2020 and thus is not reflected as a deduction in this Budget Recovery Request total for 2019.

4 The IOU Authorized PY Budget Cap uses the "Total Program" budget from PG&E's approved Business Plan Table 1.5, plus an EM&V budget of \$15,559,690, or 4% of the IOU Authorized PY Budget Cap.

5 The portfolio TRC and PAC presented in this table are lower than the TRC and PAC calculated in CEDARS. See Section A.2 for more details.

6 The public-sector budget and savings in this table encompass all activity in the Government Partnership (GP) Programs. For future ABALs as well as program claims in 2019 and onward, PG&E will determine a method for allocating GP program budgets and savings across to appropriate sectors (i.e., public, commercial, agriculture, and industrial) as applicable.

2. Cost-Effectiveness

Table 4 provides the Total Resource Cost (TRC) test and Program Administrator Cost (PAC) test results for its revised 2019 EE portfolio presented in this advice letter.

Table 4: PG&E 2019 Cost-Effectiveness Statement⁸

Cost-Effectiveness Scenario	2019 TRC Forecast	2019 PAC Forecast
Total portfolio including market effects and the Energy Savings and Performance Incentive (ESPI) award, and excluding C&S	1.04	1.56
Total portfolio including market effects, ESPI award, and C&S	1.25	3.67

Table 5 provides PG&E's updated forecast of energy savings and demand reduction for its 2019 EE portfolio. PG&E is forecasting a 2019 portfolio that exceeds a TRC of 1.0 and PAC of 1.25 and exceeds its 2019 net savings goals.

⁸ The 2019 Cost-Effectiveness Tool (CET) User Interface from California Energy Data and Reporting System (CEDARS) was used to calculate cost-effectiveness. However, the TRC and PAC forecasts provided in this table are lower than the TRC and PAC calculated by the CET upon submission of PG&E's 2019 forecast data inputs into CEDARS. See Section B.4.a below for an explanation of this discrepancy.

Table 5: Detailed Overview of PG&E Targets Compared to CPUC Goals

2019 Savings Component	Annual Net GWh	Net MW	Annual Net MMTWh
Portfolio Forecast			
2019 Energy Efficiency (EE) Portfolio Forecast	545	98	19.4
2019 Codes and Standards (C&S) Forecast	660	151	16.4
2019 Energy Savings Assistance (ESA) Program Forecast ⁹	107	15	-0.4
<i>Subtotal EE + ESA</i>	653	112	19.0
<i>Subtotal EE + ESA + C&S</i>	1312	263	35.4
Goals			
EE Incentive Program Goals¹⁰	524	100	19
Codes and Standards Goals	555	122	14
Combined EE & C&S Goals	1079	222	33
% of Goal			
2019 Forecast relative to Incentive Goal	125%	112%	100%
2019 Forecast relative to Total Incentive Programs and Codes and Standards Goal	122%	119%	107%

B. On-Bill Financing Forecast

1. OBF Background and Implications for Ratepayers

Since launching the OBF program in 2011, PG&E's financing programs have evolved into a mature set of offerings capable of saving ratepayers millions of dollars by reducing or eliminating traditional rebate payments. As of December 31, 2018, PG&E has financed thousands of projects totaling over \$115 million in loans.¹¹ The minimal loan default rate of 0.15 percent has ensured the vast

⁹ PG&E's 2019 ESA forecasted savings were updated to reflect the latest 2019 ESA forecast filed in Appendix A of PG&E's Supplemental to its ESA/CARE Mid-Cycle Update Advice 3990-G-A/5329-E-A.

¹⁰ ESA savings are embedded in the EE Incentive Program goals per D.17-09-025, p. 37 footnote 72.

¹¹ Pacific Gas and Electric Company's (U 39 M) Petition to Modify Decision 09-09-047 to Implement PG&E's Energy Efficiency Business Plan, Filed September 7, 2018

majority of program funds are returned and available for redeployment as part of the PG&E “revolving loan pool.”¹² In July 2016, the OBF Alternative Pathway Program was approved,¹³ providing a mechanism for OBF to generate savings outside the traditional rebate and incentive pathways.

Because the OBF model enables PG&E to avoid the large incentive payments historically needed to overcome the up-front cost barrier,¹⁴ the program is capable of delivering far greater benefits to customers who use it at much lower program cost, a central characteristic of scalability recognized by the CPUC. For instance, the recent Energy Efficiency Portfolio report states:

“Addressing these up-front cost barriers is a crucial aspect of achieving the doubling of energy efficiency statewide. As the “low-hanging fruit” efficiency measures are implemented, financing for larger, more ambitious efficiency projects will become of increasing importance.”¹⁵ The program cost savings enabled by OBF are evidenced in PG&E’s 2019 ABAL spending forecast, which is well below its approved budget as shown in Table 10 below, despite increased savings goals.¹⁶

The expansion of OBF and the petition for modification (PFM) PG&E recently filed requesting an increase in the commercial loan cap limit¹⁷ align with the

¹² PG&E Energy Efficiency Financing Balancing Account
https://www.pge.com/tariffs/tm2/pdf/GAS_PRELIM_DJ.pdf

¹³ Disposition approving Advice 3697-G /4812-E, 3697-G-A/4812-E-A, PG&E’s On Bill Financing Alternative Pathway Program, as a High Opportunity Program.

¹⁴ California 2010 – 2012 On-Bill Financing Process Evaluation and Market Assessment, Cadmus, 2012. CALMAC ID# CPU0056.01, The evaluation reports that “Customers, vendors, and utility staff members all commented that OBF removes upfront costs, enabling customers to complete energy-efficiency projects they otherwise would not have pursued.” The report continues, “Focus group participants report two main barriers to implementing energy efficiency projects: lack of knowledge about appropriate retrofits and the initial cost of making those retrofits. Although upfront cost issues are a much greater barrier for customers than is the lack of knowledge, most focus group participants reported they had not considered financing energy-efficiency projects.”

¹⁵ See for example, Energy Efficiency Portfolio Report, California Public Utilities Commission, 2018, p. 107

¹⁶ PG&E’s 2019 ABAL funding request exceeds savings goals with a budget approximately \$63 million below the 2019 Business Plan authorized budget cap per D.18-05-041. This authorized budget was approved based on projections of savings goals from the 2015 Potential and Goals study, which have since been revised upward based on the 2018 Potential and Goals study.

¹⁷ PG&E Petition to Modify Decision 09-09-047 to implement PG&E’s Energy Efficiency Business Plan

CPUC's vision for the essential role of financing programs in achieving Senate Bill (SB) 350 savings goals.¹⁸

PG&E's 2019 ABAL represents a reasonable projection for continued expansion of the financing programs. PG&E provides a refined forecast below that details calculations, assumptions, and forecast results that outline important progress in laying a foundation for scalable portfolios that effectively leverage ratepayer funding to achieve California's long-term energy savings and greenhouse gas reduction goals.

2. OBF Forecast Components

The OBF forecast can be divided into two components: the forecast that relates to the program as it is currently (OBF non-incentive projects that do not require PFM approval), and the forecast for OBF non-incentive projects that rely upon CPUC's approval of changes to the OBF program loan limits to be achieved.

Table 6. 2019 OBF Forecasted Component Savings and Loans

OBF Alternative Pathway Forecast Component		Forecast Gross kWh	Forecast Gross Therms	Forecast Loan Volume	Total Loan Amount
OBF non-incentive projects that do not require PFM approval (Loans up to \$100,000)		66,866,128	622,809	497	\$58,340,268
OBF non-incentive large-loan projects that <u>do</u> require PFM approval (Loans up to \$4 million)	Identified projects ¹⁹	5,176,164	4,254,028	14	\$20,302,857
	Projects yet to be identified ²⁰	~0	~4,500,000	~5-8	~\$10,285,714
Total		~72,042,292	~9,376,837	~516-519	~\$88,928,840

¹⁸ For example, the Energy Efficiency Portfolio Report, California Public Utilities Commission, 2018 states on p. 107, "Addressing these up-front cost barriers is a crucial aspect of achieving the doubling of energy efficiency statewide. As the "low-hanging fruit" efficiency measures are implemented, financing for larger, more ambitious efficiency projects will become of increasing importance." p. 107

¹⁹ "Identified projects" include projects that have been identified but have not started due to customers' lack of capital to proceed. These projects would require loans over the current loan limit of \$100,000.

²⁰ Numbers for the "projects yet to be identified" portion of this OBF forecast are estimates. PG&E anticipates focusing on industrial projects that bring in more savings per dollar loaned than the types of projects captured in the "scoped" portion of this forecast component (i.e., for commercial and government facilities). See sections B.3 and C.1 for more detail.

a. OBF Alternative Pathway

PG&E introduced the OBF Alternative Pathway as a “high opportunity project or program” (HOPP) in 2016 subsequent to the CPUC December 2015 HOPPs Ruling.²¹ PG&E installed 12 projects under this pathway to date and has developed a significant pipeline of 56 projects at the time of this filing. The marked increase in forecasted savings for OBF Alternative Pathway non-incentive projects compared to prior years is due to both this pipeline and PG&E’s organizational focus on OBF.

PG&E will be reporting savings associated with OBF Alternative Pathway for the first time in 2018, with significant growth anticipated in 2019 totaling over 500 projects. The growth is largely due to an industry shift in using the alternative pathway qualification process rather than reporting projects through rebate programs. Many OBF projects started in 2018 but will not close until 2019, thus contributing to the 2019 volume growth.

b. Additional OBF loans enabled by the approval of the proposals included in PG&E’s Petition for Modification.

On September 7, 2018, PG&E filed a petition to modify D.09-09-047. The petition requests changes to OBF loan limits that had been previously established to reflect the approval of PG&E’s EE Business Plan in D.18-05-041. The PFM requests an increase to the maximum loan amount available per premise to \$250,000 for all customers, with up to \$4,000,000 available for projects that demonstrate high projected cost-effectiveness.

The increase in loan limits will be particularly valuable in the industrial sector where there are cost-effective therms savings opportunities that could be funded in 2019. Industry participants and PG&E account representatives report that such large projects represent a significant opportunity going forward. Due to the scale of the projects and the time needed to complete large-scale retrofit work, PG&E is forecasting that 14 such projects have already been identified and will be able to close in 2019. These projects can reasonably be completed as they have already been identified but cannot

²¹ Disposition approving Advice 3697-G /4812-E, 3697-G-A/4812-E-A, PG&E’s On Bill Financing Alternative Pathway Program, as a High Opportunity Program.

move forward without capital. In addition to these 14 projects, PG&E will aggressively pursue five to eight additional projects that have yet to be identified. PG&E's field teams have communicated significant customer interest in OBF projects that could be undertaken with loans enabled by the new increased loan limit. Additionally, as PG&E builds a robust pipeline, more opportunities can be initiated that would form the basis of the 2020 forecast.

Finally, PG&E's September 4, 2018 ABAL filing describes a new financing subprogram for large projects that PG&E was considering.²² PG&E clarifies here that this subprogram is not a component of the OBF forecast presented in this second supplemental ABAL. Since the September 4 ABAL filing, the project forecast has developed such that it obviates the need to develop a new offering to deliver on 2019 savings and cost-effectiveness goals. Furthermore, a new offering would necessitate additional development and approvals that was possible at the time of the September 4 filing, but is no longer likely to come to fruition for 2019 savings claims. While PG&E continues to explore such an offering for future years, PG&E clarifies that this portfolio forecast is not contingent on additional approvals – it only relies upon the increased loan caps as called for in the PFM.

3. OBF Forecast Methodology

PG&E's approach to forecasting the OBF program relies on a number of informed estimations. Compared to standard EE program offerings, OBF serves as a platform for industry participants to prepare EE projects. Whereas PG&E may contract out a program to an implementer with specific goals and targets for a program, OBF relies on participating contractors and program administrators to source projects. Therefore, to generate the OBF forecast, PG&E relied on prior experience and discussions with industry participants about both their specific projects as well as how they plan to use the program in 2019.

a. Existing Pipeline Review

OBF is PG&E's preferred method of encouraging and enabling large streetlighting EE projects. PG&E is pursuing several of these projects in close partnership with government agencies that are scheduled for completion in 2019. These projects represent 12 GWh of energy savings.

²² Advice 4011-G/5365-E, p.33

Along with these streetlighting projects, PG&E has reviewed its existing pipeline of OBF Alternative Pathway loans to identify which projects will likely close in 2019. Based on the average OBF loan project cycle of six months, PG&E's existing pipeline represents approximately 50% of anticipated loans in 2019. Therefore, PG&E doubled the existing OBF pipeline (excluding the streetlight projects) to create the base 2019 OBF forecast and will continue working with large customers to develop the OBF pipeline.

b. A significant switch from the rebate pathway to the alternative pathway for OBF projects

PG&E anticipates a significant switch in the way trade professionals use the OBF program based on industry feedback. PG&E expects a rapid evolution away from using rebates to qualify projects for OBF to using the OBF alternative pathway (i.e., with no incentives). There are several drivers for this, including changes in rebate availability, new tools that make it easier to use the alternative pathway for trade professionals, and increasing industry awareness of the advantages of OBF without rebates. PG&E forecasts 50 percent of its 2018 volume of OBF loans that were qualified by obtaining a rebate will use the OBF Alternative Pathway in 2019.

c. Assumptions

PG&E made the following key program assumptions in creating this forecast:

- An average development cycle for OBF loans is six months from project qualification to funding. This is based on an analysis of the average time it takes projects to start and complete the OBF process. The project installation time is the largest variable with some projects taking longer than six months, and some completed in a short period. For the purposes of the assumption, these balance out.
- PG&E's existing pipeline of OBF Alternative Pathway projects will continue being originated at the same rate as they have in 2018. Early adopters of OBF Alternative Pathway were vendors not currently using PGE's rebate programs. PG&E predicts that they will continue generating projects at a similar rate based on industry feedback. The new adopters of the pathway will be those switching

from the use of rebates and incentives, captured in the following assumption;

- 50 percent of PG&E's OBF origination volume that qualified for OBF using incentives in 2018 will switch to financing without incentives using the OBF Alternative Pathway Program. This was established based on conversations with high volume users (trade professionals) of the OBF program.
- The PFM will be approved by end of June 2019 to allow for larger, highly cost-effective projects to be installed in 2019 (see Table 6). If the PFM is not approved by this time in 2019, these larger, highly cost-effective projects will likely be installed in 2020.

4. OBF Cost-Effectiveness and Forecast Input Refinements

PG&E believes that stakeholder discussions and CPUC guidance are needed to establish clear cost effectiveness policy for OBF Alternative Pathway. A whitepaper prepared by Dunskey Energy Consulting for the CPUC on cost-effectiveness in financing programs²³ describes several considerations that do not arise in rebate-only programs. The study observes that properly assessing financing programs “will require adaptations to California’s current cost-effectiveness algorithms – primarily the addition of new inputs not previously considered, as well as reconsideration of others.”²⁴ The report also states that “not adapting tests to [financing] characteristics would be very problematic...the differences presented by finance programs are simply too large to ignore if we wish to assess their real net value, whether on a TRC or a PAC basis.”²⁵ Finally, the study acknowledges, “because of the fundamentally different nature and objectives of financing programs (compared with rebate programs, for example), we argue that for certain issues, the most appropriate methodological approach for financing programs may be different from the one that is suitable – and currently applied to – incentive programs.”²⁶

There are several key features of OBF Alternative Pathway that potentially lead to different cost/benefit considerations compared to rebate programs:

²³ Cost-Effectiveness of Energy Efficiency Financing Programs: Methodology and Strategic Issues Whitepaper, December 2016.

²⁴ Ibid, p.1

²⁵ Ibid, p.22

²⁶ Ibid, p.25

- The program utilizes a revolving loan pool, maintained by PG&E instead of an incentive or third-party loan.
- With the on-bill repayment mechanism, OBF Alternative Pathway loans can be designed specifically to achieve bill-neutrality, meaning that energy savings balance monthly loan repayments until the loan is fully repaid.
- With the utility serving as the lender and the utility bill serving as the collection mechanism, the OBF Alternative Pathway loan does not impact a customer's ability to retain additional capital through traditional third-party loans.
- OBF Alternative Pathway loans are delivered at 0% interest.

These unique program features ensure that neither the participant's cash flows nor borrowing capacity are impacted through participation in OBF Alternative Pathway. In turn, the participant can pursue energy-efficiency retrofits via operational expenditure budgets as opposed to the capital expenditure that would typically be required.

These OBF Alternative Pathway program elements create market dynamics that are not at play in rebate programs and raise questions on treatment of core cost-effectiveness inputs. While the CPUC has provided definitive guidance on the calculation of TRC for several classes of EE programs, including downstream rebate programs, mid-/upstream incentive programs, and direct install programs,²⁷ PG&E suggests the applicability of this guidance to on-bill finance programs is not clear. In the absence of clarity, PG&E has forecast the OBF Alternative Pathway program by making modifications to the TRC and PAC calculations using the approach described below. A comparison of forecast components of the OBF Alternative Pathway program between the first supplemental ABAL and this second supplemental ABAL are summarized in Table 7 below. PG&E encourages future discussion (e.g. in Phase 3 of the EE rulemaking proceeding) to establish policies for financing cost-effectiveness calculations.

**Table 7: OBF Alternative Pathway Program Forecast Components
Comparison: First and Second Supplemental Advice Letter**

²⁷ Attachment 9 of D.07-09-043

Forecast Component	First Supplemental Advice Letter	Second Supplemental Advice Letter
Program Budget	\$629,253	\$629,253
Program TRC	6.0	1.6
Program PAC	216.4	7.9
Net GWh/yr	63	47
Net MW/yr	12	9
Net MMTherms/yr	3.9	6.1
Incentive Cost	\$0	\$11.4 million
Gross Measure Cost	\$20.0 million	\$75.6 million
NTG	0.9	0.6
EUL	12	8 – 15 years
Load Shape	Residential Air Conditioning	• Indoor Nonresidential Non-CFL Lighting • Commercial Process • Nonresidential HVAC_Split-Package HP • Commercial Outdoor Lighting

a. Incentives

PG&E believes the cost of capital (COC) associated with the loan while it is outstanding with the customer best aligns with the customer incentive. This concept would benefit from further conceptual development as it is unclear what the basis should be for the COC calculation. The COC could be based on utility weighted average cost of capital (WACC), the customer's cost of capital, or another value. Here PG&E takes the interim approach of basing the COC calculation on a combination of the risk-free rate (10-year treasury yield) and the anticipated default level, as a proxy for the risk premium.

There is likely to be a material difference between the risk associated with OBF loan repayments in comparison to the core utility business. Using the utility WACC to calculate the COC value could therefore yield inaccuracy in the calculation of incentive cost. Once issued, the risk associated with the OBF loan repayment is customer default. Having operated the OBF program since 2011, PG&E has developed a track record of low default levels. PG&E assumes that the annualized default rate is 1%, which far exceeds the rate experienced from 2011 to 2018 (0.02%). This conservative assumption recognizes that, to date, OBF has operated in a period of

economic expansion, and that a recession would likely lead to increased default levels.

As the default rate captures the risks that the funds will not be returned to ratepayers, this represents the risk premium element of the discount rate. As with all discount rates, the achievable rate of return from a risk-free investment must also be accounted for, and for this PG&E uses the 10-year treasury rate.

For this forecast, PG&E has assumed a COC amount of \$11.4 million. While PG&E believes the COC best aligns with the concept of an “incentive” as these are funds that benefit customers that are not recouped through loan repayments, treating the COC as a conventional incentive in the CET on CEDARS creates accounting issues.²⁸ These COC “incentive” funds come out of the revolving loan pool, which is currently entirely excluded from TRC cost calculations in CEDARS.²⁹ Furthermore, the CET would only include the free-rider portion of incentives in the TRC costs, and PG&E is currently including the full \$11.4 million cost in the TRC cost portion.³⁰

Inclusion of the \$11.4 million in the 2019 OBF Alternative Pathway Program budget, accompanied by an equivalent reduction in the 2019 OBF Loan Pool budget in CEDARS, to enable the \$11.4 million to be calculated as a TRC cost for the OBF Alternative Pathway program, would misrepresent both the OBF Alternative Pathway Program budget and the OBF Loan Pool budget, and would create OBF Loan Pool logistical accounting issues.

PG&E has included \$11.4 million as an OBF Alternative Pathway program cost in calculating the TRC and PAC results that are shown in the tables

²⁸ The California Energy Data and Reporting System (CEDARS) website contains a cloud-based version of the Cost Effectiveness Tool (CET) that is used to calculate the forecasted 2019 TRC based on program inputs submitted by PG&E through CEDARS for its 2019 ABAL forecast filing. The CEDARS website is also a database for energy efficiency claims reporting. CEDARS displays the forecasted and actual budgets for all 2019 PG&E programs, and thus program budgets must be forecasted as accurately as possible in CEDARS for accurate program data tracking.

²⁹ D. 09-09-047, p. 288 states “we are convinced that the Standard Practice Manual for cost-effectiveness does not require that ratepayer funds used to establish a revolving loan fund (where the loans will be paid back and the funds are available either for continued lending or eventual return to ratepayers) needs to be treated as a ‘cost’ or ‘program expense.’ Thus, we are inclined to remove the value of any revolving loan funds from the utilities’ portfolio cost-effectiveness calculations.” Consequently, the CEDARS website marks OBF Loan Pool funds as excluded from TRC calculations in the CET.

³⁰ For rebate programs, only the portion of incentives paid to free-riders are included in the TRC cost calculations. PG&E’s inclusion of the full \$11.4 million cost is a conservative approach and further discussion is warranted.

and portfolio summary for this advice letter. However, PG&E has not counted the \$11.4 million as an incentive cost in its CEDARS submission of OBF Alternative Pathway program inputs. Rather, the \$11.4 million in OBF Alternative Pathway incentive funds are accounted for under the \$13.5 million Loan Pool budget umbrella, which is excluded from the TRC cost calculations in CEDARS. Consequently, the TRC and PAC calculated in CEDARS exclude \$11.4 million from the TRC and PAC costs, resulting in higher TRC and PAC numbers for the portfolio and the OBF Alternative Pathway Program than are presented in this advice letter. A comparison of the TRC and PAC results in CEDARS versus this advice letter is shown in Table 7 below.

**Table 8. Advice Letter versus CEDARS Results for TRC, PAC
(Excluding Codes and Standards)**

	Second Supplemental Advice Letter	CEDARS
TRC	1.04	1.07
PAC	1.56	1.62

b. Free Ridership

Because no NTG value specific to measures offered through a non-incentive financing program has been adopted into DEER as of the September 4, 2018 filing date of PG&E's ABAL,³¹ the NTG assumption for the OBF Alternative Pathway Program has been updated to the default NTG value for commercial or industrial EE measures with no evaluated NTG ratio, or existing commercial or industrial EE measures in programs with the same delivery mechanism for more than two years. This default NTG value is 0.6. However, because custom evaluations historically have assessed incentive-only projects, this NTG speaks to free-ridership in situations where only an incentive is offered.

The 2013-2014 and 2015 Statewide On-Bill Financing impact evaluations found that in situations where *both* an incentive and a loan are offered, the

³¹ October 1, 2018 email from Peter Franzese re: PG&E Advice 4011-G/5375-E directed PG&E to provide savings forecasts based on workpapers (and presumably DEER values) approved as of September 4, 2018 where applicable.

NTG is roughly 0.1 higher than when only an incentive is offered.³² Consistent with other evaluations and CPUC commentary discussed earlier, the evaluator suggests this is primarily due to the fact that a loan addresses the up-front cost barrier better than an incentive, which is typically only a fraction of the project cost, requiring a customer to cover the remaining portion.

If it is the loan that drives high NTG and not the incentive, then incentives spent on these projects are essentially wasted.³³ From a free-rider's perspective, a loan is less appealing than a rebate. The free-rider has already chosen to do the project, meaning that the up-front cost barrier has already been solved. In this case, the customer would logically rather cash-in on a rich incentive, as opposed to a loan in which the only direct financial benefit is avoided cost of capital. Because a well-structured loan can eliminate the up-front cost barrier, it is logical that the NTG for loan-only projects should exceed even the 0.1 adder found in the evaluation of loan plus incentive interventions.

³² PY 2013/14 On-Bill Finance Programs: Impact Evaluation, CALMAC Study ID CPU0161.01, p.39, and PY2015 California Statewide On-Bill Finance Impact Evaluation, CALMAC Study ID CPU0181, p.41

³³ This is partly why one of PG&E's central tenets of its Business Plan is to wean customers off of incentives.

**Table 9: Free Ridership Comparison for
Financing Project Types**

Project Type	NTG	Source
Incentive only	0.6	DEER
Incentive + loan	0.7	2013-2014 and 2015 Statewide Financing Impact Evaluations (assuming approximately 0.1 NTG incremental increase)
Loan only	Unknown, but likely to exceed 0.7	To be scoped into EM&V roadmap for 2019

For those reasons, PG&E expects the evaluated NTG of OBF Alternative Pathway projects would be higher than that of traditional incentive programs, making PG&E's forecast of a 0.6 NTG both conservative and achievable. PG&E suggest any Phase 3 consideration of cost benefit analysis of OBF programs include the likelihood of a much higher NTG being appropriate for these programs. PG&E will seek to ensure that the NTG of OBF is evaluated to allow for an informed update in time for inclusion in the 2020 ABAL.

c. Participant Cost

With a lack of clarity of how to treat participant costs in a financing context,³⁴ PG&E is taking the same approach to forecasting participant cost as in the large custom programs. PG&E recommends this issue be studied in Phase 3 of the EE rulemaking.

PG&E is including \$75.6 million in participant costs in this forecast. This amount is equal to 85 percent of the total forecasted 2019 loan amount of

³⁴ It is relevant to note that bill savings (for participants) and resulting bill increases (for all customers) are treated as an income transfer in the TRC. For rebate programs there is a symmetry where they are essentially the same value appearing as a benefit in the Participant Cost Test (PCT) and a cost in the Ratepayer Impact Measure (RIM) test. The OBF program alters this balance because participants benefit from the availability of additional capital. The return on that capital is expected to be different than the cost of capital associated with the rate base providing the loan pool. Therefore, the notion that TRC represents "all customers" perspective has been distorted and any Phase 3 consideration of cost-effectiveness for OBF programs should address this change in symmetry.

\$88.9 million included in Table 6. This \$75.6 million is treated as the participant's "gross measure cost" input in CEDARS and the CET.³⁵ PG&E believes that 15 percent is a conservative estimate of the costs commensurate with participant investment associated with non-energy impacts that should not be included in the TRC calculation. Along with improved efficiency, projects enabled through OBF often provide businesses enhanced equipment reliability, increased productivity and other benefits having nothing to do with the energy savings. PG&E plans to further study the extent to which customers are investing in these non-energy impacts in 2019 as the OBF program continues to mature.³⁶

d. Load Shapes

PG&E has forecasted more granular OBF Alternative Pathway savings that reflect HVAC, lighting, and multi-measure projects, and thus has refined its load shape assumptions to align with these various end-uses. In revisiting the OBF forecast, PG&E discovered it erroneously used the residential air conditioning load shape as a proxy. This forecast both corrects the error and refines the forecast by using multiple load shapes focused on the commercial and industrial sectors. The use of multiple load shapes will improve the accuracy of the OBF forecasted benefits.

C. Forecast Achievability

1. OBF Forecast

As is highlighted in Table 5 of the first supplemental ABAL, the OBF forecast is based partly on PG&E's current authorization and partly on the new loans that would be authorized through the PFM. Existing loans are based primarily on pipeline and historical results. PG&E is moving many deemed offerings to OBF without an incentive and is seeing large OBF Alternative Pathway projects come in for the Government Agency and Multifamily sector.

³⁵ The CET is a tool on CEDARS. The CET performs the CET calculation based on program inputs submitted to CEDARS. CEDARS designates certain programs as "included" or "excluded" from the

³⁶ PG&E notes that achieving the 1.0 TRC threshold and savings goals do not hinge on the precise percentage of the loan amount reported as measure costs. If 100% of loan amount were reported as measure costs the portfolio would still be forecast above 1.0 TRC.

As for the larger loans authorization, the forecast is based on discussions with Customers and PG&E field employees (Business Energy Solutions and Field Engineering Services). PG&E is aware of projects that require a large capital outlay that are not in the customers' capital budgeting allocation. These projects are cost-effective for ratepayers, and PG&E believes that the customers would take action (and customers had indicated that they would take action) based on an OBF offering for the project cost.

a. Timing of PFM Approval

The OBF Alternative Pathway savings forecast provided in this advice letter is reasonable and achievable if the increased loan caps are available to customers by June 30, 2019 to enable the approximately 14 to 22 projects shown in Table 6 under the component labeled "OBF non-incentive large-loan projects to do require PFM approval." If the loan caps are not raised by that date, the forecast provided for the OBF Alternative Pathway component will likely not be achieved through financing offers alone. In that case, PG&E will be required to pursue incentive-only custom projects and/or additional Primary Lighting to achieve the 2019 TRC target and annual savings goals.

b. Program Actions to Achieve OBF Forecast

As described in its Business Plan, PG&E has begun significant actions to ramp up financing in the portfolio. 2018 ended with \$37.1 million in OBF loans to customers, which was an increase of approximately 50 percent over the prior year. This is consistent with the 45 percent increase from 2016 to 2017; PG&E expects to see similar growth in 2019 under a business as usual case. To further accelerate this growth PG&E doing the following:

- **PG&E is focusing less on deemed and custom offerings.** Due to changes in product baselines and measure heterogeneity, there are fewer products available in the deemed portfolios. Similarly, current custom approaches suffer from free ridership and process challenges. Rather than trying to focus on the few remaining measures available, the portfolio is leaning in to the finance offer to drive portfolio objectives. PG&E believes leveraging financing and moving away from traditional incentive models is a more prudent use of ratepayer funds.
- **PG&E is allocating additional resources for OBF.** PG&E's energy efficiency team has devoted additional staff resources to the OBF program and is developing tools for the PG&E field

teams to assist in customer recruitment and project development. PG&E has also created standardized templates to support smaller projects and is also working with existing implementers to further incorporate financing offers into their portfolios. Lastly, PG&E is offering trainings to internal teams with a significant event scheduled for early February 2019.

PG&E notes that the gas savings forecast for OBF has increased compared to the last supplement. This is due to increased prospects resulting from activities described here, as well as additional time spent developing leads since the first supplemental ABAL. It is reasonable to believe that by making OBF an organizational priority – and particularly emphasizing gas savings – PG&E can expect that many additional OBF projects will enter the pipeline, many of which can close in 2019. PG&E intends to focus field teams on both the account representative and engineering side on those opportunities that yield gas savings but are limited by lack of capital (which OBF loans can directly address).

c. OBF targets large custom projects, which have fallen out of favor with customers due to challenges with the ex ante process

The throughput for industrial and commercial projects has steadily declined since 2013. Figure 1 shows that just five years ago custom claims from industrial, agricultural, and commercial projects totaled 306 gross GWh. In 2017, that total was down to 119 gross GWh. The trend in therm savings is similar (as shown in Figure 2).

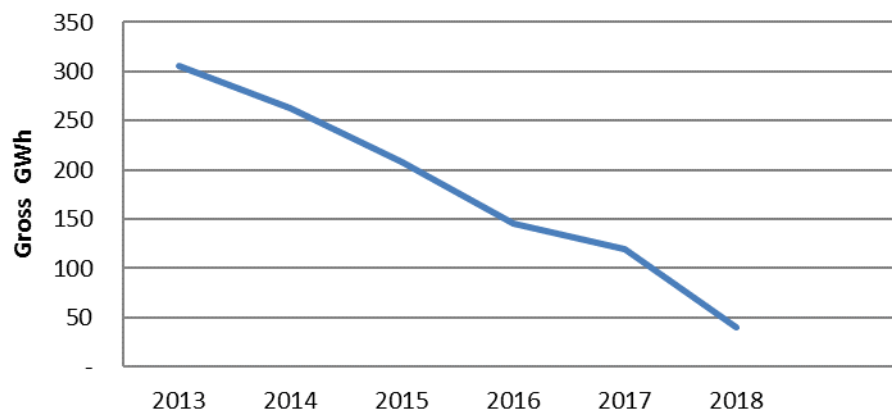


Figure 1. Electric Savings from Industrial and Commercial Custom Projects

Source: PG&E Annual Reports
(2018 represents claims through Q3)

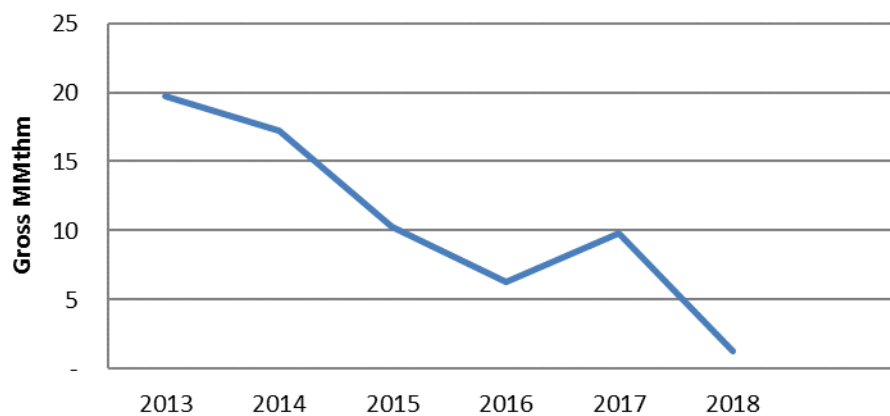


Figure 2. Gas Savings from Industrial and Commercial Custom Projects

Source: PG&E Annual Reports
(2018 represents claims through Q3)

These declines are due in part to challenges with the custom process, which are well-documented.³⁷

With OBF Alternative Pathway, PG&E is seeking to refresh and modernize the portfolio of large custom projects in a way that can better address both cost and process barriers customers experience in pursuing custom programs. The nature of today's custom review means that customers ultimately do not know when they can begin to implement their projects. This uncertainty is a major barrier to program participation and efficiency investments. As described above, because loan offerings strategically address the up-front cost barrier, free-ridership is expected to be minimized. This will enable PG&E to streamline the free-ridership *screening and review* process, giving customers much-needed certainty around timelines and process expectations.

PG&E expects a tighter, more predictable process enabled by OBF to entice many disenchanted custom participants to undertake projects again. PG&E's forecast of 72 gross GWh from loan-only projects in 2019 (including projects enabled by large loans) would close about 40 percent of that gap and expects to bring custom participation back to levels seen in the 2016-2017 timeframe. PG&E believes this forecast is reasonable and achievable.

2. Primary Lighting

With a Program TRC of 3.0, Primary Lighting (PGE21041) is one of the most cost-effective programs in PG&E's portfolio. While PG&E will be increasing the program incentive budget for Primary Lighting from roughly \$2 million to \$14 million, a budget of \$14 million still represents a conservative outlay compared to what PG&E believes the program could likely deliver if maximized. If the portfolio is underdelivering on TRC mid-year, shifting funds from lower-performing programs into Primary Lighting will enhance the portfolio's TRC. PG&E observes that upstream and midstream programs like Primary Lighting have proven to be much more elastic than downstream programs, meaning that delivered savings respond more quickly to changes in budget.³⁸

³⁷ For example, in the Track 2 Working Group authorized in D.16-08-019, stakeholders identified 18 distinct challenges with the custom review process. From "T2WG Task 6 Issues and Proposals" available at <http://t2wg.cadmusweb.com>

³⁸ This is because outreach is much more streamlined – instead of using traditional channels like emails, paper mailers or leave behinds, or word of mouth to directly engage end users, the program only needs to engage a small handful of manufacturers or distributors.

PG&E also notes that while measures within Primary Lighting have favorable *ex ante* values that produce favorable *ex ante* TRC, Program Administrators (PAs) are required to achieve cost-effectiveness targets on an *evaluated* basis.³⁹ Relying very heavily on a single technology, applied in a specific sector and channel, exacerbates evaluation risk and may compromise PG&E's ability to deliver a cost-effective portfolio on an evaluated basis. PG&E prefers to diversify that risk through emerging offerings like financing and pay-for-performance.

In evolving its portfolio in line with its business plan, PG&E would prefer to transition aggressively to financing programs, which provide more comprehensive projects at no increased incentive budget, than request additional budget for "widget"⁴⁰ incentives due to favorable TRC. The forecast PG&E presents is a portfolio that balances savings goals, cost-effectiveness, and achieving other long-term policy goals – not a portfolio that just maximizes TRC.

PG&E recognizes that Primary Lighting is a very powerful and effective lever for driving portfolio TRC, but it is a lever that should be used judiciously because it centralizes evaluation risk and hinders PG&E's ability to realize its business plan vision of moving towards non-incentive offerings. However, PG&E will fund Primary Lighting as necessary to achieve short-term savings and cost-effectiveness requirements.

D. Other Portfolio Adjustments

1. Industrial Refrigeration Performance Plus Program

The Industrial Refrigeration Performance Plus Program (IRPP, PGE21036) was originally slated for closure in PG&E's 2019 ABAL filed on September 4, 2018. Updated in this advice letter, PG&E will keep the IRPP program open in 2019 to accommodate a small number of energy savings projects that will be installed in 2019 instead of 2018 due to customer delays, and thus PG&E has included the IRPP program in its 2019 forecast to reflect these expected 2019 project savings. Extending the program activity into 2019 will best support successful completion of these projects. Forecast budget for 2019 covers customer incentive dollars associated with these projects.

³⁹ D.18-05-041 Conclusion of Law 75

⁴⁰ PG&E's Business Plan on p.10 states "PG&E will move away from the traditional incentive model with a focus on expanding the supply of affordable funding by making investments in energy efficiency attractive as a capital-grade resource."

2. Petrochemical Program

The Small Petrochemical Energy Efficiency Program (SPEEP, PGE210213) was originally included in PG&E's 2019 ABAL filed on September 4, 2018. In this second supplemental 2019 ABAL, this program is being sunset due to the implementer's choice to not extend the program into 2019, citing low savings achievements and low future prospects in the challenging, hard-to-reach small refinery and petrochemical sectors. This program was an IDEEA365 solicitation pilot, selected for the implementer's ties to the industry and their proposal to engage customers with a simple version of strategic energy management as well as their engineering expertise for these particular sectors. Unfortunately, customer engagement at any level turned out to be their biggest barrier, resulting in very few completed projects.

3. Energy Savings Performance Incentive (ESPI) Payment

PG&E revised the ESPI award it anticipates receiving in 2019 to reflect the total ESPI award amount of \$11,543,849 requested in Advice 4044-G/5430-E filed on November 20, 2018. This advice letter detailed PG&E's request for its EE program years 2016 and 2017 performance awards, to be received in program year 2019. The total award request of \$11,543,849 includes the remaining balance of the 2006-2008 RRIM Settlement offset.

E. Updated True-Up Tables

The following tables from PG&E's supplemental ABAL filed on October 29, 2018 have been updated to reflect a) supplemental forecast revisions, and b) an assumption that all government partnership program budget and savings are tracked under the public sector.

In PG&E's 2019 ABAL filed on September 4th, budget and savings shown under the "public" sector reflected the savings for all government partnership program activities, and not just those activities occurring in public facilities. The savings for the public sector in the supplemental ABAL filed on October 29th were subsequently updated to only reflect forecast savings for program activities serving public customers. Similarly, the forecast savings for the commercial, agricultural, and industrial sectors have been updated to reflect activities from government partnership programs occurring in facilities in those sectors. The sector budgets in PG&E's October 29th ABAL were left unchanged from the sector budgets included in PG&E's September 4th ABAL.

In this second supplemental ABAL, PG&E reverts back to its approach taken in its September 4, 2018 ABAL filing where budget and savings shown under the “public” sector in Tables 7 through 10 below reflect the savings for all government partnership program activities, and not just those activities occurring in public facilities. PG&E has taken this approach in its second supplemental to make government partnership program budget and savings forecasts simple and transparent. PG&E is still determining the most robust approach for reporting business plan sector savings claims for its government partnership programs in 2019.

Table 10: PG&E Budget True-Up

Annual Rolling Portfolio Budget Forecast - True-up										
Sector	2018 ^{1, 5, 6}		2019	2020	2021	2022	2023	2024	2025	Total
Residential	\$ 79,928,344	\$ 100,957,384	\$ 98,105,071	\$ 98,618,410	\$ 98,937,754	\$ 98,612,814	\$ 98,604,233	\$ 98,329,284	\$ 772,093,293	
Commercial	\$ 93,253,455	\$ 68,111,272	\$ 80,803,726	\$ 80,850,393	\$ 81,037,197	\$ 81,056,638	\$ 79,969,651	\$ 79,906,337	\$ 644,988,669	
Industrial	\$ 44,072,060	\$ 24,290,604	\$ 29,279,019	\$ 29,295,929	\$ 29,363,617	\$ 29,370,661	\$ 28,976,794	\$ 28,953,853	\$ 243,602,539	
Agriculture	\$ 25,828,032	\$ 14,596,507	\$ 17,102,798	\$ 17,112,676	\$ 17,152,215	\$ 17,156,329	\$ 16,926,259	\$ 16,912,859	\$ 142,787,676	
Emerging Tech	\$ 5,629,976	\$ 7,761,040	\$ 7,654,873	\$ 7,654,873	\$ 7,654,873	\$ 7,654,873	\$ 7,654,873	\$ 7,654,873	\$ 59,320,252	
Public	\$ 72,368,174	\$ 40,464,830	\$ 48,388,389	\$ 48,624,906	\$ 48,772,042	\$ 48,622,328	\$ 48,618,375	\$ 48,491,693	\$ 404,350,738	
Codes and Standards	\$ 16,183,839	\$ 20,811,065	\$ 20,876,988	\$ 20,876,988	\$ 20,876,988	\$ 20,876,988	\$ 20,876,988	\$ 20,876,988	\$ 162,256,830	
WE&T	\$ 11,038,180	\$ 9,741,962	\$ 10,473,354	\$ 10,473,354	\$ 10,473,354	\$ 10,473,354	\$ 10,473,354	\$ 10,473,354	\$ 83,620,265	
Finance	\$ 4,158,662	\$ 6,496,567	\$ 6,504,117	\$ 6,504,117	\$ 6,504,117	\$ 6,504,117	\$ 6,504,117	\$ 6,504,117	\$ 49,679,932	
OBF Loan Pool	\$ 13,500,000	\$ 13,500,000	\$ 20,000,000	\$ 20,000,000	\$ 20,000,000	\$ 20,000,000	\$ 20,000,000	\$ 20,000,000	\$ 147,000,000	
Subtotal ²	\$ 365,960,723	\$ 306,731,232	\$ 339,188,334	\$ 340,011,646	\$ 340,772,157	\$ 340,328,102	\$ 338,604,643	\$ 338,103,357	\$ 2,709,700,194	
IOU EM&V	\$ 15,248,363	\$ 12,780,468	\$ 14,132,847	\$ 14,167,152	\$ 14,198,840	\$ 14,180,338	\$ 14,108,527	\$ 14,087,640	\$ 112,904,175	
MCE Programs	\$ 1,876,782	\$ 6,946,418	\$ 13,806,729	\$ 13,806,729	\$ 12,398,396	\$ 12,398,396	\$ 12,370,239	\$ 12,270,271	\$ 85,873,959	
BayREN Programs	\$ 19,737,356	\$ 24,033,828	\$ 24,648,596	\$ 23,642,243	\$ 24,133,439	\$ 24,466,060	\$ 26,188,134	\$ 26,705,883	\$ 193,555,540	
3C-REN Programs	\$ -	\$ 2,833,090	\$ 2,974,745	\$ 3,123,483	\$ 3,248,421	\$ 3,378,357	\$ 3,479,709	\$ 3,584,101	\$ 22,621,905	
Total Portfolio Program Year PA Budget ³	\$ 402,823,225	\$ 353,325,036	\$ 394,751,252	\$ 394,751,252	\$ 394,751,252	\$ 394,751,252	\$ 394,751,252	\$ 394,751,252	\$ 3,124,655,773	
Total Authorized Portfolio PY Budget Cap ³	\$ 416,713,780	\$ 408,757,913	\$ 394,751,252	\$ 394,751,252	\$ 394,751,252	\$ 394,751,252	\$ 394,751,252	\$ 394,751,252	\$ 3,193,979,205	
IOU Portfolio PY Budget Request ⁴	\$ 381,209,086	\$ 319,511,700	\$ 353,321,182	\$ 354,178,798	\$ 354,970,997	\$ 354,508,439	\$ 352,713,170	\$ 352,190,997		
IOU Authorized PY Budget Cap ⁴	\$ 396,694,593	\$ 388,989,738	\$ 374,399,466	\$ 374,399,466	\$ 374,399,466	\$ 374,399,466	\$ 374,399,466	\$ 374,399,466		
Forecast Portfolio PY TRC	1.01	1.04	1.03	1.03	1.03	1.25+	1.25+	1.25+		
Forecast Portfolio PY PAC	1.45	1.56	1.27	1.27	1.27	1.25+	1.25+	1.25+		

¹ "Reset" 2018 budget at or below 2018 annual budget approved in Business Plan Decision. "True-up" years 2019-2025. 2018 budget represents PG&E's 2018 ABAL Budget (with \$548K DSM split 50/50 Res/Com).

² Subtotal equals the denominator by which portfolio 3P bid % will be measured

³ Sum of all PA budgets in IOU Service Area

⁴ IOU only Subtotal (Line 13) + IOU EM&V (Line 14)

⁵ 2018-2025 BayREN budgets are from Table 2: BayREN's Annual Rolling Portfolio Budget Forecast True-Up of BayREN's 2019 Annual Energy Efficiency Budget Advice Letter 9-E filed on September 4, 2018, with EM&V budget increased to be 4% of their total budget.

⁶ 2018-2025 MCE budgets are from the Annual Rolling Budget Forecast True-Up Table of the Partial Second Supplement to Marin Clean Energy's 2019 Energy Efficiency Annual Budget Advice Letter 33-E filed on November 2, 2018, with EM&V budget increased to be 4% of their total budget.

⁷ 2019-2025 3C-REN budgets are from Table 3: Annual Budget Portfolio Budget Forecast True-Up Table of the Tri-County Annual Budget Advice Letter AL 2-E/1-G filed on September 4, 2018, with EM&V budget increased to be 4% of their total budget. The 2019 split of 45.6% for PG&E's contribution was applied to each year's budget; this split may be reassessed in future years.

Table 11: PG&E kWh True-Up

Sector	Annual Rolling Portfolio Savings Forecast - True-up (kWh)¹							
	2018	2019	2020	2021	2022	2023	2024	2025
Residential	221,707,977	288,539,048	184,800,000	163,000,000	169,000,000	175,000,000	181,000,000	181,000,000
Commercial	148,582,487	92,335,828	191,060,000	148,000,000	158,000,000	167,000,000	180,000,000	180,000,000
Industrial	75,513,811	36,593,528	40,900,000	39,000,000	39,000,000	38,000,000	38,000,000	38,000,000
Agriculture	52,381,675	30,377,733	40,960,000	40,000,000	41,000,000	42,000,000	43,000,000	43,000,000
Emerging Tech	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Public	90,491,009	50,798,624	76,450,000	29,000,000	29,000,000	30,000,000	30,000,000	30,000,000
WE&T	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Finance ²	4,328,542	46,827,490	-	-	-	-	-	-
OBF Loan Pool ²	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
IOU - Subtotal	593,005,502	545,472,250	534,170,000	419,000,000	436,000,000	452,000,000	472,000,000	472,000,000
ESA Savings	74,639,501	107,235,450	TBD	TBD	TBD	TBD	TBD	TBD
MCE Programs	1,846,947	5,852,477	8,380,475	8,380,475	9,567,898	9,567,898	9,567,898	9,567,898
BayREN Programs	2,687,839	2,559,124	3,259,917	3,202,337	3,665,919	4,038,997	4,742,357	5,000,310
3C-REN Programs		525,645	661,784	916,263	1,323,792	1,747,701	1,836,932	1,969,394
Total Forecast Portfolio Savings	667,645,003	652,707,700	534,170,000	419,000,000	436,000,000	452,000,000	472,000,000	472,000,000
CPUC Goal	448,000,000	524,000,000	517,000,000	558,000,000	568,000,000	576,000,000	588,000,000	605,000,000
% of Goal	149%	125%	103%	75%	77%	78%	80%	78%
Codes and Standards	856,811,593	659,736,442	381,000,000	326,000,000	295,000,000	254,000,000	240,000,000	240,000,000

¹ Numbers for 2020 represent the savings forecast as presented in the Business Plan (corrected from September 4th, 2018 ABAL filing and October 29th, 2018 supplemental ABAL filing). Forecasts from 2021-2025 represent savings potentials from the Goals and Potentials study (2015), as presented in the Business Plan. PG&E will reassess savings goals in future years based on solicitation progress and Potential Study updates and will strive to achieve goals put forth in future Potential Study updates.

² Savings from Financing and OBF Loan Pool projects are rolled into the savings forecasts for the sectors above for program years 2020 - 2025.

Table 12: PG&E kW True-Up

Sector	Annual Rolling Portfolio Savings Forecast - True-up (kW)¹							
	2018	2019	2020	2021	2022	2023	2024	2025
Residential	35,617	51,263	30,250	10,900	10,400	8,700	8,700	9,900
Commercial	22,318	16,360	26,310	30,500	32,500	36,700	41,200	44,700
Industrial	13,947	4,424	4,200	3,900	3,800	3,700	3,600	3,600
Agriculture	10,099	9,145	6,770	2,500	2,500	2,600	2,600	2,700
Emerging Tech	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Public	12,633	7,581	11,190	3,000	3,300	3,900	4,400	4,900
WE&T	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Finance ²	992	8,897	-	-	-	-	-	-
OBF Loan Pool ²	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
IOU - Subtotal	95,606	97,670	78,720	50,800	52,500	55,600	60,500	65,800
ESA Savings	76,831	14,739	TBD	TBD	TBD	TBD	TBD	TBD
MCE Programs	349	696	484	484	454	454	454	454
BayREN Programs	1,172	1,041	894	917	1,091	1,229	1,533	1,636
3C-REN Programs		320	412	586	858	1,185	1,286	1,399
Total Forecast Portfolio Savings (w/out C&S)	172,437	112,409	78,720	50,800	52,500	55,600	60,500	65,800
CPUC Goal	84,000	100,000	97,000	106,000	108,000	110,000	112,000	116,000
% of Goal	205%	112%	81%	48%	49%	51%	54%	57%
Codes and Standards	165,202	150,796	101,000	94,000	90,000	84,000	82,000	82,000

¹ Numbers for 2020 represent the savings forecast as presented in the Business Plan (corrected from September 4th, 2018 ABAL filing and October 29th, 2018 supplemental ABAL filing). Forecasts from 2021-2025 represent savings potentials from the Goals and Potentials study (2015), as presented in the Business Plan. PG&E will reassess savings goals in future years based on solicitation progress and Potential Study updates and will strive to achieve goals put forth in future Potential Study updates.

² Savings from Financing and OBF Loan Pool projects are rolled into the savings forecasts for the sectors above for program years 2020 - 2025.

Table 13: PG&E Therm True-Up

Sector	Annual Rolling Portfolio Savings Forecast - True-up (therms)¹							
	2018	2019	2020	2021	2022	2023	2024	2025
Residential	4,483,968	5,280,511	4,140,000	5,700,000	6,000,000	6,200,000	6,700,000	7,200,000
Commercial	4,653,218	4,723,388	3,940,000	2,100,000	2,300,000	2,500,000	2,700,000	2,800,000
Industrial	7,148,899	2,402,347	7,500,000	4,200,000	4,200,000	4,100,000	4,100,000	4,000,000
Agriculture	1,227,494	500,326	910,000	200,000	200,000	200,000	200,000	200,000
Emerging Tech	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Public	854,024	420,307	440,000	400,000	400,000	500,000	500,000	500,000
WE&T	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Finance ²	421,791	6,094,944	-	-	-	-	-	-
OBF Loan Pool ²	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
IOU - Subtotal	18,789,394	19,421,824	16,930,000	12,600,000	13,100,000	13,500,000	14,200,000	14,700,000
ESA Savings	1,967,722	(396,585)	TBD	TBD	TBD	TBD	TBD	TBD
MCE Programs	100,000	400,000	550,000	550,000	610,000	610,000	610,000	610,000
BayREN Programs	304,917	230,464	265,833	253,999	277,642	321,199	478,395	479,219
3C-REN Programs		64,818	81,572	114,426	166,626	226,269	243,050	263,102
Total Forecast Portfolio Savings (w/out C&S)	20,757,116	19,025,239	16,930,000	12,600,000	13,100,000	13,500,000	14,200,000	14,700,000
CPUC Goal	17,000,000	19,000,000	18,000,000	20,000,000	23,000,000	24,000,000	24,000,000	24,000,000
% of Goal	122%	100%	94%	63%	57%	56%	59%	61%
Codes and Standards	15,397,524	16,394,386	6,000,000	6,000,000	6,000,000	6,000,000	5,000,000	5,000,000

¹ Numbers for 2020 represent the savings forecast as presented in the Business Plan (corrected from September 4th, 2018 ABAL filing and October 29th, 2018 supplemental ABAL filing). Forecasts from 2021-2025 represent savings potentials from the Goals and Potentials study (2015), as presented in the Business Plan. PG&E will reassess savings goals in future years based on solicitation progress and Potential Study updates and will strive to achieve goals put forth in future Potential Study updates.

² Savings from Financing and OBF Loan Pool projects are rolled into the savings forecasts for the sectors above for program years 2020 - 2025.

F. Updated EM&V Budget

Table 14 shows the 2019 EM&V budget table, updated from PG&E's ABAL filed on September 4, 2018 with the EM&V budgets in the REN and CCA Annual Energy Efficiency Budget Advice Letters that were approved by the CPUC.

Table 14: 2019 EM&V Budget

PA	PA Total without EM&V	Ratio of PA Total without EM&V	EM&V	EM&V CPUC	EM&V PA	PA Total with EM&V
PG&E	\$306,731,232	90.43%	\$12,780,468	\$9,265,839	\$3,514,629	\$319,511,700
BayREN	\$23,072,475	6.80%	\$961,353	\$696,981	\$264,372	\$24,033,828
MCE	\$6,668,561	1.97%	\$277,857	\$166,714	\$111,143	\$6,946,418
3C-REN	\$2,719,766	0.80%	\$113,324	\$82,160	\$31,164	\$2,833,090
Portfolio Total	\$339,192,034	100.00%	\$14,133,002	\$10,211,694	\$3,921,308	\$353,325,036

Table 14, above, notes:

- 2019 BayREN budgets are based on BayREN's 2019 Annual Energy Efficiency Budget Advice Letter 9-E filed on September 4, 2018.
- 2019 MCE budgets are based on the Partial Second Supplement to Marin Clean Energy's 2019 Energy Efficiency Annual Budget Advice Letter 33-E filed on November 2, 2018.
- 2019 3C-REN budgets are based on the Tri-County Annual Budget Advice Letter AL 2-E/1-G filed on September 4, 2018, applying 45.6% for PG&E's 2019 budget contribution.
- The above table uses a 72.5/27.5 CPUC/PA percentage split for PG&E, BayREN, and 3C-REN, and a 60/40 CPUC/PA split for MCE per their approved 2019 ABAL.

G. PG&E Prior Years' Unspent Funds

Table 15 illustrates PG&E's unspent funds for prior years' program cycles through Program Year (PY) 2018. The data are also presented in the Appendices in Table 6: Committed Energy Efficiency Program Funding Not Yet Spent, and Table 7: 2017 Authorized and Spent/Unspent Detail. PG&E requests authorization to return the unspent and uncommitted funds for prior program years through PY 2018 of \$198,295,672 to ratepayers. PG&E is targeting a rate filing on May 1, 2019 for the return of the electric portion of the unspent and uncommitted funds (\$165.6 million). The gas portion of the total unspent and uncommitted funds (\$32.7 million) will be

returned to ratepayers at the earliest feasible opportunity,⁴¹ which will be through the Annual Gas True-Up filing in Fall 2019, with rate changes effective in 2020. Table 16 shows PG&E's 2019 EE portfolio budget less the unspent and uncommitted funds through 2018.

Table 15: Prior Years' Through PY 2017 Unspent Funds as of September 2018

	Pre-2013	PY2013-2015	PY 2016	PY 2017	PY 2018	Totals
Unspent & Committed						
EM&V [1]	\$ -	\$5,258,255	\$15,672,827	\$14,479,143	\$11,501,157	\$46,911,381
Financing Pilots [2]	\$ -	\$3,036,860	\$0	\$165,400	\$220,797	\$3,423,057
BayREN	\$ -	\$3,760,885	\$0	\$42,769	\$5,646,669	\$9,450,323
MCE (gas funding)	\$ -	\$36,182	\$104,615	\$0	\$223,670	\$364,467
Total	\$ -	\$12,092,181	\$15,777,442	\$14,687,312	\$17,592,293	\$60,149,228
Unspent & Uncommitted for 2019 Rate Offset						
Utility Program Funds	\$272,729	\$473,081	\$11,649,274	\$103,786,590	\$82,113,998	\$198,295,672

[1] Includes unspent funds from the CPUC (\$37.4 million) and PG&E (\$9.5 million)

[2] 2017 & 2018 committed funds were authorized in AL 3904-G/5175-E, approved effective December 3, 2017.

Table 16: PG&E 2019 ABAL Budget Recovery Request Summary

PG&E PY 2019 Spending Budget Request	\$319,511,700
Uncommitted and Unspent Carryover Balance Through 2018 to be Returned in 2019 (Electric Portion Only) ¹	\$165,645,126
PY 2019 Budget Recovery Request	\$153,866,574

¹The uncommitted and unspent funds balance through 2018 totals \$198,295,672. Of this total, \$165,645,126 is attributed to electric funds and \$32,650,546 is attributable to gas funds. The electric funds will be returned to ratepayers in 2019, and due to guidance in D.04-08-010 preventing mid-year gas rates changes unless specific criteria are met, unspent gas funds will be returned in 2020 via the Annual Gas True-Up to be filed in Q4 2019.

⁴¹ D.04-08-010 p.7 states "utilities may request a change in surcharge rates during the year. Such rate changes are only justified if failure to make the rate change would result in a forecasted total rate increase of 10% or more on January 1 of the next year." The incorporation of gas unspent funds into gas rates would not trigger the threshold criterion for mid-year rate change.

III. Conclusion

Based on the information presented herein, PG&E respectfully requests that the CPUC approve PG&E's 2019 ABAL. Doing so is needed for concrete portfolio planning and timely execution.

PG&E respectfully requests that the Commission approve PG&E's 2019 EE budget as filed in this second supplemental advice letter.

IV. Protests

Anyone wishing to protest this filing may do so by letter sent via U.S. mail, facsimile or E-mail, no later than February 12, 2018, which is 20 days after the date of this filing. Protests must be submitted to:

CPUC Energy Division
ED Tariff Unit
505 Van Ness Avenue, 4th Floor
San Francisco, California 94102

Facsimile: (415) 703-2200
E-mail: EDTariffUnit@cpuc.ca.gov

Copies of protests also should be mailed to the attention of the Director, Energy Division, Room 4004, at the address shown above.

The protest shall also be sent to PG&E either via e-mail or U.S. mail (and by facsimile, if possible) at the address shown below on the same date it is mailed or delivered to the Commission:

Erik Jacobson
Director, Regulatory Relations
c/o Megan Lawson
Pacific Gas and Electric Company
77 Beale Street, Mail Code B13U
P.O. Box 770000
San Francisco, California 94177

Facsimile: (415) 973-3582
E-mail: PGETariffs@pge.com

Any person (including individuals, groups, or organizations) may protest or respond to an advice letter (General Order 96-B, Section 7.4). The protest shall contain the following information: specification of the advice letter protested; grounds for the protest; supporting factual information or legal argument; name, telephone number, postal address, and (where appropriate) e-mail address of the protestant; and statement that the protest was sent to the utility no later than the day on which the protest was submitted to the reviewing Industry Division (General Order 96-B, Section 3.11).

V. Effective Date

PG&E requests that this Tier 2 advice filing become effective on January 1, 2019.

VI. Notice

In accordance with General Order 96-B, Section IV, a copy of this advice letter is being sent electronically and via U.S. mail to parties shown on the attached list and the parties on the service lists for R.13-11-005, A.17-01-013 et al. Address changes to the General Order 96-B service list should be directed to PG&E at email address PGETariffs@pge.com. For changes to any other service list, please contact the Commission's Process Office at (415) 703-2021 or at Process_Office@cpuc.ca.gov. Send all electronic approvals to PGETariffs@pge.com. Advice letter filings can also be accessed electronically at: <http://www.pge.com/tariffs/>.

/S/

Erik Jacobson
Director, Regulatory Relations

Attachments

- Attachment 1 – California Energy Data and Reporting System (CEDARS) Filing Confirmation
- Attachment 2 – Appendices

cc: Peter Franzese, Energy Division
Service List R.13-11-005
Service List A.17-01-013 et al



ADVICE LETTER SUMMARY

ENERGY UTILITY



MUST BE COMPLETED BY UTILITY (Attach additional pages as needed)

Company name/CPUC Utility No.: Pacific Gas and Electric Company (ID U39M)

Utility type:

☒ ELC ☒ GAS ☐ WATER
☐ PLC ☐ HEAT

Contact Person: Yvonne Yang

Phone #: (415)973-2094

E-mail: PGETariffs@pge.com

E-mail Disposition Notice to: Yvonne.Yang@pge.com

EXPLANATION OF UTILITY TYPE

ELC = Electric GAS = Gas WATER = Water
PLC = Pipeline HEAT = Heat

(Date Submitted / Received Stamp by CPUC)

Advice Letter (AL) #: 4011-G-B/5375-E-B

Tier Designation: 2

Subject of AL: Second Supplemental: PG&E's 2019 Energy Efficiency Annual Budget Advice Letter in Compliance with Decisions 15-10-028 and 18-05-041

Keywords (choose from CPUC listing): Energy Efficiency, Compliance

AL Type: ☐ Monthly ☐ Quarterly ☒ Annual ☐ One-Time ☐ Other:

If AL submitted in compliance with a Commission order, indicate relevant Decision/Resolution #: D. 15-10-028 and D. 18-05-041

Does AL replace a withdrawn or rejected AL? If so, identify the prior AL: No

Summarize differences between the AL and the prior withdrawn or rejected AL:

Confidential treatment requested? ☐ Yes ☒ No

If yes, specification of confidential information:

Confidential information will be made available to appropriate parties who execute a nondisclosure agreement. Name and contact information to request nondisclosure agreement/ access to confidential information:

Resolution required? ☐ Yes ☒ No

Requested effective date: 1/1/19

No. of tariff sheets: N/A

Estimated system annual revenue effect (%): N/A

Estimated system average rate effect (%): N/A

When rates are affected by AL, include attachment in AL showing average rate effects on customer classes (residential, small commercial, large C/I, agricultural, lighting).

Tariff schedules affected: N/A

Service affected and changes proposed¹: N/A

Pending advice letters that revise the same tariff sheets: N/A

¹Discuss in AL if more space is needed.

Protests and all other correspondence regarding this AL are due no later than 20 days after the date of this submittal, unless otherwise authorized by the Commission, and shall be sent to:

CPUC, Energy Division
Attention: Tariff Unit
505 Van Ness Avenue
San Francisco, CA 94102
Email: EDTariffUnit@cpuc.ca.gov

Name: Erik Jacobson, c/o Megan Lawson
Title: Director, Regulatory Relations
Utility Name: Pacific Gas and Electric Company
Address: 77 Beale Street, Mail Code B13U
City: San Francisco, CA 94177
State: Zip: 94177
Telephone (xxx) xxx-xxxx: (415)973-2093
Facsimile (xxx) xxx-xxxx: (415)973-3582
Email: PGETariffs@pge.com

Name:
Title:
Utility Name:
Address:
City:
State: District of Columbia Zip:
Telephone (xxx) xxx-xxxx:
Facsimile (xxx) xxx-xxxx:
Email:

Clear Form

Attachment 1

**California Energy Data and Reporting
System (CEDARS) Filing Confirmation**

CEDARS FILING SUBMISSION RECEIPT

The PGE portfolio filing has been submitted and is now under review. A summary of the filing is provided below.

PA: Pacific Gas & Electric (PGE)

Filing Year: 2019

Submitted: 14:31:42 on 22 Jan 2019

By: Wilson Wong

Advice Letter Number: 4011-G/5375-E

* Portfolio Filing Summary *

- TRC: 1.2697
- PAC: 3.8052
- TRC (no admin): 1.6212
- PAC (no admin): 10.8658
- RIM: 0.5495
- Budget: \$306,011,699.70

* Programs Included in the Filing *

- PGE21001: Residential Energy Advisor
- PGE210010: Pay for Performance Pilot
- PGE210011: Residential Energy Fitness program
- PGE21002: Residential Energy Efficiency
- PGE21003: Multifamily Energy Efficiency
- PGE21004: Energy Upgrade California
- PGE21005: Residential New Construction
- PGE21006: Residential HVAC
- PGE21007: California New Homes Multifamily
- PGE21008: Enhance Time Delay Relay
- PGE21009: Direct Install for Manufactured and Mobile Homes
- PGE21011: Commercial Calculated Incentives
- PGE210112: School Energy Efficiency
- PGE210119: LED Accelerator
- PGE21012: Commercial Deemed Incentives
- PGE210123: Healthcare Energy Efficiency Program
- PGE21013: Commercial Continuous Energy Improvement
- PGE210135: Water Infrastructure and System Efficiency
- PGE210139: SEI Energize Schools Program
- PGE21014: Commercial Energy Advisor
- PGE210143: Hospitality Program
- PGE21015: Commercial HVAC

- PGE21018: EnergySmart Grocer
- PGE21021: Industrial Calculated Incentives
- PGE210210: Industrial Recommissioning Program
- PGE210211: Light Industrial Energy Efficiency
- PGE210212: Compressed Air and Vacuum Optimization Program
- PGE210213: Small Petrochemical Energy Efficiency
- PGE21022: Industrial Deemed Incentives
- PGE21023: Industrial Continuous Energy Improvement
- PGE21024: Industrial Energy Advisor
- PGE21025: California Wastewater Process Optimization
- PGE21026: Energy Efficiency Services for Oil Production
- PGE21027: Heavy Industry Energy Efficiency Program
- PGE21029: Refinery Energy Efficiency Program
- PGE21030: Industrial Strategic Energy Management
- PGE21031: Agricultural Calculated Incentives
- PGE210311: Process Wastewater Treatment EM Pgm for Ag Food Processing
- PGE210312: Dairy and Winery Industry Efficiency Solutions
- PGE21032: Agricultural Deemed Incentives
- PGE21033: Agricultural Continuous Energy Improvement
- PGE21034: Agricultural Energy Advisor
- PGE21036: Industrial Refrigeration Performance Plus
- PGE21039: Comprehensive Food Process Audit & Resource Efficiency Pgm
- PGE21041: Primary Lighting
- PGE21042: Lighting Innovation
- PGE21043: Lighting Market Transformation
- PGE21051: Building Codes Advocacy
- PGE21052: Appliance Standards Advocacy
- PGE21053: Compliance Improvement
- PGE21054: Reach Codes
- PGE21055: Planning and Coordination
- PGE21056: Code Readiness
- PGE21057: National Codes and Standards Advocacy
- PGE21061: Technology Development Support
- PGE21062: Technology Assessments
- PGE21063: Technology Introduction Support
- PGE21071: Integrated Energy Education and Training
- PGE21072: Connections
- PGE21073: Strategic Planning
- PGE21076: Career and Workforce Readiness
- PGE21081: Statewide DSM Coordination & Integration
- PGE21091: On-Bill Financing (excludes Loan Pool)
- PGE210911: On-Bill Financing Alternative Pathway
- PGE21091LP: Financing Loan Pool Addition
- PGE21092: Third-Party Financing
- PGE21093: New Financing Offerings
- PGE2110011: California Community Colleges
- PGE2110012: University of California/California State University
- PGE2110013: State of California

- PGE2110014: Department of Corrections and Rehabilitation
- PGE2110051: Local Government Energy Action Resources (LGEAR)
- PGE2110052: Strategic Energy Resources
- PGE211007: Association of Monterey Bay Area Governments (AMBAG)
- PGE211009: East Bay
- PGE211010: Fresno
- PGE211011: Kern
- PGE211012: Madera
- PGE211013: Marin County
- PGE211014: Mendocino/Lake County
- PGE211015: Napa County
- PGE211016: Redwood Coast
- PGE211018: San Luis Obispo County
- PGE211019: San Mateo County
- PGE211020: Santa Barbara
- PGE211021: Sierra Nevada
- PGE211022: Sonoma County
- PGE211023: Silicon Valley
- PGE211024: San Francisco
- PGE211025: Savings by Design (SBD)
- PGE211026: North Valley
- PGE211027: Sutter Buttes
- PGE211028: Yolo
- PGE211029: Solano
- PGE211030: Northern San Joaquin Valley
- PGE211031: Valley Innovative Energy Watch (VIEW)
- PGE_EMV: Evaluation Measurement and Verification
- PGE_ESA: Energy Savings Assistance
- PGE_ESPI: Energy Savings Performance Index
- PGE_SWMEO: Statewide Marketing Education and Outreach
- PGE_WATER: Water Energy Nexus

Attachment 2

Appendices

PA Name: Pacific Gas and Electric Company
 Budget Year: 2019

Table 1 -Bill Payer Impacts - Rates by Customer Class				
	Electric Average Rate (Res and Non-Res) \$/kwh	Gas Average Rate (Res and Non-Res) \$/therm	Total Average Bill Savings by Year (\$)	Total Average Lifecycle Bill Savings (\$)
Present Rates - System Average				
2013	\$ 0.16088	\$ 1.18081	\$ 152,246,518	\$ 1,553,692,551
2014	\$ 0.16891	\$ 1.24800	\$ 161,566,746	\$ 1,557,176,408
2015	\$ 0.17094	\$ 1.50984	\$ 226,868,285	\$ 2,396,414,536
2016	\$ 0.18423	\$ 1.66679	\$ 263,727,662	\$ 2,670,876,906
2017	\$ 0.19092	\$ 1.59360	\$ 300,032,228	\$ 3,316,129,816
2018	\$ 0.19545	\$ 1.53810	\$ 277,809,754	\$ 3,064,704,836

Notes:

- 1) Average first year electric bill savings is calculated by multiplying an average electric rate with first year net kWh energy savings.
- 2) Average first year gas bill savings is calculated by multiplying an average gas rate with first year net therm energy savings.
- 3) Total average first year bill savings is the sum of Notes 1 and 2.
- 4) Average lifecycle electric bill savings is calculated by multiplying an average electric rate with lifecycle net kWh energy savings.
- 5) Average lifecycle gas bill savings is calculated by multiplying an average gas rate with lifecycle net therm energy savings.
- 6) Total average lifecycle bill savings is the sum of Notes 4 and 5.
- 7) As of 3/1/2018, the bundled average electric rate is \$0.19545
- 8) As of 7/1/2018, the bundled average gas rate is \$1.507 per therm before the impact of EE programs.
- 9) Total Average Bill Savings by Year and Lifecycle Bill Savings include C&S net lifecycle savings and exclude ESA Programs.
- 10) Consistent with SPM TRC/PAC/RIM tests, all savings used from actuals and forecasts in this table are net not gross

PA Name: Pacific Gas and Electric Company
Budget Year: 2019

Table 2a - Electric Bill Payer Impacts - Current and Proposed Revenues and Rates, Total and Energy Efficiency, by Customer Class

Customer Classes	2017 Total Electric Annual Revenue \$000	2017 Energy Efficiency Portion of Total Electric Annual Revenue \$000	2018 Energy Efficiency Portion of Total Electric Annual Revenue \$000	2019 Proposed Energy Efficiency Electric Annual Revenue Change \$000	2019 Proposed Percentage Change In Electric Revenue and Rates	2017 Electric Average Rate \$/kwh	2017 Energy Efficiency Portion of Electric Average Rate \$/kwh	2018 Electric Average Rate \$/kwh	2018 Energy Efficiency Portion of Electric Average Rate \$/kwh	2019 Proposed Electric Average Rate Change \$/kwh	2019 Proposed Percentage Change In Electric Revenue and Rates
Bundled	\$ 5,122,944	\$ 124,851	\$ 92,173	\$ (3,477)	-3.77%	\$ 0.20396	\$ 0.00497	\$ 0.20143	\$ 0.00502	\$ (0.00019)	-0.02%
Residential	\$ 1,602,138	\$ 38,452	\$ 27,272	\$ (732)	-2.68%	\$ 0.22870	\$ 0.00549	\$ 0.23599	\$ 0.00556	\$ (0.00015)	-0.06%
Commercial - Small	\$ 1,524,973	\$ 33,958	\$ 22,671	\$ 461	2.04%	\$ 0.20346	\$ 0.00453	\$ 0.21265	\$ 0.00458	\$ 0.00009	0.04%
Commercial - Medium	\$ 1,559,370	\$ 34,938	\$ 26,520	\$ 420	1.58%	\$ 0.17785	\$ 0.00398	\$ 0.18398	\$ 0.00402	\$ 0.00007	0.04%
Commercial - Large	\$ 61,810	\$ 1,521	\$ 964	\$ 2	0.20%	\$ 0.21969	\$ 0.00541	\$ 0.23095	\$ 0.00546	\$ 0.00002	0.01%
Streetlights	\$ 75,282	\$ 1,801	\$ 1,573	\$ 97	6.19%	\$ 0.14760	\$ 0.00353	\$ 0.17169	\$ 0.00492	\$ 0.00031	0.18%
Standby	\$ 1,161,575	\$ 23,905	\$ 21,161	\$ (627)	-2.96%	\$ 0.17922	\$ 0.00367	\$ 0.20053	\$ 0.00400	\$ (0.00012)	-0.06%
Agricultural	\$ 1,378,895	\$ 27,548	\$ 21,209	\$ 316	1.49%	\$ 0.14202	\$ 0.00284	\$ 0.14901	\$ 0.00287	\$ 0.00004	0.03%
Agricultural											
Industrial	\$ 398,611	\$ 12,699	\$ 46,775	\$ (1,764)	-3.77%	\$ 0.15581	\$ 0.00497	\$ 0.15239	\$ 0.00502	\$ (0.00019)	-0.12%
Direct Access Service	\$ 186,164	\$ 6,261	\$ 16,878	\$ (453)	-2.68%	\$ 0.16321	\$ 0.00549	\$ 0.15386	\$ 0.00556	\$ (0.00015)	-0.10%
Residential	\$ 232,678	\$ 8,800	\$ 23,339	\$ 475	2.04%	\$ 0.11979	\$ 0.00453	\$ 0.12139	\$ 0.00458	\$ 0.00009	0.07%
Commercial - Small	\$ 389,235	\$ 17,525	\$ 24,659	\$ 391	1.58%	\$ 0.08850	\$ 0.00398	\$ 0.08976	\$ 0.00402	\$ 0.00007	0.08%
Commercial - Medium	\$ 6,259	\$ 283	\$ 543	\$ 1	0.20%	\$ 0.11940	\$ 0.00541	\$ 0.15663	\$ 0.00546	\$ 0.00002	0.01%
Commercial - Large	\$ 355	\$ 16	\$ 3	\$ 0	6.19%	\$ 0.07736	\$ 0.00353	\$ 0.24901	\$ 0.00492	\$ 0.00031	0.12%
Agricultural	\$ 13,222	\$ 361	\$ 3,610	\$ (107)	-2.96%	\$ 0.13925	\$ 0.00367	\$ 0.11978	\$ 0.00400	\$ (0.00012)	-0.10%
Industrial	\$ 374,724	\$ 17,769	\$ 24,760	\$ 387	1.56%	\$ 0.05818	\$ 0.00276	\$ 0.06437	\$ 0.00289	\$ 0.00004	0.06%
Departed Load	\$ 35,623	\$ 6,196	\$ 6,718	\$ 133	1.99%		\$ 0.00303		\$ 0.00319	\$ 0.00007	

Notes:

- 1) Customers who receive electric procurement as well as delivery service from PG&E.
2) Customers who purchase electricity from non-PG&E suppliers.
3) 2017 total revenue from July 1, 2017 Rate Change AL 5088-E
4) EE portion of 2017 revenue based on EE revenue requirement in rates (former PGC and proc EE) from 2017 Annual Electric True-up AL 4902-E-A
5) 2018 total revenue from 2018 Annual Electric True-up AL 5231-E
6) EE portion of 2018 revenue based on EE revenue requirement in rates (former PGC and proc EE) from 2018 Annual Electric True-up AL 5231-E
7) 2019 proposed rate changes based on 2019 authorized EE funding from PG&E's EE Business Plan, per D.18-05-041. Funding to be collected in rates are subject to change upon approval of PG&E's 2019 ABAL.

Table 2b - Gas Bill Payer Impacts - Current and Proposed Revenues and Rates, Total and Energy Efficiency, by Customer Class

Customer Classes	2017 Total Gas Annual Revenue \$000	2017 Energy Efficiency Portion of Total Gas Annual Revenue \$000	2018 Energy Efficiency Portion of Total Gas Annual Revenue \$000 (3)	2019 Proposed Energy Efficiency Gas Annual Revenue Change \$000 (4)(5)(6)	2019 Proposed Percentage Change In Gas Revenue and Rates (4)(5)(6)	2017 Gas Average Rate \$/therm	2017 Energy Efficiency Portion of Gas Average Rate \$/therm	2018 Gas Average Rate \$/therm	2018 Energy Efficiency Portion of Gas Average Rate \$/therm	2019 Proposed Gas Average Rate Change \$/therm (6)	2019 Proposed Percentage Change In Gas Revenue and Rates (6)
Core Retail Bundled¹											
Residential - Non-CARE	\$ 2,375,481	\$ 47,933	\$ 42,142	\$ (95)	-0.004%	\$ 1.5936	\$ 0.0356	\$ 1.5381	\$ 0.0310	\$ (0.0001)	-0.005%
Residential - CARE	\$ 599,661	\$ 12,100	\$ 10,612	\$ (24)	-0.004%	\$ 1.2637	\$ 0.0356	\$ 1.2216	\$ 0.0310	\$ (0.0001)	-0.006%
Commercial - Small	\$ 598,003	\$ 4,565	\$ 4,012	\$ (9)	-0.002%	\$ 1.1315	\$ 0.0086	\$ 1.0807	\$ 0.0074	\$ (0.0001)	-0.002%
Commercial - Large	\$ 37,567	\$ 1,625	\$ 1,428	\$ (3)	-0.009%	\$ 0.8795	\$ 0.0365	\$ 0.8282	\$ 0.0323	\$ (0.0001)	-0.009%
Core Retail - Transportation Only²											
Residential - Non-CARE	\$ 39,045	\$ 788	\$ 693	\$ (2)	-0.004%	\$ 1.1681	\$ 0.0356	\$ 1.2195	\$ 0.0310	\$ (0.0001)	-0.006%
Residential - CARE	\$ 9,856	\$ 199	\$ 174	\$ (0)	-0.004%	\$ 0.8381	\$ 0.0356	\$ 0.9030	\$ 0.0310	\$ (0.0001)	-0.008%
Commercial - Small	\$ 215,383	\$ 1,644	\$ 1,445	\$ (3)	-0.002%	\$ 0.7230	\$ 0.0086	\$ 0.7784	\$ 0.0074	\$ (0.0000)	-0.002%
Commercial - Large	\$ 18,708	\$ 809	\$ 711	\$ (2)	-0.009%	\$ 0.5008	\$ 0.0365	\$ 0.5547	\$ 0.0323	\$ (0.0001)	-0.013%
Noncore-Transportation Only²											
Industrial - Distribution	\$ 75,471	\$ 2,081	\$ 1,829	\$ (4)	-0.005%	\$ 0.2978	\$ 0.0086	\$ 0.3513	\$ 0.0074	\$ (0.0000)	-0.005%
Commercial/Industrial	\$ 236,833	\$ 5,673	\$ 4,985	\$ (11)	-0.004%	\$ 0.1496	\$ 0.0031	\$ 0.1981	\$ 0.0030	\$ (0.0000)	-0.003%

PA Name: Pacific Gas and Electric Company
 Budget Year: 2019

Table 3 - Budget and Cost Recovery by Funding Source

	2019
2019 EE Portfolio Budget [1]	\$ 408,757,913
Unspent/Uncommitted EM&V Carryover Funds from pre-2019	\$ -
Unspent/Uncommitted Program Carryover Funds from pre-2019	\$ 198,295,672
Total Funding Request for 2019 EE Portfolio [2]	\$ 243,112,787

Budget by Funding Source

2019 Authorized (Before Carryover) [1]	2019 Budget	Allocation
Electric Procurement EE Funds	\$ 310,656,014	76%
Gas PPP Surcharge Funds	\$ 98,101,899	24%
Total Funds	\$ 408,757,913	100%

Revenue Requirement for Cost Recovery by Funding Source

2019 Authorized Funding in Rates (including pre-2019 carryover)	2019 Revenue Requirement	Allocation after Carryover adjustment [3]
Electric Procurement EE Funds	\$ 145,010,888	69%
Gas PPP Surcharge Funds	\$ 65,451,353	31%
Total Funds	\$ 210,462,241	100%

Unspent/Uncommitted Carryover Funds (in positive \$ amnts)

Total Unspent/Uncommitted Funds	Electric PGC	Electric Procurement	Total Electric	Gas	Total
2018	\$ -	\$ 69,081,152	\$ 69,081,152	\$ 13,032,845	\$ 82,113,998
2017	\$ -	\$ 86,712,347	\$ 86,712,347	\$ 17,074,243	\$ 103,786,590
2016	\$ -	\$ 9,383,431	\$ 9,383,431	\$ 2,265,843	\$ 11,649,274
2013-2015	\$ -	\$ 244,499	\$ 244,499	\$ 228,582	\$ 473,081
Pre-2013	\$ 271	\$ 223,426	\$ 223,698	\$ 49,032	\$ 272,729
Total Pre-2019 [4]	\$ 271	\$ 165,644,855	\$ 165,645,126	\$ 32,650,546	\$ 198,295,672

EM&V Unspent/Uncommitted Funds	Electric PGC	Electric Procurement	Total Electric	Gas	Total
2018	\$ -	\$ -	\$ -	\$ -	\$ -
2017	\$ -	\$ -	\$ -	\$ -	\$ -
2016	\$ -	\$ -	\$ -	\$ -	\$ -
2013-2015	\$ -	\$ -	\$ -	\$ -	\$ -
Pre-2013	\$ -	\$ -	\$ -	\$ -	\$ -
Total Pre-2018	\$ -	\$ -	\$ -	\$ -	\$ -

Program Unspent/Uncommitted Funds	Electric PGC	Electric Procurement	Total Electric	Gas	Total
2018	\$ -	\$ 69,081,152	\$ 69,081,152	\$ 13,032,845	\$ 82,113,998
2017	\$ -	\$ 86,712,347	\$ 86,712,347	\$ 17,074,243	\$ 103,786,590
2016	\$ -	\$ 9,383,431	\$ 9,383,431	\$ 2,265,843	\$ 11,649,274
2013-2015	\$ -	\$ 244,499	\$ 244,499	\$ 228,582	\$ 473,081
Pre-2013	\$ 271	\$ 223,426	\$ 223,698	\$ 49,032	\$ 272,729
Total Pre-2019	\$ 271	\$ 165,644,855	\$ 165,645,126	\$ 32,650,546	\$ 198,295,672

[1] Represents Authorized EE Funding in 2019 Rates from PG&E's EE Business Plan, per D.18-05-041. Funding to be collected in rates are subject to change upon approval of PG&E's 2019 ABAL.

[2] The "Total Funding Request for 2019 EE Portfolio" was calculated as the 2019 EE Portfolio budget less the electric portion only of the "Unspent/Uncommitted Program Carryover Funds from pre-2019." While the pre-2019 unspent/uncommitted program carryover funds total \$198, 295,67, only the electric portion of \$165,645,126 will be returned in 2019. The gas portion of the pre-2019 unspent/uncommitted program carryover funds of \$32,650,546 will be not be returned in 2019 because the impact to gas rates from the return of these gas unspent funds would not meet the threshold criterion for a mid-2019 gas rates change per D.04-08-010. Thus, these gas unspent funds will be returned to ratepayers in 2020.

[3] The "allocation after the carryover adjustment" was calculated as the portion of the 2019 revenue requirement attributed to electric and gas. The 2019 revenue requirement for the electric and gas funds in this "Revenue Requirement for Cost Recovery by Funding Source" table was calculated by subtracting the total pre-2019 unspent funds for electric and gas, respectively, from the 2019 budget amounts for electric and gas, respectively in the "Budget Funding Source" table.

[4] The Pre-2019 Unspent/Uncommitted Program Carryover Funds excludes \$499,483 of MCE electric funds requested to be refunded to ratepayers from the 2019 program cycle.

Table 4 – Budget, Spent, Unspent, Carryover Details

New/Existing Program #	Main Program Name / Sub-Program Name	2013-2015 Budget, Spent, Unspent and Carryover									2016 Authorized Budget	2016 Fundshifts
		2015 Authorized Budget	2015 Total Budget with Commitments & Fundshifts [1]	2015 Total Budget Spent [2]	Requested Carry Over of Pre-2013 Unspent Funds to 2016 [3]	2013-2015 Unspent/Uncommitted Funds Refunded or Transferred	2013-2015 Commitments as of 12/31/15 [5]	2013-2015 Unspent/Committed Funds, Carryover to 2017 [6]	2013-2015 Cycle Expenditures Spent in 2016	Pre-2016 Unspent/Uncommitted Funds Available for 2017 offset [E-F+H-J-K] [7]		
PGE2100	Residential Energy Efficiency Programs Total	\$ 61,794,379	\$ 83,984,802	\$ 83,984,802	\$ 4,475,456	\$ -	\$ 12,029,803	\$ -	\$ (122,295)	\$ 122,295	\$ 61,794,379	\$ 11,336,407
PGE21001	Residential Energy Advisor	\$ 13,531,293	\$ 23,635,570	\$ 23,635,570			\$ -			\$ 0	\$ 13,531,293	\$ 2,500,000
PGE21002	Plug Load and Appliances	\$ 18,990,738	\$ 18,858,757	\$ 18,858,757			\$ -			\$ 0	\$ 18,990,738	\$ -
PGE21003	Multifamily Energy Efficiency	\$ 1,839,507	\$ 1,522,581	\$ 1,522,581			\$ -			\$ 0	\$ 1,839,507	\$ -
PGE21004	Energy Upgrade California	\$ 13,998,809	\$ 20,967,951	\$ 20,967,951	\$ 322,330		\$ 322,330		\$ (86,905)	\$ 86,905	\$ 13,998,809	\$ 7,936,407
PGE21005	Residential New Construction	\$ 3,958,299	\$ 5,830,541	\$ 5,830,541	\$ 4,000,000		\$ 11,554,347			\$ -	\$ 3,958,299	\$ 500,000
PGE21006	Residential HVAC	\$ 9,475,734	\$ 13,169,401	\$ 13,169,401	\$ 153,126		\$ 153,126		\$ (35,390)	\$ 35,390	\$ 9,475,734	\$ 400,000
PGE210010	Pay for Performance Pilot	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE2101	Commercial Programs Total	\$ 79,040,928	\$ 84,797,377	\$ 84,797,377	\$ 7,082,579	\$ -	\$ 25,608,086	\$ -	\$ -	\$ -	\$ 79,040,928	\$ 20,850,000
PGE21011	Commercial Calculated Incentives	\$ 25,132,514	\$ 24,103,034	\$ 24,440,383	\$ 6,682,579		\$ 11,732,639			\$ (337,349)	\$ 25,132,514	\$ -
PGE211025	Savings by Design (SBD)	\$ 10,237,119	\$ 10,382,091	\$ 10,533,625	\$ 400,000		\$ 13,821,821			\$ (151,535)	\$ 10,237,119	\$ -
PGE21012	Commercial Deemed Incentives	\$ 18,922,890	\$ 23,144,357	\$ 23,786,931			\$ 3,588			\$ (642,575)	\$ 18,922,890	\$ 20,850,000
PGE21013	Commercial Continuous Energy Improvement	\$ 491,754	\$ 785,604	\$ 1,126,045			\$ -			\$ (340,441)	\$ 491,754	\$ -
PGE21014	Commercial Energy Advisor	\$ 5,979,427	\$ 5,508,948	\$ 6,107,525			\$ -			\$ (598,577)	\$ 5,979,427	\$ -
PGE21015	Commercial HVAC	\$ 18,277,223	\$ 20,873,344	\$ 18,802,867			\$ 50,038			\$ 2,070,476	\$ 18,277,223	\$ -
PGE2103	Agricultural Programs Total	\$ 18,823,008	\$ 18,553,570	\$ 18,553,570	\$ -	\$ -	\$ 2,873,652	\$ -	\$ -	\$ 0	\$ 18,823,008	\$ -
PGE21031	Agricultural Calculated Incentives	\$ 10,240,375	\$ 9,443,466	\$ 8,304,778	\$ -		\$ 2,873,652			\$ 1,138,687	\$ 10,240,375	\$ -
PGE21032	Agricultural Deemed Incentives	\$ 3,815,997	\$ 2,629,376	\$ 4,804,403			\$ -			\$ (2,175,027)	\$ 3,815,997	\$ -
PGE21033	Agricultural Continuous Energy Improvement	\$ 506,988	\$ 1,034,505	\$ 164,253			\$ -			\$ 870,252	\$ 506,988	\$ -
PGE21034	Agricultural Energy Advisor	\$ 4,259,648	\$ 5,446,223	\$ 5,280,136			\$ -			\$ 166,087	\$ 4,259,648	\$ -
PGE2102	Industrial Programs Total	\$ 11,938,780	\$ 14,896,434	\$ 12,571,310	\$ 1,000,000	\$ -	\$ 15,646,040	\$ -	\$ -	\$ 2,325,124	\$ 11,938,780	\$ -
PGE21021	Industrial Calculated Incentives	\$ 8,712,285	\$ 10,052,601	\$ 9,520,724	\$ 1,000,000		\$ 15,646,040			\$ 531,877	\$ 8,712,285	\$ -
PGE21022	Industrial Deemed Incentives	\$ 794,316	\$ (770)	\$ 1,275,032			\$ -			\$ (1,275,802)	\$ 794,316	\$ -
PGE21023	Industrial Continuous Energy Improvement	\$ 226,407	\$ 806,463	\$ 498,997			\$ -			\$ 307,466	\$ 226,407	\$ -
PGE21024	Industrial Energy Advisor	\$ 2,205,773	\$ 4,038,139	\$ 1,276,557			\$ -			\$ 2,761,583	\$ 2,205,773	\$ -
PGE21030	Industrial Strategic Energy Management	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE2104	Lighting Programs Total	\$ 13,551,559	\$ 13,998,772	\$ 11,882,102	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2,116,670	\$ 13,551,559	\$ (700,000)
PGE21041	Primary Lighting	\$ 11,188,130	\$ 12,981,250	\$ 10,718,482			\$ -			\$ 2,262,768	\$ 11,188,130	\$ -
PGE21042	Lighting Innovation	\$ 1,692,692	\$ (650,415)	\$ 912,958			\$ -			\$ (1,563,373)	\$ 1,692,692	\$ (700,000)
PGE21043	Lighting Market Transformation	\$ 670,738	\$ 1,667,938	\$ 250,663			\$ -			\$ 1,417,275	\$ 670,738	\$ -
PGE2105	Codes & Standards Programs Total	\$ 15,335,248	\$ 15,386,387	\$ 12,781,513	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2,604,873	\$ 15,335,248	\$ 279,921
PGE21051	Building Codes Advocacy	\$ 4,482,917	\$ 8,202,476	\$ 3,296,640			\$ -			\$ 4,905,837	\$ 4,482,917	\$ -
PGE21052	Appliance Standards Advocacy	\$ 4,407,361	\$ 3,298,213	\$ 5,129,082			\$ -			\$ (1,830,869)	\$ 4,407,361	\$ 279,921
PGE21053	Compliance Improvement	\$ 3,870,071	\$ 952,088	\$ 2,776,489			\$ -			\$ (1,824,401)	\$ 3,870,071	\$ -
PGE21054	Reach Codes	\$ 1,429,957	\$ 1,740,210	\$ 669,053			\$ -			\$ 1,071,157	\$ 1,429,957	\$ -
PGE21055	Planning and Coordination	\$ 1,144,942	\$ 1,193,401	\$ 910,251			\$ -			\$ 283,150	\$ 1,144,942	\$ -
PGE21056	Code Readiness	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE21057	National Codes & Standards Advocacy	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE2106	Emerging Technologies Programs Total	\$ 6,292,077	\$ 11,281,370	\$ 7,997,027	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 3,284,343	\$ 6,292,077	\$ -
PGE21061	Technology Development Support	\$ 452,119	\$ 391,364	\$ 1,220,896			\$ -			\$ (829,532)	\$ 452,119	\$ -
PGE21062	Technology Assessments	\$ 3,073,632	\$ 4,783,957	\$ 3,214,618			\$ -			\$ 1,569,339	\$ 3,073,632	\$ -
PGE21063	Technology Introduction Support	\$ 2,766,325	\$ 6,106,050	\$ 3,561,513			\$ -			\$ 2,544,536	\$ 2,766,325	\$ -
PGE2107	Workforce Education & Training Programs Total	\$ 12,561,342	\$ 13,706,885	\$ 10,853,110	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2,853,775	\$ 12,561,342	\$ (1,666,431)
PGE21071	Integrated Energy Education and Training	\$ 9,721,801	\$ 10,846,380	\$ 7,934,272			\$ -			\$ 2,912,108	\$ 9,721,801	\$ (823,631)
PGE21072	Connections	\$ 2,150,604	\$ 2,250,472	\$ 2,094,267			\$ -			\$ 156,205	\$ 2,150,604	\$ (808,292)
PGE21073	Strategic Planning	\$ 688,937	\$ 610,033	\$ 824,571			\$ -			\$ (214,539)	\$ 688,937	\$ (34,508)
PGE21076	Career and Workforce Readiness	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE2108	Statewide DSM Coordination & Integration Program Total	\$ 714,617	\$ 1,105,405	\$ (16,299)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,121,704	\$ 714,617	\$ -
PGE21081	Statewide DSM Coordination & Integration	\$ 714,617	\$ 1,105,405	\$ (16,299)			\$ -			\$ 1,121,704	\$ 714,617	\$ -
PGE2109	Financing Programs Total	\$ 5,568,714	\$ 37,954,871	\$ 8,205,515	\$ -	\$ (14,048,074)	\$ -	\$ 8,396,816	\$ 3,254,387	\$ 4,050,079	\$ 5,568,714	\$ (810,824)
PGE21091	On-Bill Financing (excludes Loan Pool)	\$ 3,537,010	\$ 3,913,046	\$ 4,010,097			\$ -			\$ (97,051)	\$ 3,537,010	\$ -
PGE21092	Third-Party Financing	\$ 2,031,703	\$ 5,538,183	\$ 1,391,053			\$ -			\$ 4,147,130	\$ 2,031,703	\$ (810,824)
PGE21093	New Financing Offerings [9]	\$ -	\$ 28,503,642	\$ 2,804,365		\$ (14,048,074)	\$ -	\$ 8,396,816	\$ 3,254,387	\$ -	\$ -	\$ -
PGE210911	On Bill Financing Alternative Pathway	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
	Third-Party Programs (Competitively Bid) Total	\$ 90,906,191	\$ 99,373,101	\$ 81,475,468	\$ -	\$ -	\$ 30,322,790	\$ -	\$ (105,704)	\$ 18,003,336	\$ 90,906,191	\$ (16,092,119)
PGE2100	Residential Third Party Programs SubTotal	\$ 10,188,301	\$ 9,282,160	\$ 9,596,381	\$ -	\$ -	\$ -	\$ -	\$ (105,704)	\$ (208,517)	\$ 10,188,301	\$ (1,945,117)
PGE21007	California New Homes Multifamily	\$ 3,801,408	\$ 3,754,223	\$ 2,289,801			\$ -			\$ 1,464,422	\$ 3,801,408	\$ (1,945,117)
PGE21008	Enhance Time Delay Relay	\$ 2,061,601	\$ 1,674,330	\$ 2,274,467			\$ -			\$ (600,137)	\$ 2,061,601	\$ -
PGE21009	Direct Install for Manufactured and Mobile Homes	\$ 4,325,292	\$ 3,750,358	\$ 5,018,394			\$ -		\$ (105,704)	\$ (1,162,332)	\$ 4,325,292	\$ -
PGE210132	RSG The Smarter Water Heater	\$ -	\$ 103,249	\$ 13,719			\$ -			\$ 89,531	\$ -	\$ -
PGE210011	Residential Energy Fitness Program	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE2101	Commercial Third Party Programs SubTotal	\$ 51,591,182	\$ 45,943,193	\$ 36,508,743	\$ -	\$ -	\$ 793,249	\$ -	\$ -	\$ 9,434,450	\$ 51,591,182	\$ (14,147,002)
PGE210110	Monitoring-Based Persistence Commissioning	\$ -	\$ (731,790)	\$ (655)			\$ -			\$ (731,236)	\$ -	\$ -
PGE210111	Lodging Savers	\$ 5,044,780	\$ 1,788,544	\$ 6,031,971			\$ -			\$ (4,243,427)	\$ 5,044,780	\$ -
PGE210112	School Energy Efficiency	\$ 3,421,431	\$ 3,507,961	\$ 3,653,297			\$ 457,173			\$ (145,356)	\$ 3,421,431	\$ -
PGE210113	Energy Fitness Program	\$ 2,940,737	\$ 3,698,416	\$ 871,914			\$ -			\$ 2,826,501	\$ 2,940,737	\$ (2,295,212)
PGE210114	Energy Savers	\$ 1,329,057	\$ 1,100,704	\$ 336,521			\$ -			\$ 764,183	\$ 1,329,057	\$ (1,019,905)
PGE210115	RightLights	\$ 5,211,807	\$ 5,185,416	\$ 1,230,837			\$ -			\$ 3,954,579	\$ 5,211,807	\$ (4,030,253)
PGE210116	Small Business Commercial Comprehensive	\$ -	\$ 2,997,504	\$ (16,070)			\$ -			\$ 3,013,574	\$ -	\$ -
PGE210117	Energy-Efficient Parking Garage	\$ -	\$ 552,404	\$ (9,831)			\$ -			\$ 562,235	\$ -	\$ -
PGE210118	Retail Energy Efficiency	\$ 1,414,293	\$ (439,517)	\$ 2,169,000			\$ -			\$ (2,608,517)	\$ 1,414,293	\$ -
PGE210119	LED Accelerator	\$ 2,458,594	\$ (648,152)	\$ 4,099,974			\$ -			\$ (4,748,125)	\$ 2,458,594	\$ -
PGE210120	Monitoring-Based Commissioning	\$ -	\$ 81,414	\$ 48,111			\$ -			\$ 33,303	\$ -	\$ -
PGE210122	Casino Green	\$ 1,564,647	\$ 1,680,451	\$ 949,805			\$ -			\$ 730,646	\$ 1,564,647	\$ -
PGE210123	Healthcare Energy Efficiency Program	\$ 1,189,849	\$ 1,274,107	\$ 441,363			\$ 37,567			\$ 832,744	\$ 1,189,849	\$ -
PGE210124	Ozone Laundry Energy Efficiency	\$ -	\$ 714,953	\$ (2,216)			\$ -			\$ 717,169	\$ -	\$ -
PGE210125	California Preschool Energy Efficiency Program	\$ -	\$ 833,294	\$ (2,506)			\$ -			\$ 835,801	\$ -	\$ -
PGE210126	K-12 Private Schools and Colleges Audit Retro	\$ 1,844,726	\$ 1,655,196	\$ 1,079,552			\$ -			\$ 575,644	\$ 1,844,726	\$ -

Table 4 – Budget, Spent, Unspent, Carryover Details

New/Existing Program #	Main Program Name / Sub-Program Name	2013-2015 Budget, Spent, Unspent and Carryover									2016 Authorized Budget	2016 Fundshifts
		2015 Authorized Budget	2015 Total Budget with Commitments & Fundshifts [1]	2015 Total Budget Spent [2]	Requested Carry Over of Pre-2013 Unspent Funds to 2016 [3]	2013-2015 Unspent/Uncommitted Funds Refunded or Transferred	2013-2015 Commitments as of 12/31/15 [5]	2013-2015 Unspent/Committed Funds, Carryover to 2017 [6]	2013-2015 Cycle Expenditures Spent in 2016	Pre-2016 Unspent/Uncommitted Funds Available for 2017 offset [E-F+H-J-K] [7]		
PGE210127	Innovative Designs for Energy Efficiency Approaches (IDEEA)	\$ 11,844,521	\$ 2,744,592	\$ 25,320			\$ -			\$ 2,719,272	\$ 11,844,521	\$ (1,572,398)
PGE210128	Enovity SMART	\$ -	\$ 1,048,790	\$ 1,644,827			\$ 3,940			\$ (596,037)	\$ -	\$ -
PGE210129	Nexant AERCx	\$ -	\$ 1,590,139	\$ 504,317			\$ -			\$ 1,085,822	\$ -	\$ -
PGE210130	CLEAResult AERCx	\$ -	\$ 1,112,781	\$ 681,424			\$ -			\$ 431,356	\$ -	\$ -
PGE210131	PECI AERCx	\$ -	\$ 510,892	\$ 483,003			\$ -			\$ 27,889	\$ -	\$ -
PGE210136	McKinstry Laboratory Fume Hoods	\$ -	\$ 510,494	\$ 603,373			\$ -			\$ (92,879)	\$ -	\$ -
PGE210137	Waypoint Commercial Outreach	\$ -	\$ 313,678	\$ 864,820			\$ -			\$ (551,142)	\$ -	\$ -
PGE210138	Data Center Air Flow and Temp Optimization	\$ -	\$ 278,436	\$ 206,590			\$ -			\$ 71,846	\$ -	\$ -
PGE210139	SEI Energize Schools Program	\$ -	\$ (5,322)	\$ 537,061			\$ -			\$ (542,383)	\$ -	\$ -
PGE210140	Mazzetti Dynamic Gas Scavenging System	\$ -	\$ 177,533	\$ 33,092			\$ -			\$ 144,441	\$ -	\$ -
PGE210141	Lincus Commercial Mid-Market Program	\$ -	\$ 333,645	\$ 835,586			\$ -			\$ (501,941)	\$ -	\$ -
PGE210143	Hospitality Program	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ (2,049,313)
PGE21016	Air Care Plus	\$ 3,784,067	\$ 6,155,564	\$ 2,312,688			\$ -			\$ 3,842,877	\$ 3,784,067	\$ (3,179,921)
PGE21017	Boiler Energy Efficiency Program	\$ 2,086,213	\$ 1,896,072	\$ 916,103			\$ 294,569			\$ 979,970	\$ 2,086,213	\$ -
PGE21018	EnergySmart Grocer	\$ 7,456,460	\$ 5,552,209	\$ 5,896,030			\$ -			\$ (343,822)	\$ 7,456,460	\$ -
PGE21019	Enhanced Automation Initiative	\$ -	\$ 472,786	\$ 83,344			\$ -			\$ 389,442	\$ -	\$ -
PGE2103	Agricultural Third Party Programs SubTotal	\$ 8,227,091	\$ 10,018,743	\$ 11,457,071	\$ -	\$ -	\$ 2,118,541	\$ -	\$ -	\$ (1,438,328)	\$ 8,227,091	\$ -
PGE210310	Dairy Industry Resource Advantage Pgm	\$ 1,480,754	\$ (209,110)	\$ 2,298,717			\$ 747,830			\$ (2,507,828)	\$ 1,480,754	\$ -
PGE210311	Process Wastewater Treatment EM Pgm for Ag Food Processing	\$ 1,065,359	\$ 963,909	\$ 752,412			\$ 496,655			\$ 211,497	\$ 1,065,359	\$ -
PGE210312	Dairy and Winery Industry Efficiency Solutions	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE210133	Staples Low Pressure Irrigation DI	\$ -	\$ 1,155,851	\$ 1,250,631			\$ -			\$ (94,779)	\$ -	\$ -
PGE21035	Dairy Energy Efficiency Program	\$ 472,638	\$ 562,401	\$ 467,690			\$ -			\$ 94,710	\$ 472,638	\$ -
PGE21036	Industrial Refrigeration Performance Plus	\$ 1,419,916	\$ 2,135,688	\$ 992,145			\$ 399,735			\$ 1,143,543	\$ 1,419,916	\$ -
PGE21037	Light Exchange Program	\$ 1,046,700	\$ 819,308	\$ 578,448			\$ -			\$ 240,859	\$ 1,046,700	\$ -
PGE21038	Wine Industry Efficiency Solutions	\$ 1,677,221	\$ 2,486,505	\$ 2,084,509			\$ 474,322			\$ 401,996	\$ 1,677,221	\$ -
PGE21039	Comprehensive Food Process Audit & Resource Efficiency Pgm	\$ 1,064,504	\$ 2,104,192	\$ 3,032,519			\$ -			\$ (928,327)	\$ 1,064,504	\$ -
PGE2102	Industrial Third Party Programs SubTotal	\$ 20,899,617	\$ 34,351,982	\$ 23,630,116	\$ -	\$ -	\$ 27,411,000	\$ -	\$ -	\$ 10,721,867	\$ 20,899,617	\$ -
PGE210210	Industrial Recommissioning Program	\$ 1,372,850	\$ 3,071,471	\$ 1,335,323			\$ 1,373,897			\$ 1,736,148	\$ 1,372,850	\$ -
PGE210211	Light Industrial Energy Efficiency	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE210212	Industrial Compressed Air System Efficiency	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE210213	Small Petrochemical Energy Efficiency	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE21025	California Wastewater Process Optimization	\$ 995,518	\$ 1,238,167	\$ 595,695			\$ 253,266			\$ 642,472	\$ 995,518	\$ -
PGE21026	Energy Efficiency Services for Oil Production	\$ 4,475,267	\$ 6,259,122	\$ 3,234,535			\$ 2,273,622			\$ 3,024,586	\$ 4,475,267	\$ -
PGE21027	Heavy Industry Energy Efficiency Program	\$ 11,067,518	\$ 15,001,729	\$ 13,037,517			\$ 14,709,712			\$ 1,964,212	\$ 11,067,518	\$ -
PGE21028	Industrial Compressed Air Program	\$ 1,678,196	\$ 1,070,652	\$ 376,427			\$ 201,081			\$ 694,225	\$ 1,678,196	\$ -
PGE21029	Refinery Energy Efficiency Program	\$ 1,310,269	\$ 6,414,950	\$ 2,090,205			\$ 8,589,844			\$ 4,324,745	\$ 1,310,269	\$ -
PGE210135	Lincus WISE	\$ -	\$ 583,483	\$ 2,828,643			\$ 9,577			\$ (2,245,159)	\$ -	\$ -
PGE210142	Ameresco Intelligent Energy Efficiency	\$ -	\$ 712,408	\$ 131,771			\$ -			\$ 580,638	\$ -	\$ -
PGE2107	Workforce Education & Training Third Party Programs SubTotal	\$ -	\$ (222,977)	\$ 283,158	\$ -	\$ -	\$ -	\$ -	\$ -	\$ (506,135)	\$ -	\$ -
PGE21074	Builder Energy Code Training	\$ -	\$ (81,650)	\$ 11,523			\$ -			\$ (93,173)	\$ -	\$ -
PGE21075	Green Building Technical Support Services	\$ -	\$ (205,549)	\$ 4,699			\$ -			\$ (210,248)	\$ -	\$ -
PGE210134	Bridges to Energy Sector Opportunities	\$ -	\$ 64,221	\$ 266,936			\$ -			\$ (202,714)	\$ -	\$ -
PGE2110	Government Partnership Programs Total	\$ 72,321,914	\$ 78,908,455	\$ 68,224,688	\$ -	\$ -	\$ 9,189,905	\$ -	\$ -	\$ 10,683,768	\$ 72,321,914	\$ (3,296,953)
PGE2110011	California Community Colleges	\$ 3,495,392	\$ 2,959,452	\$ 2,450,565			\$ 2,127,113			\$ 508,887	\$ 3,495,392	\$ -
PGE2110012	University of California/California State University	\$ 11,801,373	\$ 11,156,606	\$ 5,666,056			\$ 5,998,323			\$ 5,490,550	\$ 11,801,373	\$ (3,296,953)
PGE2110013	State of California	\$ 1,423,968	\$ 4,447,501	\$ 446,349			\$ 365,262			\$ 4,001,152	\$ 1,423,968	\$ -
PGE2110014	Department of Corrections and Rehabilitation	\$ 3,199,909	\$ 4,309,041	\$ 357,993			\$ 510,033			\$ 3,951,048	\$ 3,199,909	\$ -
PGE2110051	Local Government Energy Action Resources (LGEAR)	\$ 5,500,535	\$ 5,079,566	\$ 10,810,840			\$ -			\$ (5,731,275)	\$ 5,500,535	\$ -
PGE2110052	Strategic Energy Resources	\$ 2,764,003	\$ (6,527,308)	\$ 7,508,767			\$ -			\$ (14,036,074)	\$ 2,764,003	\$ -
PGE211007	Association of Monterey Bay Area Governments (AMBAG)	\$ 3,581,301	\$ 3,173,251	\$ 4,213,849			\$ 103,697			\$ (1,040,598)	\$ 3,581,301	\$ -
PGE211009	East Bay	\$ 9,262,008	\$ 11,273,322	\$ 6,720,458			\$ -			\$ 4,552,865	\$ 9,262,008	\$ -
PGE211010	Fresno	\$ 3,846,492	\$ 7,730,350	\$ 3,130,833			\$ -			\$ 4,599,517	\$ 3,846,492	\$ -
PGE211011	Kern	\$ 3,194,412	\$ 4,669,107	\$ 2,811,185			\$ 8,692			\$ 1,857,922	\$ 3,194,412	\$ -
PGE211012	Madera	\$ 445,314	\$ 851,041	\$ 436,007			\$ -			\$ 415,034	\$ 445,314	\$ -
PGE211013	Marin County	\$ 1,334,743	\$ 1,784,706	\$ 1,179,302			\$ 11,000			\$ 605,404	\$ 1,334,743	\$ -
PGE211014	Mendocino/Lake County	\$ 322,506	\$ 295,006	\$ 626,591			\$ -			\$ (331,586)	\$ 322,506	\$ -
PGE211015	Napa County	\$ 549,632	\$ 376,214	\$ 519,326			\$ -			\$ (143,112)	\$ 549,632	\$ -
PGE211016	Redwood Coast	\$ 1,556,910	\$ 2,057,613	\$ 1,474,416			\$ -			\$ 583,197	\$ 1,556,910	\$ -
PGE211018	San Luis Obispo County	\$ 936,840	\$ 279,466	\$ 878,220			\$ -			\$ (598,754)	\$ 936,840	\$ -
PGE211019	San Mateo County	\$ 1,744,567	\$ 950,687	\$ 2,625,108			\$ 52,748			\$ (1,674,422)	\$ 1,744,567	\$ -

PA Name: Pacific Gas and Electric Company
Budget Year: 2019

Table 4 – Budget, Spent, Unspent, Carryover Details

2013-2015 Budget, Spent, Unspent and Carryover												
New/Existing Program #	Main Program Name / Sub-Program Name	2015 Authorized Budget	2015 Total Budget with Commitments & Fundshifts [1]	2015 Total Budget Spent [2]	Requested Carry Over of Pre-2013 Unspent Funds to 2016 [3]	2013-2015 Unspent/Uncommitted Funds Refunded or Transferred	2013-2015 Commitments as of 12/31/15 [5]	2013-2015 Unspent/Committed Funds, Carryover to 2017 [6]	2013-2015 Cycle Expenditures Spent in 2016	Pre-2016 Unspent/Uncommitted Funds Available for 2017 offset [E-F+H-J-K] [7]	2016 Authorized Budget	2016 Fundshifts
PGE211020	Santa Barbara	\$ 1,184,837	\$ 1,368,579	\$ 966,840			\$ -			\$ 401,739	\$ 1,184,837	\$ -
PGE211021	Sierra Nevada	\$ 2,560,460	\$ 2,643,277	\$ 1,954,601			\$ -			\$ 688,676	\$ 2,560,460	\$ -
PGE211022	Sonoma County	\$ 1,709,718	\$ 2,364,100	\$ 2,226,417			\$ 9,885			\$ 137,683	\$ 1,709,718	\$ -
PGE211023	Silicon Valley	\$ 4,074,436	\$ 5,306,242	\$ 4,609,175			\$ 3,151			\$ 697,068	\$ 4,074,436	\$ -
PGE211024	San Francisco	\$ 7,832,558	\$ 12,360,636	\$ 6,611,788			\$ -			\$ 5,748,848	\$ 7,832,558	\$ -
PGE211026	North Valley	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE211027	Sutter Buttes	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE211028	Yolo	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE211029	Solano	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE211030	Northern San Joaquin Valley	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
PGE211031	Valley Innovative Energy Watch (VIEW)	\$ -	\$ -	\$ -			\$ -			\$ -	\$ -	\$ -
	Funds to be returned in rates [4]	\$ -	\$ -	\$ -		\$ (43,024,402)	\$ -			\$ (43,024,402)	\$ -	\$ -
	2013-2015 funds transferred to REN and CCA balancing accounts for 2016 [6]	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 4,066,080	\$ -	\$ (4,066,080)	\$ -	\$ (4,066,080)
	Pre-2013 Unspent Funds transferred to 2016 Commercial Deemed Incentives program [3]				\$ 9,900,000					\$ -		\$ (9,900,000)
	PG&E PROGRAM TOTAL	\$ 388,848,756	\$ 473,947,429	\$ 401,310,184	\$ 22,458,035	\$ (57,072,476)	\$ 95,670,275	\$ 12,462,896	\$ 3,026,388	\$ 75,485	\$ 388,848,756	\$ (4,066,080)
EM&V	EM&V (PA & CPUC Portions) Total	\$ 17,204,418	\$ 43,427,745	\$ 14,196,403	\$ 2,261,982	\$ -	\$ 29,231,342	\$ 18,873,781	\$ 9,360,310	\$ 997,251	\$ 17,204,418	\$ -
PGE_EMV	PG&E EM&V - CPUC	\$ 12,200,968	\$ 33,361,125	\$ 10,473,870	\$ 880,380	\$ -	\$ 22,887,233	\$ 16,149,179	\$ 6,738,076	\$ -	\$ 12,200,968	\$ -
PGE_EMV	PG&E EM&V - PG&E	\$ 5,003,450	\$ 10,066,620	\$ 3,722,532	\$ 1,381,602	\$ -	\$ 6,344,110	\$ 2,724,603	\$ 2,622,234	\$ 997,251	\$ 5,003,450	\$ -
PGE_EMV	BayREN EM&V - CPUC	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE_EMV	BayREN EM&V	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE_EMV	MCE EM&V - CPUC	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE_EMV	MCE EM&V	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE_EMV	3C REN EM&V - CPUC	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE_EMV	3C REN EM&V	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	PG&E TOTAL with EM&V	\$ 406,053,174	\$ 517,375,174	\$ 415,506,587	\$ 24,720,017	\$ (57,072,476)	\$ 124,901,618	\$ 31,336,678	\$ 12,386,697	\$ 1,072,736	\$ 406,053,174	\$ (4,066,080)
PGE_BayREN	BayREN [10]	\$ 12,837,000	\$ 18,163,894	\$ 14,403,008	\$ -		\$ -	\$ 3,760,885		\$ -	\$ 12,837,000	\$ 3,700,000
PGE_MCE	Marin Clean Energy [10]	\$ 1,220,267	\$ 1,420,267	\$ 124,539	\$ -	\$ (1,082,708)	\$ -	\$ 36,182	\$ -	\$ (81,441)	\$ 1,220,267	\$ 366,080
PGE_3C REN	3C REN [10]	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	TOTAL PG&E EE EXPENSE PORTFOLIO	\$ 420,110,441	\$ 536,959,334	\$ 430,034,134	\$ 24,720,017	\$ (58,155,184)	\$ 124,901,618	\$ 35,133,745	\$ 12,386,697	\$ 991,295	\$ 420,110,441	\$ -
PGE21091LP	OBF REVOLVING LOAN POOL	\$ 10,000,000	\$ 32,528,389	\$ 6,532,126	\$ -	\$ -	\$ -	\$ 15,682,517	\$ -	\$ -	\$ 10,000,000	\$ -
	TOTAL PG&E EE PORTFOLIO	\$ 430,110,441	\$ 569,487,724	\$ 436,566,260	\$ 24,720,017	\$ (58,155,184)	\$ 124,901,618	\$ 50,816,262	\$ 12,386,697	\$ 991,295	\$ 430,110,441	\$ -
	Other EE-Related Budgets											
PGE_SWMEO	Statewide Marketing, Education and Outreach Program Total	\$ 7,655,061	\$ 6,090,704	\$ 7,620,318	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 8,445,775	\$ -
PGE_SWMEO	Statewide Marketing, Education and Outreach Program (Flex Alert) [11]	\$ 1,590,250	\$ 909,877	\$ 1,591,046	\$ -	\$ -	\$ -	\$ -	\$ -		\$ -	\$ -
PGE_SWMEO	Statewide Marketing, Education and Outreach Program [11]	\$ 6,064,811	\$ 5,180,827	\$ 6,029,272	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 8,445,775	\$ -

Notes:

- "2015 Total Budget with Commitments & Fundshifts" reflects funds available for 2015, from the authorized 2013-2015 Budget, less the spending in 2013 - 2014 from the 2013 - 2015 Budget.
- "2015 Total Budget Spent" includes spending in 2015 paid from the 2013 - 2015 Budget.
- "Requested Carry Over of pre-2013 Unspent Funds to 2016" identifies the funds PG&E is requesting to carry over to 2016 in supplemental Advice 3752-G-B/4905-E-B, which was approved on November 2, 2016. In addition to the amounts identified at the subprogram level in column G, PG&E was approved authorization to shift \$9.9m of pre-2013 unspent funds into the Commercial Deemed Incentive program 2016 budget.
- The CPUC approved AL 3718-G/4852-E on July 11, 2016, authorizing PG&E to return a total of \$43,024,401.85 in unspent, uncommitted energy efficiency funds from its 2013-2015 program cycle to its customers; PG&E implemented this through a one-time adjustment to its gas and electric EE balancing accounts.
- Commitments as of 12/31/2015 (column I), 12/31/2016 (column R), and 12/31/2017 (column Y) includes incentive Commitments as of the end of the year indicated. Contractual encumbrances are not reflected. BayREN and MCE Carry Over figures represent the level of funds in PG&E's balancing accounts; this may include BayREN expenses or MCE gas expenses not yet invoiced to or accrued by PG&E as of the year indicated; the remainder is the amount potentially available for carry over; these may not match MCE or BayREN submissions.
- 2013-2015 Unspent/Committed Funds, Carryover to 2016" Identifies unspent, committed funds that are carried over into 2016 and augment the 2016 budget, in accordance with D.12-11-015, as follows:

New Financing Offerings: In D. 15-06-008, the Commission ordered that PG&E operate for a minimum of 24 months from the point at which each pilot program enrolls its first loan. The Pilots have begun enrolling loans in 2016 indicating that the pilots will run until at least 2018. New financing pilot subprogram funds collected during 2013-2014 period are being carried over to continue to operate during this compliance period.

Funds Transferred to REN and CCA balancing accounts: In D.16-05-004 (petition to modify D.14-10-046), effective May 12, 2016, the Commission authorized for Marin Clean Energy (MCE) an annual budget increase of \$366,080 for the duration of the ten-year rolling portfolio cycle unless and until modified by the Commission. The CPUC approved AL 3718-G/4852-E on July 11, 2016, authorizing PG&E to use unspent 2013-2015 unspent funds to fund the increase in MCE's 2016 budget. Advice Letter 3704-G/4826-E, effective April 29, 2016, authorized for BayREN a one-time budget increase of \$3,700,000 transferred from unspent 2013-2015 cycle EE funds to the 2016 cycle.

Marin Clean Energy: MCE's 2015 authorized gas budget included \$419,000. The Commission authorized a gas budget of \$219,000 in D.14-10-046 and augmented the gas budget by \$200,000 per PG&E Advice 3642-G/4720-E, filed 10/15/2015, approved 10/28/2015. After \$382,818 of gas payments from PG&E to MCE, \$36,182 is available for carryover to 2016.
- "Pre-2016 unspent/uncommitted funds available for 2017 offset" identifies 2013–2015 cycle unspent funds at the program level. The balancing account transfer for \$43 million of funds refunded to customers based on Advice Letter 3718-G/4852-E is identified on Row 154. Unspent funds from 2009 and 2010–2012 are represented in Column G. In 2017 PG&E recorded a one-time electric EE balancing account adjustment of \$230,474 crediting customer rates for unspent 2015-2016 Marin Clean Energy Electric funds. In the 2018 ABAL, it had been pointed out that of the \$230,474, a refund should have occurred in the amount of \$311,915 from the 2016 cycle, while an increase of \$81,441 should have been applied to the 2013-2015 cycle.
- "2019 Proposed Budget" reflects the budget request for 2019, which differs from the collections requested through this advice letter of approximately \$408.8 million.
- Advice Letter 3589-G-C/4624-E-C, approved June 29, 2015, effective June 25, 2015 established the Energy Efficiency Financing Balancing Account (EEFBA), and the Credit Enhancement Balance Account (CEBA) and the On-Bill Financing Balancing Account (OBFBA) subaccounts. The \$14 million referenced in cell H57 was transferred to the CEBA subaccount.
- BayREN, MCE and 3C-REN figures generally represent the level of funds in PG&E's balancing accounts and may not match MCE or BayREN submissions.
- Statewide ME&O budgets for 2017 through 2019 were approved in Advice Letter 3783-G/4963-E on January 23, 2017, effective November 28, 2016. The portion of SW ME&O allocated to EE is reflected in PG&E's cost effectiveness calculations.
- The "2018 Authorized Budget" in Table 4 represents PG&E's 2018 CEDARS filing budget at the subprogram level detail, and BayREN and MCE's approved budgets per the Business Plan Decision D.18-05-041. This budget is lower than PG&E's 2018 portfolio budget of \$416,713,780, also approved in D.18-05-041. Subprogram level detail is unavailable in the approved Business Plan budget.
- 2019 BayREN and MCE budgets are the authorized amounts from the Business Plan decision D.18-05-041, with their EM&V budgets increased to be 4% of their total budget.
- 2019 3C-REN budget is the proposed contribution for PG&E as circulated by 3C-REN on August 28, 2018, which includes 4% EM&V.

PA Name: Pacific Gas and Electric Company
Budget Year: 2019

Table 4 – Budget, Spent, Unspent, Carryover Details

2016 Budget, Spent, Unspent and Carryover							2017 Budget, Fundshifts and Spending to Date							
New/Existing Program #	Main Program Name / Sub-Program Name	2016 Total Budget with Commitments & Fundshifts (G+J+M+N)	2016 Cycle Expenditures Spent in 2016	2016 Unspent/Uncommitted Funds Returned to Ratepayers	2016 Commitments as of 12/31/16 [5]	2016 Unspent/Uncommitted Funds Available for 2018 offset	2017 Authorized Budget	2017 Fundshifts	2017 Total Budget	2017 Cycle Expenditures Spent in 2017	2016 Unspent/Uncommitted Funds Returned to Ratepayers	2017 Commitments as of 12/31/17 [5]	2017 Unspent/Uncommitted Funds Available for 2018 offset	2018 Authorized Budget [12]
PGE2100	Residential Energy Efficiency Programs Total	\$ 77,606,242	\$ 77,606,242	\$ -	\$ 10,622,188	\$ -	\$ 62,652,625	-	\$ 62,652,625	\$ 52,797,764	\$ -	\$ 275,011	\$ -	\$ 55,622,926
PGE21001	Residential Energy Advisor	\$ 16,031,293	\$ 17,534,364	\$ -	\$ -	\$ -	\$ 16,998,320	-	\$ 16,998,320	\$ 13,355,709	\$ -	\$ -	\$ -	\$ 14,692,263
PGE21002	Plug Load and Appliances	\$ 18,990,738	\$ 13,641,352	\$ -	\$ 303	\$ -	\$ 12,175,962	-	\$ 12,175,962	\$ 11,396,952	\$ -	\$ 176,200	\$ -	\$ 10,600,377
PGE21003	Multifamily Energy Efficiency	\$ 1,839,507	\$ 675,488	\$ -	\$ -	\$ -	\$ 677,058	-	\$ 677,058	\$ 126,806	\$ -	\$ -	\$ -	\$ 6,779,725
PGE21004	Energy Upgrade California	\$ 22,257,546	\$ 24,947,402	\$ -	\$ -	\$ -	\$ 14,514,755	-	\$ 14,514,755	\$ 17,690,082	\$ -	\$ 53,440	\$ -	\$ 10,707,759
PGE21005	Residential New Construction	\$ 8,458,299	\$ 7,179,186	\$ -	\$ 10,621,885	\$ -	\$ 5,947,372	-	\$ 5,947,372	\$ 6,721,490	\$ -	\$ -	\$ -	\$ 6,770,695
PGE21006	Residential HVAC	\$ 10,028,860	\$ 13,628,451	\$ -	\$ -	\$ -	\$ 9,515,664	-	\$ 9,515,664	\$ 3,160,623	\$ -	\$ 45,371	\$ -	\$ 5,318,382
PGE210010	Pay for Performance Pilot	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2,823,495	-	\$ 2,823,495	\$ 346,104	\$ -	\$ -	\$ -	\$ 753,726
PGE2101	Commercial Programs Total	\$ 106,973,507	\$ 99,034,373	\$ -	\$ 13,647,258	\$ -	\$ 70,945,809	-	\$ 70,945,809	\$ 57,892,760	\$ -	\$ 12,350,081	\$ -	\$ 64,732,629
PGE21011	Commercial Calculated Incentives	\$ 31,815,093	\$ 19,123,362	\$ -	\$ 9,584,741	\$ -	\$ 22,085,875	-	\$ 22,085,875	\$ 12,720,207	\$ -	\$ 6,729,118	\$ -	\$ 23,262,758
PGE211025	Savings by Design (SBD)	\$ 10,637,119	\$ 6,734,513	\$ -	\$ 3,107,426	\$ -	\$ 6,136,870	-	\$ 6,136,870	\$ 4,727,014	\$ -	\$ 3,997,568	\$ -	\$ 9,111,221
PGE21012	Commercial Deemed Incentives	\$ 39,772,890	\$ 54,790,353	\$ -	\$ 955,090	\$ -	\$ 20,590,599	-	\$ 20,590,599	\$ 23,189,689	\$ -	\$ 1,335,834	\$ -	\$ 19,367,904
PGE21013	Commercial Continuous Energy Improvement	\$ 491,754	\$ 988,777	\$ -	\$ -	\$ -	\$ 1,361,810	-	\$ 1,361,810	\$ 398,924	\$ -	\$ -	\$ -	\$ 240,150
PGE21014	Commercial Energy Advisor	\$ 5,979,427	\$ 4,459,100	\$ -	\$ -	\$ -	\$ 4,645,605	-	\$ 4,645,605	\$ 1,783,055	\$ -	\$ -	\$ -	\$ 2,123,638
PGE21015	Commercial HVAC	\$ 18,277,223	\$ 12,938,268	\$ -	\$ -	\$ -	\$ 16,125,050	-	\$ 16,125,050	\$ 15,073,871	\$ -	\$ 287,561	\$ -	\$ 10,626,958
PGE2103	Agricultural Programs Total	\$ 18,823,008	\$ 18,262,460	\$ -	\$ 2,927,707	\$ -	\$ 15,416,439	-	\$ 15,416,439	\$ 13,473,189	\$ -	\$ 2,450,731	\$ -	\$ 17,238,326
PGE21031	Agricultural Calculated Incentives	\$ 10,240,375	\$ 5,747,440	\$ -	\$ 2,852,046	\$ -	\$ 5,384,644	-	\$ 5,384,644	\$ 3,359,466	\$ -	\$ 2,375,927	\$ -	\$ 9,155,062
PGE21032	Agricultural Deemed Incentives	\$ 3,815,997	\$ 8,068,249	\$ -	\$ 75,661	\$ -	\$ 5,677,746	-	\$ 5,677,746	\$ 7,337,881	\$ -	\$ 73,664	\$ -	\$ 4,758,784
PGE21033	Agricultural Continuous Energy Improvement	\$ 506,988	\$ 197,629	\$ -	\$ -	\$ -	\$ 226,700	-	\$ 226,700	\$ 70,219	\$ -	\$ -	\$ -	\$ 67,740
PGE21034	Agricultural Energy Advisor	\$ 4,259,648	\$ 4,249,142	\$ -	\$ -	\$ -	\$ 4,127,350	-	\$ 4,127,350	\$ 2,705,623	\$ -	\$ 1,140	\$ -	\$ 3,256,739
PGE2102	Industrial Programs Total	\$ 12,938,780	\$ 11,052,656	\$ -	\$ 12,939,997	\$ -	\$ 13,060,791	\$ -	\$ 13,060,791	\$ 10,692,100	\$ -	\$ 2,297,869	\$ -	\$ 18,155,388
PGE21021	Industrial Calculated Incentives	\$ 9,712,285	\$ 6,422,285	\$ -	\$ 12,850,024	\$ -	\$ 8,899,910	-	\$ 8,899,910	\$ 8,670,968	\$ -	\$ 2,229,456	\$ -	\$ 12,115,800
PGE21022	Industrial Deemed Incentives	\$ 794,316	\$ 2,982,574	\$ -	\$ 89,973	\$ -	\$ 2,141,873	-	\$ 2,141,873	\$ 1,475,622	\$ -	\$ 68,413	\$ -	\$ 4,157,505
PGE21023	Industrial Continuous Energy Improvement	\$ 226,407	\$ 393,031	\$ -	\$ -	\$ -	\$ 135,480	-	\$ 135,480	\$ 82,159	\$ -	\$ -	\$ -	\$ 67,233
PGE21024	Industrial Energy Advisor	\$ 2,205,773	\$ 1,254,766	\$ -	\$ -	\$ -	\$ 1,511,322	-	\$ 1,511,322	\$ 305,034	\$ -	\$ -	\$ -	\$ 597,692
PGE21030	Industrial Strategic Energy Management	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 372,206	-	\$ 372,206	\$ 158,316	\$ -	\$ -	\$ -	\$ 1,217,158
PGE2104	Lighting Programs Total	\$ 12,851,559	\$ 12,732,856	\$ -	\$ -	\$ -	\$ 12,082,245	-	\$ 12,082,245	\$ 11,746,184	\$ -	\$ 58,461	\$ -	\$ 11,131,075
PGE21041	Primary Lighting	\$ 11,188,130	\$ 11,879,081	\$ -	\$ -	\$ -	\$ 10,970,646	-	\$ 10,970,646	\$ 11,245,149	\$ -	\$ 58,461	\$ -	\$ 10,711,690
PGE21042	Lighting Innovation	\$ 992,692	\$ 669,673	\$ -	\$ -	\$ -	\$ 734,898	-	\$ 734,898	\$ 387,383	\$ -	\$ -	\$ -	\$ 357,652
PGE21043	Lighting Market Transformation	\$ 670,738	\$ 184,102	\$ -	\$ -	\$ -	\$ 376,702	-	\$ 376,702	\$ 113,652	\$ -	\$ -	\$ -	\$ 61,733
PGE2105	Codes & Standards Programs Total	\$ 15,615,169	\$ 15,615,169	\$ -	\$ -	\$ -	\$ 17,113,967	-	\$ 17,113,967	\$ 16,216,003	\$ -	\$ -	\$ -	\$ 16,183,839
PGE21051	Building Codes Advocacy	\$ 4,482,917	\$ 4,087,284	\$ -	\$ -	\$ -	\$ 4,297,883	-	\$ 4,297,883	\$ 4,228,535	\$ -	\$ -	\$ -	\$ 4,331,109
PGE21052	Appliance Standards Advocacy	\$ 4,687,282	\$ 5,650,393	\$ -	\$ -	\$ -	\$ 6,076,435	-	\$ 6,076,435	\$ 4,698,784	\$ -	\$ -	\$ -	\$ 4,774,497
PGE21053	Compliance Improvement	\$ 3,870,071	\$ 4,182,764	\$ -	\$ -	\$ -	\$ 4,347,595	-	\$ 4,347,595	\$ 4,652,165	\$ -	\$ -	\$ -	\$ 4,044,129
PGE21054	Reach Codes	\$ 1,429,957	\$ 597,935	\$ -	\$ -	\$ -	\$ 526,723	-	\$ 526,723	\$ 518,145	\$ -	\$ -	\$ -	\$ 604,747
PGE21055	Planning and Coordination	\$ 1,144,942	\$ 531,663	\$ -	\$ -	\$ -	\$ 504,030	-	\$ 504,030	\$ 481,879	\$ -	\$ -	\$ -	\$ 650,922
PGE21056	Code Readiness	\$ -	\$ 565,130	\$ -	\$ -	\$ -	\$ 1,361,301	-	\$ 1,361,301	\$ 1,636,495	\$ -	\$ -	\$ -	\$ 1,778,436
PGE21057	National Codes & Standards Advocacy	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE2106	Emerging Technologies Programs Total	\$ 6,292,077	\$ 5,821,061	\$ -	\$ -	\$ -	\$ 7,930,755	-	\$ 7,930,755	\$ 4,193,096	\$ -	\$ -	\$ -	\$ 5,629,976
PGE21061	Technology Development Support	\$ 452,119	\$ 747,678	\$ -	\$ -	\$ -	\$ 1,416,527	-	\$ 1,416,527	\$ 782,379	\$ -	\$ -	\$ -	\$ 942,398
PGE21062	Technology Assessments	\$ 3,073,632	\$ 1,815,758	\$ -	\$ -	\$ -	\$ 2,544,857	-	\$ 2,544,857	\$ 1,294,627	\$ -	\$ -	\$ -	\$ 1,929,215
PGE21063	Technology Introduction Support	\$ 2,766,325	\$ 3,257,624	\$ -	\$ -	\$ -	\$ 3,969,371	-	\$ 3,969,371	\$ 2,116,091	\$ -	\$ -	\$ -	\$ 2,758,363
PGE2107	Workforce Education & Training Programs Total	\$ 10,894,911	\$ 10,166,215	\$ -	\$ -	\$ -	\$ 10,682,374	-	\$ 10,682,374	\$ 10,065,520	\$ -	\$ -	\$ -	\$ 11,038,180
PGE21071	Integrated Energy Education and Training	\$ 8,898,170	\$ 7,896,227	\$ -	\$ -	\$ -	\$ 8,733,939	-	\$ 8,733,939	\$ 7,928,260	\$ -	\$ -	\$ -	\$ 8,564,820
PGE21072	Connections	\$ 1,342,312	\$ 1,755,612	\$ -	\$ -	\$ -	\$ 1,328,476	-	\$ 1,328,476	\$ 1,725,513	\$ -	\$ -	\$ -	\$ 1,900,879
PGE21073	Strategic Planning	\$ 654,429	\$ 514,375	\$ -	\$ -	\$ -	\$ 619,959	-	\$ 619,959	\$ 411,746	\$ -	\$ -	\$ -	\$ 572,481
PGE21076	Career and Workforce Readiness	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE2108	Statewide DSM Coordination & Integration Program Total	\$ 714,617	\$ 450,154	\$ -	\$ -	\$ -	\$ 547,921	-	\$ 547,921	\$ 135,577	\$ -	\$ -	\$ -	\$ 547,921
PGE21081	Statewide DSM Coordination & Integration	\$ 714,617	\$ 450,154	\$ -	\$ -	\$ -	\$ 547,921	-	\$ 547,921	\$ 135,577	\$ -	\$ -	\$ -	\$ 547,921
PGE2109	Financing Programs Total	\$ 13,154,706	\$ 3,957,816	\$ -	\$ -	\$ -	\$ 4,600,866	-	\$ 4,600,866	\$ 3,251,837	\$ -	\$ -	\$ -	\$ 4,158,662
PGE21091	On-Bill Financing (excludes Loan Pool)	\$ 3,537,010	\$ 3,115,051	\$ -	\$ -	\$ -	\$ 1,939,167	-	\$ 1,939,167	\$ 2,639,847	\$ -	\$ -	\$ -	\$ 3,141,013
PGE21092	Third-Party Financing	\$ 1,220,879	\$ 842,764	\$ -	\$ -	\$ -	\$ 942,678	-	\$ 942,678	\$ 550,872	\$ -	\$ -	\$ -	\$ 660,195
PGE21093	New Financing Offerings [9]	\$ 8,396,816	\$ -	\$ -	\$ -	\$ -	\$ 934,746	-	\$ 934,746	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210911	On Bill Financing Alternative Pathway	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 784,275	-	\$ 784,275	\$ 61,118	\$ -	\$ -	\$ -	\$ 357,454
PGE2100	Third-Party Programs (Competitively Bid) Total	\$ 74,814,071	\$ 58,186,155	\$ -	\$ 2,620,229	\$ -	\$ 86,532,089	-	\$ 86,532,089	\$ 58,282,454	\$ -	\$ 21,209,506	\$ -	\$ 75,653,627
PGE2100	Residential Third Party Programs SubTotal	\$ 8,243,184	\$ 8,768,360	\$ -	\$ 10,343	\$ -	\$ 9,667,015	-	\$ 9,667,015	\$ 11,357,494	\$ -	\$ 32,784	\$ -	\$ 13,319,768
PGE21007	California New Homes Multifamily	\$ 1,856,291	\$ 1,772,777	\$ -	\$ -	\$ -	\$ 1,828,344	-	\$ 1,828,344	\$ 1,277,592	\$ -	\$ -	\$ -	\$ 1,460,826
PGE21008	Enhance Time Delay Relay	\$ 2,061,601	\$ 2,676,931	\$ -	\$ 10,343	\$ -	\$ 2,902,239	-	\$ 2,902,239	\$ 3,058,715	\$ -	\$ 4,475	\$ -	\$ 1,536,619
PGE21009	Direct Install for Manufactured and Mobile Homes	\$ 4,325,292	\$ 3,743,310	\$ -	\$ -	\$ -	\$ 3,743,632	-	\$ 3,743,632	\$ 4,051,759	\$ -	\$ 3,371	\$ -	\$ 5,242,617
PGE210132	RSG The Smarter Water Heater	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210011	Residential Energy Fitness Program	\$ -	\$ 575,343	\$ -	\$ -	\$ -	\$ 1,192,800	-	\$ 1,192,800	\$ 2,969,428	\$ -	\$ 24,938	\$ -	\$ 5,079,706
PGE2101	Commercial Third Party Programs SubTotal	\$ 37,444,179	\$ 27,279,393	\$ -	\$ 1,784,984	\$ -	\$ 31,191,606	-	\$ 31,191,606	\$ 25,347,402	\$ -	\$ 11,310,117	\$ -	\$ 27,827,481
PGE210110	Monitoring-Based Persistence Commissioning	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210111	LodgingSavers	\$ 5,044,780	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210112	School Energy Efficiency	\$ 3,421,431	\$ 2,174,599	\$ -	\$ 485,773	\$ -	\$ 1,512,412	-	\$ 1,512,412	\$ 2,319,689	\$ -	\$ 228,165	\$ -	\$ 2,971,983
PGE210113	Energy Fitness Program	\$ 645,525	\$ 613,180	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ 29	\$ -	\$ -	\$ -	\$ -
PGE210114	Energy Savers	\$ 309,153	\$ 302,296	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210115	RightLights	\$ 1,181,553	\$ 1,089,928	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210116	Small Business Commercial Comprehensive	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210117	Energy-Efficient Parking Garage	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210118	Retail Energy Efficiency	\$ 1,414,293	\$ 1,448,343	\$ -	\$ 284,065	\$ -	\$ 3,856,419	-	\$ 3,856,419	\$ 596,194	\$ -	\$ -	\$ -	\$ -
PGE210119	LED Accelerator	\$ 2,458,594	\$ 529,771	\$ -	\$ 720	\$ -	\$ 4,174,961	-	\$ 4,174,961	\$ 2,685,760	\$ -	\$ 67,231	\$ -	\$ 2,995,445
PGE210120	Monitoring-Based Commissioning	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210122	Casino Green	\$ 1,564,647	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210123	Healthcare Energy Efficiency Program	\$ 1,189,849	\$ 935,964	\$ -	\$ -	\$ -	\$ 1,371,119	-	\$ 1,371,119	\$ 346,865	\$ -	\$ 436,641	\$ -	\$ 2,244,672
PGE210124	Ozone Laundry Energy Efficiency	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210125	California Preschool Energy Efficiency Program	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210126	K-12 Private Schools and Colleges Audit Retro	\$ 1,844,726	\$ 1,671,226	\$ -	\$ 28,107	\$ -	\$ 1,959,233	-	\$ 1,959,233	\$ 274,675	\$ -	\$ -	\$ -	\$ -

Table 4 – Budget, Spent, Unspent, Carryover Details

2016 Budget, Spent, Unspent and Carryover							2017 Budget, Fundshifts and Spending to Date							
New/Existing Program #	Main Program Name / Sub-Program Name	2016 Total Budget with Commitments & Fundshifts (G+J+M+N)	2016 Cycle Expenditures Spent in 2016	2016 Unspent/Uncommitted Funds Returned to Ratepayers	2016 Commitments as of 12/31/16 [5]	2016 Unspent/Uncommitted Funds Available for 2018 offset	2017 Authorized Budget	2017 Fundshifts	2017 Total Budget	2017 Cycle Expenditures Spent in 2017	2016 Unspent/Uncommitted Funds Returned to Ratepayers	2017 Commitments as of 12/31/17 [5]	2017 Unspent/Uncommitted Funds Available for 2018 offset	2018 Authorized Budget [12]
	Innovative Designs for Energy Efficiency Approaches (IDEEA)	\$ 10,272,122	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210127	Enovity SMART	\$ -	\$ 304,130	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ (196)	\$ -	\$ -	\$ -	\$ -
PGE210128	Nexant AERCx	\$ -	\$ 277,389	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ (0)	\$ -	\$ -	\$ -	\$ -
PGE210129	CLEAResult AERCx	\$ -	\$ 286,046	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ 147,432	\$ -	\$ -	\$ -	\$ -
PGE210130	PECI AERCx	\$ -	\$ (19,156)	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ 93,714	\$ -	\$ -	\$ -	\$ -
PGE210131	McKinstry Laboratory Fume Hoods	\$ -	\$ (26,114)	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210136	Waypoint Commercial Outreach	\$ -	\$ 598,588	\$ -	\$ -	\$ -	\$ 901,094	-	\$ 901,094	\$ 8,014	\$ -	\$ -	\$ -	\$ -
PGE210137	Data Center Air Flow and Temp Optimization	\$ -	\$ 251,159	\$ -	\$ -	\$ -	\$ 512,895	-	\$ 512,895	\$ 202,388	\$ -	\$ -	\$ -	\$ -
PGE210138	SEI Energize Schools Program	\$ -	\$ 517,681	\$ -	\$ -	\$ -	\$ 411,884	-	\$ 411,884	\$ 444,299	\$ -	\$ -	\$ -	\$ 316,125
PGE210139	Mazzetti Dynamic Gas Scavenging System	\$ -	\$ 97	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210140	Lincus Commercial Mid-Market Program	\$ -	\$ 5,459	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210141	Hospitality Program	\$ (2,049,313)	\$ 9,748,754	\$ -	\$ 866,140	\$ -	\$ 8,828,990	-	\$ 8,828,990	\$ 9,399,480	\$ -	\$ 254,143	\$ -	\$ 12,626,882
PGE210143	Air Care Plus	\$ 604,146	\$ (356,235)	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ 263,282	\$ -	\$ -	\$ -	\$ -
PGE21016	Boiler Energy Efficiency Program	\$ 2,086,213	\$ 917,469	\$ -	\$ 78,065	\$ -	\$ 806,844	-	\$ 806,844	\$ 805,932	\$ -	\$ -	\$ -	\$ -
PGE21017	EnergySmart Grocer	\$ 7,456,460	\$ 5,966,916	\$ -	\$ 42,115	\$ -	\$ 6,855,755	-	\$ 6,855,755	\$ 7,759,847	\$ -	\$ 10,323,937	\$ -	\$ 6,672,373
PGE21018	Enhanced Automation Initiative	\$ -	\$ 41,905	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE21019	Agricultural Third Party Programs SubTotal	\$ 8,227,091	\$ 5,886,232	\$ -	\$ 642,431	\$ -	\$ 15,982,677	-	\$ 15,982,677	\$ 5,916,331	\$ -	\$ 2,625,063	\$ -	\$ 8,589,707
PGE210310	Dairy Industry Resource Advantage Pgm	\$ 1,480,754	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	Process Wastewater Treatment EM Pgm for Ag Food Processing	\$ 1,065,359	\$ 476,641	\$ -	\$ -	\$ -	\$ 1,110,018	-	\$ 1,110,018	\$ 390,611	\$ -	\$ 18,585	\$ -	\$ 988,763
PGE210311	Dairy and Winery Industry Efficiency Solutions	\$ -	\$ 3,390,664	\$ -	\$ 522,869	\$ -	\$ 4,386,895	-	\$ 4,386,895	\$ 1,941,705	\$ -	\$ 784,461	\$ -	\$ 3,350,121
PGE210312	Staples Low Pressure Irrigation DI	\$ -	\$ 63,210	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210313	Dairy Energy Efficiency Program	\$ 472,638	\$ 1,157	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE21035	Industrial Refrigeration Performance Plus	\$ 1,419,916	\$ 160,199	\$ -	\$ -	\$ -	\$ 2,266,145	-	\$ 2,266,145	\$ 471,847	\$ -	\$ 491,197	\$ -	\$ 692,777
PGE21036	Light Exchange Program	\$ 1,046,700	\$ 751	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE21037	Wine Industry Efficiency Solutions	\$ 1,677,221	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE21038	Comprehensive Food Process Audit & Resource Efficiency Pgm	\$ 1,064,504	\$ 1,793,610	\$ -	\$ 119,561	\$ -	\$ 8,219,619	-	\$ 8,219,619	\$ 3,112,167	\$ -	\$ 1,330,820	\$ -	\$ 3,558,046
PGE21039	Industrial Third Party Programs SubTotal	\$ 20,899,617	\$ 16,205,955	\$ -	\$ 182,471	\$ -	\$ 29,690,792	-	\$ 29,690,792	\$ 15,661,227	\$ -	\$ 7,241,542	\$ -	\$ 25,916,672
PGE210210	Industrial Recommissioning Program	\$ 1,372,850	\$ 1,350,434	\$ -	\$ -	\$ -	\$ 1,669,289	-	\$ 1,669,289	\$ 446,488	\$ -	\$ 646,889	\$ -	\$ 2,245,631
PGE210211	Light Industrial Energy Efficiency	\$ -	\$ 47,944	\$ -	\$ -	\$ -	\$ 1,120,799	-	\$ 1,120,799	\$ 217,555	\$ -	\$ 45,855	\$ -	\$ 546,368
PGE210212	Industrial Compressed Air System Efficiency	\$ -	\$ 245,729	\$ -	\$ -	\$ -	\$ 889,186	-	\$ 889,186	\$ 233,412	\$ -	\$ 185,778	\$ -	\$ 270,590
PGE210213	Small Petrochemical Energy Efficiency	\$ -	\$ 96,290	\$ -	\$ -	\$ -	\$ 1,228,940	-	\$ 1,228,940	\$ 236,774	\$ -	\$ 3,624	\$ -	\$ 714,660
PGE21025	California Wastewater Process Optimization	\$ 995,518	\$ 644,407	\$ -	\$ -	\$ -	\$ 879,788	-	\$ 879,788	\$ 167,288	\$ -	\$ 284,814	\$ -	\$ 1,227,756
PGE21026	Energy Efficiency Services for Oil Production	\$ 4,475,267	\$ 1,510,663	\$ -	\$ -	\$ -	\$ 5,028,847	-	\$ 5,028,847	\$ 1,134,765	\$ -	\$ 1,621,548	\$ -	\$ 3,737,735
PGE21027	Heavy Industry Energy Efficiency Program	\$ 11,067,518	\$ 8,839,023	\$ -	\$ 182,471	\$ -	\$ 15,288,395	-	\$ 15,288,395	\$ 8,478,932	\$ -	\$ 1,794,208	\$ -	\$ 13,179,841
PGE21028	Industrial Compressed Air Program	\$ 1,678,196	\$ 18,634	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ (3,719)	\$ -	\$ -	\$ -	\$ -
PGE21029	Refinery Energy Efficiency Program	\$ 1,310,269	\$ 591,228	\$ -	\$ -	\$ -	\$ 952,965	-	\$ 952,965	\$ 1,520,486	\$ -	\$ 2,567,126	\$ -	\$ 1,666,727
PGE210135	Lincus WISE	\$ -	\$ 2,861,492	\$ -	\$ -	\$ -	\$ 2,632,582	-	\$ 2,632,582	\$ 3,229,245	\$ -	\$ 91,700	\$ -	\$ 2,327,364
PGE210142	Ameresco Intelligent Energy Efficiency	\$ -	\$ 110	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	Workforce Education & Training Third Party Programs SubTotal	\$ -	\$ 46,214	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE2107	Builder Energy Code Training	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE21074	Green Building Technical Support Services	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE21075	Bridges to Energy Sector Opportunities	\$ -	\$ 46,214	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE210134	Government Partnership Programs Total	\$ 69,024,961	\$ 63,692,329	\$ -	\$ 6,076,600	\$ -	\$ 74,542,976	-	\$ 74,542,976	\$ 56,789,532	\$ -	\$ 3,815,328	\$ -	\$ 72,368,174
PGE2110011	California Community Colleges	\$ 3,495,392	\$ 2,936,598	\$ -	\$ 1,263,079	\$ -	\$ 2,650,376	-	\$ 2,650,376	\$ 991,734	\$ -	\$ 779,480	\$ -	\$ 4,448,702
PGE2110012	University of California/California State University	\$ 8,504,419	\$ 4,160,265	\$ -	\$ 3,248,820	\$ -	\$ 6,135,203	-	\$ 6,135,203	\$ 3,495,997	\$ -	\$ 1,877,527	\$ -	\$ 4,703,997
PGE2110013	State of California	\$ 1,423,968	\$ 597,810	\$ -	\$ -	\$ -	\$ 922,797	-	\$ 922,797	\$ 657,152	\$ -	\$ 9,990	\$ -	\$ 1,005,394
PGE2110014	Department of Corrections and Rehabilitation	\$ 3,199,909	\$ 1,395,816	\$ -	\$ 715,062	\$ -	\$ 2,036,885	-	\$ 2,036,885	\$ 703,393	\$ -	\$ 818,225	\$ -	\$ 1,677,562
	Local Government Energy Action Resources (LGEAR)	\$ 5,500,535	\$ 8,894,255	\$ -	\$ 15,808	\$ -	\$ 8,687,570	-	\$ 8,687,570	\$ 3,504,107	\$ -	\$ -	\$ -	\$ 6,059,173
PGE2110051	Strategic Energy Resources	\$ 2,764,003	\$ 7,633,159	\$ -	\$ -	\$ -	\$ 9,885,399	-	\$ 9,885,399	\$ 7,138,904	\$ -	\$ -	\$ -	\$ 9,632,258
PGE2110052	Association of Monterey Bay Area Governments (AMBAG)	\$ 3,581,301	\$ 3,472,920	\$ -	\$ 101,248	\$ -	\$ 3,732,609	-	\$ 3,732,609	\$ 4,056,257	\$ -	\$ 58,408	\$ -	\$ 3,744,061
PGE211007	East Bay	\$ 9,262,008	\$ 6,597,937	\$ -	\$ 97,015	\$ -	\$ 6,093,616	-	\$ 6,093,616	\$ 6,136,966	\$ -	\$ 57,559	\$ -	\$ 6,129,105
PGE211009	Fresno	\$ 3,846,492	\$ 2,698,158	\$ -	\$ 1,787	\$ -	\$ 2,601,225	-	\$ 2,601,225	\$ 1,920,517	\$ -	\$ 98,291	\$ -	\$ 2,648,728
PGE211010	Kern	\$ 3,194,412	\$ 2,497,282	\$ -	\$ -	\$ -	\$ 2,680,280	-	\$ 2,680,280	\$ 2,436,122	\$ -	\$ -	\$ -	\$ 2,725,208
PGE211011	Madera	\$ 445,314	\$ 314,528	\$ -	\$ -	\$ -	\$ 326,472	-	\$ 326,472	\$ 413,979	\$ -	\$ -	\$ -	\$ 363,621
PGE211012	Marin County	\$ 1,334,743	\$ 1,221,459	\$ -	\$ 2,373	\$ -	\$ 1,281,629	-	\$ 1,281,629	\$ 747,329	\$ -	\$ 3,585	\$ -	\$ 1,271,550
PGE211013	Mendocino/Lake County	\$ 322,506	\$ 666,557	\$ -	\$ -	\$ -	\$ 634,221	-	\$ 634,221	\$ 545,040	\$ -	\$ -	\$ -	\$ 711,132
PGE211014	Napa County	\$ 549,632	\$ 439,889	\$ -	\$ -	\$ -	\$ 530,485	-	\$ 530,485	\$ 311,606	\$ -	\$ -	\$ -	\$ 557,007
PGE211015	Redwood Coast	\$ 1,556,910	\$ 1,332,988	\$ -	\$ 5,429	\$ -	\$ 1,609,191	-	\$ 1,609,191	\$ 1,192,649	\$ -	\$ 46	\$ -	\$ 1,598,179
PGE211016	San Luis Obispo County	\$ 936,840	\$ 1,169,461	\$ -	\$ -	\$ -	\$ 1,054,111	-	\$ 1,054,111	\$ 1,183,580	\$ -	\$ -	\$ -	\$ 1,076,601
PGE211017	San Mateo County	\$ 1,744,567	\$ 1,999,253	\$ -	\$ 136,065	\$ -	\$ 2,271,691	-	\$ 2,271,691	\$ 1,822,151	\$ -	\$ -	\$ -	\$ 2,279,756

Table 4 – Budget, Spent, Unspent, Carryover Details

2016 Budget, Spent, Unspent and Carryover							2017 Budget, Fundshifts and Spending to Date							
New/Existing Program #	Main Program Name / Sub-Program Name	2016 Total Budget with Commitments & Fundshifts (G+J+M+N)	2016 Cycle Expenditures Spent in 2016	2016 Unspent/Uncommitted Funds Returned to Ratepayers	2016 Commitments as of 12/31/16 [5]	2016 Unspent/Uncommitted Funds Available for 2018 offset	2017 Authorized Budget	2017 Fundshifts	2017 Total Budget	2017 Cycle Expenditures Spent in 2017	2016 Unspent/Uncommitted Funds Returned to Ratepayers	2017 Commitments as of 12/31/17 [5]	2017 Unspent/Uncommitted Funds Available for 2018 offset	2018 Authorized Budget [12]
PGE211020	Santa Barbara	\$ 1,184,837	\$ 852,691	\$ -	\$ -	\$ -	\$ 973,018	-	\$ 973,018	\$ 578,544	\$ -	\$ -	\$ -	\$ 1,008,901
PGE211021	Sierra Nevada	\$ 2,560,460	\$ 2,189,823	\$ -	\$ 8,718	\$ -	\$ 2,391,132	-	\$ 2,391,132	\$ 1,404,108	\$ -	\$ 15,794	\$ -	\$ 2,422,994
PGE211022	Sonoma County	\$ 1,709,718	\$ 1,647,877	\$ -	\$ 534	\$ -	\$ 1,764,538	-	\$ 1,764,538	\$ 2,301,325	\$ -	\$ 14,177	\$ -	\$ 1,756,500
PGE211023	Silicon Valley	\$ 4,074,436	\$ 3,934,221	\$ -	\$ 323,658	\$ -	\$ 3,793,893	-	\$ 3,793,893	\$ 5,110,637	\$ -	\$ -	\$ -	\$ 3,762,183
PGE211024	San Francisco	\$ 7,832,558	\$ 7,039,384	\$ -	\$ 157,003	\$ -	\$ 6,168,064	-	\$ 6,168,064	\$ 4,056,751	\$ -	\$ 36,758	\$ -	\$ 6,315,049
PGE211026	North Valley	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,908,356	-	\$ 1,908,356	\$ 536,650	\$ -	\$ -	\$ -	\$ 1,898,230
PGE211027	Sutter Buttes	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 446,216	-	\$ 446,216	\$ 343,251	\$ -	\$ -	\$ -	\$ 495,328
PGE211028	Yolo	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 357,936	-	\$ 357,936	\$ 256,813	\$ -	\$ -	\$ -	\$ 415,574
PGE211029	Solano	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,472,213	-	\$ 1,472,213	\$ 2,262,743	\$ -	\$ 45,272	\$ -	\$ 1,480,725
PGE211030	Northern San Joaquin Valley	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,443,028	-	\$ 1,443,028	\$ 2,202,379	\$ -	\$ 216	\$ -	\$ 1,455,492
PGE211031	Valley Innovative Energy Watch (VIEW)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 690,825	-	\$ 690,825	\$ 478,848	\$ -	\$ -	\$ -	\$ 725,163
	Funds to be returned in rates [4]	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	2013-2015 funds transferred to REN and CCA balancing accounts for 2016 [6]	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	Pre-2013 Unspent Funds transferred to 2016 Commercial Deemed Incentives program [3]	\$ -		\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	PG&E PROGRAM TOTAL	\$ 419,703,607	\$ 376,577,485	\$ -	\$ 48,833,978	\$ -	\$ 376,108,857	\$ -	\$ 376,108,857	\$ 295,536,016	\$ -	\$ 42,456,987	\$ -	\$ 352,460,723
EM&V	EM&V (PA & CPUC Portions) Total	\$ 38,340,181	\$ 1,531,591	\$ -	\$ 15,672,827	\$ -	\$ 16,988,842	\$ -	\$ 16,988,842	\$ 2,509,699	\$ -	\$ 14,479,143	\$ -	\$ 16,522,072
PGE_EMV	PG&E EM&V - CPUC	\$ 29,230,527	\$ 477,668	\$ -	\$ 11,723,301	\$ -	\$ 11,653,492	-	\$ 11,653,492	\$ 524,259	\$ -	\$ 11,129,233	\$ -	\$ 11,055,064
PGE_EMV	PG&E EM&V - PG&E	\$ 9,109,655	\$ 1,053,923	\$ -	\$ 3,949,526	\$ -	\$ 4,580,210	-	\$ 4,580,210	\$ 2,083,440	\$ -	\$ 2,496,770	\$ -	\$ 4,193,300
PGE_EMV	BayREN EM&V - CPUC	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 499,555	-	\$ 499,555	\$ (98,001)	\$ -	\$ 597,556	\$ -	\$ 675,609
PGE_EMV	BayREN EM&V	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 189,486	-	\$ 189,486	\$ -	\$ -	\$ 189,486	\$ -	\$ 256,266
PGE_EMV	MCE EM&V - CPUC	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 47,921	-	\$ 47,921	\$ -	\$ -	\$ 47,921	\$ -	\$ 247,829
PGE_EMV	MCE EM&V	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 18,177	-	\$ 18,177	\$ -	\$ -	\$ 18,177	\$ -	\$ 94,004
PGE_EMV	3C REN EM&V - CPUC	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE_EMV	3C REN EM&V	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	PG&E TOTAL with EM&V	\$ 458,043,789	\$ 378,109,077	\$ -	\$ 64,506,805	\$ -	\$ 393,097,699	\$ -	\$ 393,097,699	\$ 298,045,715	\$ -	\$ 56,936,130	\$ -	\$ 368,982,795
PGE_BayREN	BayREN [10]	\$ 20,297,885	\$ 17,379,767	\$ -	\$ -	\$ -	\$ 16,537,000	-	\$ 16,537,000	\$ 16,494,231	\$ -	\$ 42,769	\$ -	\$ 22,365,000
PGE_MCE	Marin Clean Energy [10]	\$ 1,622,529	\$ 1,428,096	\$ 311,915	\$ 104,615	\$ -	\$ 1,586,347	-	\$ 1,586,347	\$ 1,816,622	\$ -	\$ -	\$ -	\$ 8,204,000
PGE_3C REN	3C REN [10]	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	TOTAL PG&E EE EXPENSE PORTFOLIO	\$ 479,964,203	\$ 396,916,939	\$ 311,915	\$ 64,611,421	\$ -	\$ 411,221,046	\$ -	\$ 411,221,046	\$ 316,356,567	\$ -	\$ 56,978,899	\$ -	\$ 399,551,795
PGE21091LP	OBF REVOLVING LOAN POOL	\$ 25,682,517	\$ 2,224,457	\$ -	\$ 7,775,543	\$ -	\$ 13,500,000	-	\$ 13,500,000	\$ 8,344,822	\$ -	\$ 5,155,178	\$ -	\$ 13,500,000
	TOTAL PG&E EE PORTFOLIO	\$ 505,646,720	\$ 399,141,396	\$ 311,915	\$ 72,386,964	\$ -	\$ 424,721,046	-	\$ 424,721,046	\$ 324,701,390	\$ -	\$ 62,134,077	\$ -	\$ 413,051,795
	Other EE-Related Budgets													
PGE_SWMEO	Statewide Marketing, Education and Outreach Program Total	\$ 8,445,775	\$ 7,689,442	\$ -	\$ -	\$ -	\$ 6,840,739	-	\$ 6,840,739	\$ 7,269,185	\$ -	\$ -	\$ -	\$ 6,840,979
PGE_SWMEO	Statewide Marketing, Education and Outreach Program (Flex Alert) [11]	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	-	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
PGE_SWMEO	Statewide Marketing, Education and Outreach Program [11]	\$ 8,445,775	\$ 7,689,442	\$ -	\$ -	\$ -	\$ 6,840,739	-	\$ 6,840,739	\$ 7,269,185	\$ -	\$ -	\$ -	\$ 6,840,979

PA Name: Pacific Gas and Electric Company
Budget Year: 2019

Table 4 – Budget, Spent, Unspent, Carryover Details

New/Existing Program #	Main Program Name / Sub-Program Name	2018 Budget, Fundshifts and Spending to Date			2019 Proposed Budget			Program Type	Market Sector	Resource or Non-resource	Program Status	Utility Grouping
		2018 Fundshifts	2018 Total Budget	2018 Cycle Expenditures Spent as of 12/31/2018	2019 Proposed Budget [8] [13] [14]	2019 Budget Offset from Pre-2019 Unspent & Uncommitted Funds	2019 Funds Requested					
PGE2100	Residential Energy Efficiency Programs Total	-	\$ 55,622,926	56,475,740	\$ 53,022,540	\$ -	\$ 53,022,540					
PGE21001	Residential Energy Advisor	-	\$ 14,692,263	16,270,181	\$ 11,864,451	\$ -	\$ 11,864,451	IOU Core/Statewide	Residential	Resource	Existing	Residential Energy Efficiency Programs
PGE21002	Plug Load and Appliances	-	\$ 10,600,377	9,680,554	\$ 7,880,656	\$ -	\$ 7,880,656	IOU Core/Statewide	Residential	Resource	Existing	Residential Energy Efficiency Programs
PGE21003	Multifamily Energy Efficiency	-	\$ 6,779,725	4,088,119	\$ 6,333,027	\$ -	\$ 6,333,027	IOU Core/Statewide	Residential	Resource	Existing	Residential Energy Efficiency Programs
PGE21004	Energy Upgrade California	-	\$ 10,707,759	11,187,989	\$ 8,691,012	\$ -	\$ 8,691,012	IOU Core/Statewide	Residential	Resource	Existing	Residential Energy Efficiency Programs
PGE21005	Residential New Construction	-	\$ 6,770,695	6,977,516	\$ 6,826,666	\$ -	\$ 6,826,666	IOU Core/Statewide	Residential	Resource	Existing	Residential Energy Efficiency Programs
PGE21006	Residential HVAC	-	\$ 5,318,382	7,250,244	\$ 3,913,021	\$ -	\$ 3,913,021	IOU Core/Statewide	Residential	Resource	Existing	Residential Energy Efficiency Programs
PGE210010	Pay for Performance Pilot	-	\$ 753,726	1,021,138	\$ 7,513,707	\$ -	\$ 7,513,707	Third/Local Party	Residential	Resource	Existing	Residential Energy Efficiency Programs
PGE2101	Commercial Programs Total	-	\$ 64,732,629	54,266,529	\$ 39,236,508	\$ -	\$ 39,236,508					
PGE21011	Commercial Calculated Incentives	-	\$ 23,262,758	13,921,325	\$ 8,501,848	\$ -	\$ 8,501,848	IOU Core/Statewide	Commercial	Resource	Existing	Commercial Energy Efficiency Programs
PGE21025	Savings by Design (SBD)	-	\$ 9,111,221	3,728,305	\$ 3,179,856	\$ -	\$ 3,179,856	IOU Core/Statewide	Commercial	Resource	Existing	Commercial Energy Efficiency Programs
PGE21012	Commercial Deemed Incentives	-	\$ 19,367,904	18,024,280	\$ 14,022,281	\$ -	\$ 14,022,281	IOU Core/Statewide	Commercial	Resource	Existing	Commercial Energy Efficiency Programs
PGE21013	Commercial Continuous Energy Improvement	-	\$ 240,150	56,862	\$ -	\$ -	\$ -	IOU Core/Statewide	Commercial	Non-Resource	Closed	Commercial Energy Efficiency Programs
PGE21014	Commercial Energy Advisor	-	\$ 2,123,638	1,662,194	\$ 570,242	\$ -	\$ 570,242	IOU Core/Statewide	Commercial	Resource	Existing	Commercial Energy Efficiency Programs
PGE21015	Commercial HVAC	-	\$ 10,626,958	16,873,563	\$ 12,962,281	\$ -	\$ 12,962,281	IOU Core/Statewide	Commercial	Resource	Existing	Commercial Energy Efficiency Programs
PGE2103	Agricultural Programs Total	-	\$ 17,238,326	8,959,114	\$ 8,475,226	\$ -	\$ 8,475,226					
PGE21031	Agricultural Calculated Incentives	-	\$ 9,155,062	3,285,733	\$ 2,340,455	\$ -	\$ 2,340,455	IOU Core/Statewide	Agricultural	Resource	Existing	Agricultural Energy Efficiency Programs
PGE21032	Agricultural Deemed Incentives	-	\$ 4,758,784	3,360,895	\$ 3,284,169	\$ -	\$ 3,284,169	IOU Core/Statewide	Agricultural	Resource	Existing	Agricultural Energy Efficiency Programs
PGE21033	Agricultural Continuous Energy Improvement	-	\$ 67,740	3,893	\$ -	\$ -	\$ -	IOU Core/Statewide	Agricultural	Non-Resource	Closed	Agricultural Energy Efficiency Programs
PGE21034	Agricultural Energy Advisor	-	\$ 3,256,739	2,308,594	\$ 2,850,602	\$ -	\$ 2,850,602	IOU Core/Statewide	Agricultural	Resource	Existing	Agricultural Energy Efficiency Programs
PGE2102	Industrial Programs Total	\$	\$ 18,155,388	6,066,314	\$ 7,910,152	\$ -	\$ 7,910,152					
PGE21021	Industrial Calculated Incentives	-	\$ 12,115,800	4,113,468	\$ 5,371,815	\$ -	\$ 5,371,815	IOU Core/Statewide	Industrial	Resource	Existing	Industrial Energy Efficiency Programs
PGE21022	Industrial Deemed Incentives	-	\$ 4,157,505	1,229,776	\$ 244,743	\$ -	\$ 244,743	IOU Core/Statewide	Industrial	Resource	Existing	Industrial Energy Efficiency Programs
PGE21023	Industrial Continuous Energy Improvement	-	\$ 67,233	3,980	\$ -	\$ -	\$ -	IOU Core/Statewide	Industrial	Non-Resource	Closed	Industrial Energy Efficiency Programs
PGE21024	Industrial Energy Advisor	-	\$ 597,692	138,384	\$ 67,338	\$ -	\$ 67,338	IOU Core/Statewide	Industrial	Resource	Existing	Industrial Energy Efficiency Programs
PGE21030	Industrial Strategic Energy Management	-	\$ 1,217,158	580,706	\$ 2,226,256	\$ -	\$ 2,226,256	Third/Local Party	Industrial	Resource	Existing	Industrial Energy Efficiency Programs
PGE2104	Lighting Programs Total	-	\$ 11,131,075	10,257,832	\$ 16,146,383	\$ -	\$ 16,146,383					
PGE21041	Primary Lighting	-	\$ 10,711,690	9,809,270	\$ 16,146,383	\$ -	\$ 16,146,383	IOU Core/Statewide	Residential	Resource	Existing	Residential Energy Efficiency Programs
PGE21042	Lighting Innovation	-	\$ 357,652	383,935	\$ -	\$ -	\$ -	IOU Core/Statewide	Cross-Cutting	Non-Resource	Closed	Commercial Energy Efficiency Programs
PGE21043	Lighting Market Transformation	-	\$ 61,733	64,628	\$ -	\$ -	\$ -	IOU Core/Statewide	Cross-Cutting	Non-Resource	Closed	Commercial Energy Efficiency Programs
PGE2105	Codes & Standards Programs Total	-	\$ 16,183,839	18,263,859	\$ 20,811,065	\$ -	\$ 20,811,065					
PGE21051	Building Codes Advocacy	-	\$ 4,331,109	3,126,303	\$ 5,138,535	\$ -	\$ 5,138,535	IOU Core/Statewide	Cross-Cutting	Resource	Existing	Codes and Standards Programs
PGE21052	Appliance Standards Advocacy	-	\$ 4,774,497	6,667,851	\$ 3,211,584	\$ -	\$ 3,211,584	IOU Core/Statewide	Cross-Cutting	Resource	Existing	Codes and Standards Programs
PGE21053	Compliance Improvement	-	\$ 4,044,129	4,211,928	\$ 5,138,535	\$ -	\$ 5,138,535	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Codes and Standards Programs
PGE21054	Reach Codes	-	\$ 604,747	599,699	\$ 770,780	\$ -	\$ 770,780	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Codes and Standards Programs
PGE21055	Planning and Coordination	-	\$ 650,922	1,647,723	\$ 770,780	\$ -	\$ 770,780	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Codes and Standards Programs
PGE21056	Code Readiness	-	\$ 1,778,436	2,010,356	\$ 3,853,901	\$ -	\$ 3,853,901	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Codes and Standards Programs
PGE21057	National Codes & Standards Advocacy	-	\$ -	-	\$ 1,926,950	\$ -	\$ 1,926,950	IOU Core/Statewide	Cross-Cutting	Non-Resource	New	Codes and Standards Programs
PGE2106	Emerging Technologies Programs Total	-	\$ 5,629,976	2,720,234	\$ 7,761,040	\$ -	\$ 7,761,040					
PGE21061	Technology Development Support	-	\$ 942,398	545,928	\$ 1,670,318	\$ -	\$ 1,670,318	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Emerging Technologies Programs
PGE21062	Technology Assessments	-	\$ 1,929,215	771,608	\$ 3,991,223	\$ -	\$ 3,991,223	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Emerging Technologies Programs
PGE21063	Technology Introduction Support	-	\$ 2,758,363	1,402,697	\$ 2,099,499	\$ -	\$ 2,099,499	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Emerging Technologies Programs
PGE2107	Workforce Education & Training Programs Total	-	\$ 11,038,180	8,392,491	\$ 9,741,962	\$ -	\$ 9,741,962					
PGE21071	Integrated Energy Education and Training	-	\$ 8,564,820	6,850,973	\$ 8,508,957	\$ -	\$ 8,508,957	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Workforce Education & Training Programs
PGE21072	Connections	-	\$ 1,900,879	1,343,813	\$ 959,914	\$ -	\$ 959,914	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Workforce Education & Training Programs
PGE21073	Strategic Planning	-	\$ 572,481	197,705	\$ -	\$ -	\$ -	IOU Core/Statewide	Cross-Cutting	Non-Resource	Closed	Workforce Education & Training Programs
PGE21076	Career and Workforce Readiness	-	\$ -	-	\$ 273,091	\$ -	\$ 273,091	IOU Core/Statewide	Cross-Cutting	Non-Resource	New	Workforce Education & Training Programs
PGE2108	Statewide DSM Coordination & Integration Program Total	-	\$ 547,921	184,975	\$ -	\$ -	\$ -					
PGE21081	Statewide DSM Coordination & Integration	-	\$ 547,921	184,975	\$ -	\$ -	\$ -	IOU Core/Statewide	Cross-Cutting	Non-Resource	Closed	Statewide DSM Coordination & Integration Programs
PGE2109	Financing Programs Total	-	\$ 4,158,662	3,075,950	\$ 6,496,567	\$ -	\$ 6,496,567					
PGE21091	On-Bill Financing (excludes Loan Pool)	-	\$ 3,141,013	2,693,475	\$ 5,802,331	\$ -	\$ 5,802,331	IOU Core/Statewide	Cross-Cutting	Resource	Existing	Financing Programs
PGE21092	Third-Party Financing	-	\$ 660,195	361,181	\$ 64,982	\$ -	\$ 64,982	IOU Core/Statewide	Cross-Cutting	Resource	Existing	Financing Programs
PGE21093	New Financing Offerings [9]	-	\$ -	-	\$ -	\$ -	\$ -	IOU Core/Statewide	Cross-Cutting	Resource	Existing	Financing Programs
PGE210911	On Bill Financing Alternative Pathway	-	\$ 357,454	21,294	\$ 629,253	\$ -	\$ 629,253	IOU Core/Statewide	Cross-Cutting	Resource	Existing	Financing Programs
PGE2100	Third-Party Programs (Competitively Bid) Total	-	\$ 75,653,627	68,298,101	\$ 83,164,958	\$ -	\$ 83,164,958					
PGE2100	Residential Third Party Programs SubTotal	-	\$ 13,319,768	23,794,844	\$ 31,788,461	\$ -	\$ 31,788,461					
PGE21007	California New Homes Multifamily	-	\$ 1,460,826	1,263,530	\$ 2,036,064	\$ -	\$ 2,036,064	Third/Local Party	Residential	Resource	Existing	Residential Third Party Programs
PGE21008	Enhance Time Delay Relay	-	\$ 1,536,619	9,993,079	\$ 8,295,796	\$ -	\$ 8,295,796	Third/Local Party	Residential	Resource	Existing	Residential Third Party Programs
PGE21009	Direct Install for Manufactured and Mobile Homes	-	\$ 5,242,617	6,740,380	\$ 6,566,064	\$ -	\$ 6,566,064	Third/Local Party	Residential	Resource	Existing	Residential Third Party Programs
PGE210132	RSG The Smarter Water Heater	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Residential	Resource	Closed	Residential Third Party Programs
PGE210011	Residential Energy Fitness Program	-	\$ 5,079,706	5,797,855	\$ 14,890,537	\$ -	\$ 14,890,537	Third/Local Party	Residential	Resource	Existing	Residential Third Party Programs
PGE2101	Commercial Third Party Programs SubTotal	-	\$ 27,827,481	25,279,674	\$ 28,874,763	\$ -	\$ 28,874,763					
PGE210110	Monitoring-Based Persistence Commissioning	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210111	LodgingSavers	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210112	School Energy Efficiency	-	\$ 2,971,983	2,863,298	\$ 2,777,902	\$ -	\$ 2,777,902	Third/Local Party	Commercial	Resource	Existing	Commercial Third Party Programs
PGE210113	Energy Fitness Program	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210114	Energy Savers	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210115	RightLights	-	\$ -	164	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210116	Small Business Commercial Comprehensive	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210117	Energy-Efficient Parking Garage	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210118	Retail Energy Efficiency	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210119	LED Accelerator	-	\$ 2,995,445	1,251,840	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210120	Monitoring-Based Commissioning	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210122	Casino Green	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210123	Healthcare Energy Efficiency Program	-	\$ 2,244,672	805,628	\$ 2,319,573	\$ -	\$ 2,319,573	Third/Local Party	Commercial	Resource	Existing	Commercial Third Party Programs
PGE210124	Ozone Laundry Energy Efficiency	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210125	California Preschool Energy Efficiency Program	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210126	K-12 Private Schools and Colleges Audit Retro	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs

PA Name: Pacific Gas and Electric Company
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Table 4 – Budget, Spent, Unspent, Carryover Details

New/Existing Program #	Main Program Name / Sub-Program Name	2018 Budget, Fundshifts and Spending to Date			2019 Proposed Budget			Program Type	Market Sector	Resource or Non-resource	Program Status	Utility Grouping
		2018 Fundshifts	2018 Total Budget	2018 Cycle Expenditures Spent as of 12/31/2018	2019 Proposed Budget [8] [13] [14]	2019 Budget Offset from Pre-2019 Unspent & Uncommitted Funds	2019 Funds Requested					
	Innovative Designs for Energy Efficiency Approaches (IDEEA)	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210127	Enovity SMART	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210128	Nexant AERCx	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210129	CLEARResult AERCx	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210130	PECI AERCx	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210131	McKinstry Laboratory Fume Hoods	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210136	Waypoint Commercial Outreach	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Non-Resource	Closed	Commercial Third Party Programs
PGE210137	Data Center Air Flow and Temp Optimization	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210138	SEI Energize Schools Program	-	\$ 316,125	229,345	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Non-Resource	Closed	Commercial Third Party Programs
PGE210139	Mazzetti Dynamic Gas Scavenging System	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210140	Lincus Commercial Mid-Market Program	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE210141	Hospitality Program	-	\$ 12,626,882	11,370,366	\$ 15,944,945	\$ -	\$ 15,944,945	Third/Local Party	Commercial	Resource	Existing	Commercial Third Party Programs
PGE21016	Air Care Plus	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE21017	Boiler Energy Efficiency Program	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE21018	EnergySmart Grocer	-	\$ 6,672,373	8,759,034	\$ 7,832,344	\$ -	\$ 7,832,344	Third/Local Party	Commercial	Resource	Existing	Commercial Third Party Programs
PGE21019	Enhanced Automation Initiative	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Commercial	Resource	Closed	Commercial Third Party Programs
PGE2103	Agricultural Third Party Programs SubTotal	-	\$ 8,589,707	3,882,813	\$ 6,121,282	\$ -	\$ 6,121,282					
PGE210310	Dairy Industry Resource Advantage Pgm	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Agricultural	Resource	Closed	Agricultural Third Party Programs
	Process Wastewater Treatment EM Pgm for Ag Food Processing	-	\$ 988,763	97,108	\$ 421,157	\$ -	\$ 421,157	Third/Local Party	Agricultural	Resource	Existing	Agricultural Third Party Programs
PGE210311	Dairy and Winery Industry Efficiency Solutions	-	\$ 3,350,121	1,054,426	\$ 2,289,369	\$ -	\$ 2,289,369	Third/Local Party	Agricultural	Resource	Existing	Agricultural Third Party Programs
PGE210312	Staples Low Pressure Irrigation DI	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Agricultural	Resource	Closed	Agricultural Third Party Programs
PGE210313	Dairy Energy Efficiency Program	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Agricultural	Resource	Closed	Agricultural Third Party Programs
PGE21035	Industrial Refrigeration Performance Plus	-	\$ 692,777	396,884	\$ 164,733	\$ -	\$ 164,733	Third/Local Party	Cross-Cutting	Resource	Closed	Agricultural Third Party Programs
PGE21036	Light Exchange Program	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Agricultural	Resource	Closed	Agricultural Third Party Programs
PGE21037	Wine Industry Efficiency Solutions	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Agricultural	Resource	Closed	Agricultural Third Party Programs
PGE21038	Comprehensive Food Process Audit & Resource Efficiency Pgm	-	\$ 3,558,046	2,334,395	\$ 3,246,023	\$ -	\$ 3,246,023	Third/Local Party	Agricultural	Resource	Existing	Agricultural Third Party Programs
PGE21039	Industrial Third Party Programs SubTotal	-	\$ 25,916,672	15,340,769	\$ 16,380,452	\$ -	\$ 16,380,452					
PGE2102	Industrial Recommissioning Program	-	\$ 2,245,631	828,166	\$ 2,874,548	\$ -	\$ 2,874,548	Third/Local Party	Industrial	Resource	Existing	Industrial Third Party Programs
PGE210210	Light Industrial Energy Efficiency	-	\$ 546,368	58,901	\$ -	\$ -	\$ -	Third/Local Party	Industrial	Resource	Closed	Industrial Third Party Programs
PGE210211	Industrial Compressed Air System Efficiency	-	\$ 270,590	1,564,198	\$ 520,951	\$ -	\$ 520,951	Third/Local Party	Industrial	Resource	Existing	Industrial Third Party Programs
PGE210212	Small Petrochemical Energy Efficiency	-	\$ 714,660	118,886	\$ -	\$ -	\$ -	Third/Local Party	Industrial	Resource	Existing	Industrial Third Party Programs
PGE21025	California Wastewater Process Optimization	-	\$ 1,227,756	604,973	\$ -	\$ -	\$ -	Third/Local Party	Industrial	Resource	Closed	Industrial Third Party Programs
PGE21026	Energy Efficiency Services for Oil Production	-	\$ 3,737,735	1,618,226	\$ 1,871,443	\$ -	\$ 1,871,443	Third/Local Party	Industrial	Resource	Existing	Industrial Third Party Programs
PGE21027	Heavy Industry Energy Efficiency Program	-	\$ 13,179,841	8,430,948	\$ 8,726,194	\$ -	\$ 8,726,194	Third/Local Party	Industrial	Resource	Existing	Industrial Third Party Programs
PGE21028	Industrial Compressed Air Program	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Industrial	Resource	Closed	Industrial Third Party Programs
PGE21029	Refinery Energy Efficiency Program	-	\$ 1,666,727	42,487	\$ -	\$ -	\$ -	Third/Local Party	Industrial	Resource	Closed	Industrial Third Party Programs
PGE21035	Lincus WISE	-	\$ 2,327,364	2,073,984	\$ 2,387,317	\$ -	\$ 2,387,317	Third/Local Party	Industrial	Resource	Existing	Industrial Third Party Programs
PGE210142	Ameresco Intelligent Energy Efficiency	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Industrial	Resource	Closed	Industrial Third Party Programs
PGE2107	Workforce Education & Training Third Party Programs SubTotal	-	\$ -	-	\$ -	\$ -	\$ -					
PGE21074	Builder Energy Code Training	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Cross-Cutting	Non-Resource	Closed	Workforce Education & Training Third Party Programs
PGE21075	Green Building Technical Support Services	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Cross-Cutting	Non-Resource	Closed	Workforce Education & Training Third Party Programs
PGE210134	Bridges to Energy Sector Opportunities	-	\$ -	-	\$ -	\$ -	\$ -	Third/Local Party	Cross-Cutting	Non-Resource	Closed	Workforce Education & Training Third Party Programs
PGE2110	Government Partnership Programs Total	-	\$ 72,368,174	47,818,680	\$ 40,464,830	\$ -	\$ 40,464,830					
PGE2110011	California Community Colleges	-	\$ 4,448,702	1,842,711	\$ 1,107,620	\$ -	\$ 1,107,620	State Institutional Partnership	Public	Resource	Existing	Institutional Partnerships
PGE2110012	University of California/California State University	-	\$ 4,703,997	1,478,702	\$ 932,488	\$ -	\$ 932,488	State Institutional Partnership	Public	Resource	Existing	Institutional Partnerships
PGE2110013	State of California	-	\$ 1,005,394	185,302	\$ 926,895	\$ -	\$ 926,895	State Institutional Partnership	Public	Resource	Existing	Institutional Partnerships
PGE2110014	Department of Corrections and Rehabilitation	-	\$ 1,677,562	576,817	\$ 1,081,206	\$ -	\$ 1,081,206	State Institutional Partnership	Public	Resource	Existing	Institutional Partnerships
PGE2110051	Local Government Energy Action Resources (LGEAR)	-	\$ 6,059,173	2,320,731	\$ -	\$ -	\$ -	Local Government Partnership	Public	Resource	Closed	Master Government Partnership
PGE2110052	Strategic Energy Resources	-	\$ 9,632,258	6,437,680	\$ 5,535,802	\$ -	\$ 5,535,802	Local Government Partnership	Public	Non-Resource	Existing	Master Government Partnership
PGE211007	Association of Monterey Bay Area Governments (AMBAG)	-	\$ 3,744,061	3,774,031	\$ 3,557,294	\$ -	\$ 3,557,294	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211009	East Bay	-	\$ 6,129,105	4,536,496	\$ 3,172,113	\$ -	\$ 3,172,113	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211010	Fresno	-	\$ 2,648,728	1,809,386	\$ 2,744,818	\$ -	\$ 2,744,818	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211011	Kern	-	\$ 2,725,208	2,235,401	\$ 2,312,293	\$ -	\$ 2,312,293	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211012	Madera	-	\$ 363,621	205,058	\$ 298,040	\$ -	\$ 298,040	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211013	Marin County	-	\$ 1,271,550	643,266	\$ 863,849	\$ -	\$ 863,849	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211014	Mendocino/Lake County	-	\$ 711,132	567,523	\$ 534,587	\$ -	\$ 534,587	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211015	Napa County	-	\$ 557,007	278,555	\$ 354,776	\$ -	\$ 354,776	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211016	Redwood Coast	-	\$ 1,598,179	1,128,989	\$ 1,220,457	\$ -	\$ 1,220,457	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211018	San Luis Obispo County	-	\$ 1,076,601	671,148	\$ 984,925	\$ -	\$ 984,925	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211019	San Mateo County	-	\$ 2,279,756	1,506,181	\$ 1,067,718	\$ -	\$ 1,067,718	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs

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Table 4 – Budget, Spent, Unspent, Carryover Details

2018 Budget, Fundshifts and Spending to Date					2019 Proposed Budget			Program Type	Market Sector	Resource or Non-resource	Program Status	Utility Grouping
New/Existing Program #	Main Program Name / Sub-Program Name	2018 Fundshifts	2018 Total Budget	2018 Cycle Expenditures Spent as of 12/31/2018	2019 Proposed Budget [8] [13] [14]	2019 Budget Offset from Pre-2019 Unspent & Uncommitted Funds	2019 Funds Requested					
PGE211020	Santa Barbara	-	\$ 1,008,901	453,961	\$ 603,722	\$ -	\$ 603,722	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211021	Sierra Nevada	-	\$ 2,422,994	1,015,810	\$ 939,341	\$ -	\$ 939,341	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211022	Sonoma County	-	\$ 1,756,500	2,391,178	\$ 1,624,260	\$ -	\$ 1,624,260	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211023	Silicon Valley	-	\$ 3,762,183	3,684,864	\$ 3,091,367	\$ -	\$ 3,091,367	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211024	San Francisco	-	\$ 6,315,049	5,515,976	\$ 3,763,629	\$ -	\$ 3,763,629	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211026	North Valley	-	\$ 1,898,230	332,097	\$ 463,997	\$ -	\$ 463,997	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211027	Sutter Buttes	-	\$ 495,328	268,133	\$ 154,297	\$ -	\$ 154,297	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211028	Yolo	-	\$ 415,574	110,052	\$ 458,506	\$ -	\$ 458,506	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211029	Solano	-	\$ 1,480,725	1,880,496	\$ 1,130,314	\$ -	\$ 1,130,314	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211030	Northern San Joaquin Valley	-	\$ 1,455,492	1,490,497	\$ 976,930	\$ -	\$ 976,930	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
PGE211031	Valley Innovative Energy Watch (VIEW)	-	\$ 725,163	477,641	\$ 563,589	\$ -	\$ 563,589	Local Government Partnership	Public	Resource	Existing	Government Partnership Programs
	Funds to be returned in rates [4]	-	\$ -	-	\$ -	\$ 198,295,672	\$ (198,295,672)					
	2013-2015 funds transferred to REN and CCA balancing accounts for 2016 [6]	-	\$ -	-	\$ -	\$ -	\$ -					
	Pre-2013 Unspent Funds transferred to 2016 Commercial Deemed Incentives program [3]	-	\$ -	-	\$ -	\$ -	\$ -					
	PG&E PROGRAM TOTAL	\$ -	\$ 352,460,723	284,779,818	293,231,232	\$ 198,295,672	\$ 94,935,560					
EM&V	EM&V (PA & CPUC Portions) Total	\$ -	\$ 16,522,072	\$ 4,251,144	\$ 14,133,002	\$ -	\$ 14,133,002					
PGE_EMV	PG&E EM&V - CPUC	-	\$ 11,055,064	618,359	\$ 9,265,839	\$ -	\$ 9,265,839	EM&V	Cross Cutting	Non-Resource	Existing	EM&V
PGE_EMV	PG&E EM&V - PG&E	-	\$ 4,193,300	3,128,847	\$ 3,514,629	\$ -	\$ 3,514,629	EM&V	Cross Cutting	Non-Resource	Existing	EM&V
PGE_EMV	BayREN EM&V - CPUC	-	\$ 675,609	503,938	\$ 696,981	\$ -	\$ 696,981	EM&V	Cross Cutting	Non-Resource	Existing	EM&V
PGE_EMV	BayREN EM&V	-	\$ 256,266	-	\$ 264,372	\$ -	\$ 264,372	EM&V	Cross Cutting	Non-Resource	Existing	EM&V
PGE_EMV	MCE EM&V - CPUC	-	\$ 247,829	-	\$ 166,714	\$ -	\$ 166,714	EM&V	Cross Cutting	Non-Resource	Existing	EM&V
PGE_EMV	MCE EM&V	-	\$ 94,004	-	\$ 111,143	\$ -	\$ 111,143	EM&V	Cross Cutting	Non-Resource	Existing	EM&V
PGE_EMV	3C REN EM&V - CPUC	-	\$ -	-	\$ 82,160	\$ -	\$ 82,160	EM&V	Cross Cutting	Non-Resource	Existing	EM&V
PGE_EMV	3C REN EM&V	-	\$ -	-	\$ 31,164	\$ -	\$ 31,164	EM&V	Cross Cutting	Non-Resource	Existing	EM&V
	PG&E TOTAL with EM&V	-	\$ 368,982,795	289,030,962	\$ 307,364,233	\$ 198,295,672	\$ 109,068,561					
PGE_BayREN	BayREN [10]	-	\$ 22,365,000	17,146,268	\$ 23,072,475	\$ -	\$ 23,072,475	REN	Cross Cutting	Resource	Existing	REN
PGE_MCE	Marin Clean Energy [10]	-	\$ 8,204,000	1,165,371	\$ 6,668,561	\$ 499,483	\$ 6,169,078	CCA	Cross Cutting	Resource	Existing	CCA
PGE_3C REN	3C REN [10]	-	\$ -	-	\$ 2,719,766	\$ -	\$ 2,719,766	REN	Cross Cutting	Resource	New	REN
	TOTAL PG&E EE EXPENSE PORTFOLIO	\$ -	\$ 399,551,795	\$ 307,342,602	\$ 339,825,036	\$ 198,795,155	\$ 141,029,881					
PGE21091LP	OBF REVOLVING LOAN POOL	-	\$ 13,500,000	15,952,043	\$ 13,500,000	\$ -	\$ 13,500,000	IOU Core/Statewide	Cross-Cutting	Non-Resource	Existing	Financing Programs
	TOTAL PG&E EE PORTFOLIO	-	\$ 413,051,795	323,294,645	\$ 353,325,036	\$ 198,795,155	\$ 154,529,881					
	Other EE-Related Budgets											
PGE_SWMEO	Statewide Marketing, Education and Outreach Program Total	-	\$ 6,840,979	8,752,314	\$ 6,840,978	\$ -	\$ 6,840,978					
PGE_SWMEO	Statewide Marketing, Education and Outreach Program (Flex Alert) [11]	-	\$ -	-	\$ -	\$ -	\$ -					
PGE_SWMEO	Statewide Marketing, Education and Outreach Program [11]	-	\$ 6,840,979	8,752,314	\$ 6,840,978	\$ -	\$ 6,840,978					

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Table 5 - Total 2019 Requested and 2013-2018 Authorized Budgets (\$000)

Category (2013-18 Authorized and 2019 Request) [1]	Electric Demand Response Funds	Electric Energy Efficiency Funds	Natural Gas Public Purpose Funds	Total Energy Efficiency Funds
2013-2015 Annualized Program Funds - Utility	\$3,264	\$321,712	\$70,620	\$392,331
2013-2015 Annualized Program Funds - REN		\$9,725	\$2,135	\$11,860
2013-2015 Annualized Program Funds - MCE		\$1,431	\$314	\$1,745
2013-2015 Annualized EM&V		\$14,073	\$3,089	\$17,162
2013-2015 Total Annualized Portfolio	\$3,264	\$346,941	\$76,158	\$423,099
2016 Program Funds - Utility	\$3,264	\$327,056	\$71,793	\$398,849
2016 Program Funds - REN		\$13,560	\$2,977	\$16,537
2016 Program Funds - MCE		\$1,301	\$286	\$1,586
2016 EM&V		\$14,108	\$3,097	\$17,204
2016 Annualized Total	\$3,264	\$356,025	\$78,152	\$434,177
2017 Program Funds - Utility	\$3,264	\$327,271	\$62,337	\$389,609
2017 Program Funds - REN		\$13,891	\$2,646	\$16,537
2017 Program Funds - MCE		\$1,333	\$254	\$1,586
2017 EM&V		\$14,271	\$2,718	\$16,989
2017 Annualized Total	\$3,264	\$356,766	\$67,955	\$424,721
2018 Program Funds - Utility	\$3,264	\$263,492	\$102,469	\$365,961
2018 Program Funds - REN		\$18,787	\$3,578	\$22,365
2018 Program Funds - MCE		\$6,891	\$1,313	\$8,204
2018 EM&V		\$13,879	\$2,644	\$16,522
2018 Annualized Total	\$3,264	\$303,048	\$110,004	\$413,052
2019 Requested Program Funds - Utility	\$7,771	\$233,116	\$73,615	\$306,731
2019 Requested Program Funds - REN		\$17,535	\$5,537	\$23,072
2019 Requested Program Funds - MCE		\$5,068	\$1,600	\$6,669
2019 Requested Program Funds - 3C-REN		\$2,067	\$653	\$2,720
2019 Requested EM&V		\$10,741	\$3,392	\$14,133
2019 Total Portfolio Request	\$7,771	\$268,527	\$84,798	\$353,325

{1} Authorized budget excludes reductions from past unspent funds, carryover and is consistent with funding approved in D. 09-09-047, D. 12-11-015, D.14-10-046, and D.15-10-028. 2018 Utility and EM&V budgets presented are from the 2018 ABAL. These budgets are also reflected in the revised CEDARS filing approved on August 3, 2018 by Energy Division, as well as in Table 4 Carryover (footnote 12). BayREN and MCE's budgets are approved in the Business Plan Decision (D.18-05-041).

PA Name: Pacific Gas and Electric Company

Budget Year: 2019

Table 6 - Accrued Energy Efficiency Program Funding Not Yet Spent

Committed funds not yet spent as of Dec. 31, 2018 (\$000)	Electric Procurement Funds	Natural Gas Public Purpose Funds	Total
Category			
2013-2015 EM&V Funds	\$4,312	\$946	\$5,258
2013-2015 Program Funds - Utility	\$2,490	\$547	\$3,037
2013-2015 Program Funds - REN	\$3,084	\$677	\$3,761
2013-2015 Program Funds - CCA	\$30	\$7	\$36
2016 EM&V Funds	\$12,852	\$2,821	\$15,673
2016 Program Funds - Utility	\$0	\$0	\$0
2016 Program Funds - REN	\$0	\$0	\$0
2016 Program Funds - CCA	\$86	\$19	\$105
2017 EM&V Funds	\$12,162	\$2,317	\$14,479
2017 Program Funds - Utility	\$139	\$26	\$165
2017 Program Funds - REN	\$36	\$7	\$43
2017 Program Funds - CCA	\$0	\$0	\$0
2018 to date EM&V Funds	\$9,661	\$1,840	\$11,501
2018 to date Program Funds - Utility	\$185	\$35	\$221
2018 to date Program Funds - REN	\$4,743	\$903	\$5,647
2018 to date Program Funds - CCA	\$188	\$36	\$224
Total	\$49,968	\$10,181	\$60,149

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Table 7 - 2018 Authorized and Spent/Unspent Detail

Authorized, spent and unspent program funds (Excludes EM&V and OBF Loans) (\$000)	Electric Procurement Funds	Natural Gas Public Purpose Funds	Total
Category			
2018 Annualized Authorized Program Budget	\$325,891	\$62,074	\$387,965
2018 Actual Spent	\$255,005	\$48,572	\$303,578
2018 Unspent	\$70,886	\$13,502	\$84,388
2018 Committed funds [1]	\$5,468	\$1,042	\$6,510
2018 Unspent/uncommitted available for 2019 [2]	\$65,417	\$12,460	\$77,878

[1] Represents unspent and committed Financing Pilots and BayREN funds carry forward.

[2] Excludes \$4,236,000 of interest accrued in the balancing account.

**PG&E Gas and Electric
Advice Filing List
General Order 96-B, Section IV**

AT&T	Downey & Brand	Pioneer Community Energy
Albion Power Company	East Bay Community Energy	Praxair
Alcantar & Kahl LLP	Ellison Schneider & Harris LLP	Regulatory & Cogeneration Service, Inc.
	Energy Management Service	SCD Energy Solutions
Alta Power Group, LLC	Evaluation + Strategy for Social	
Anderson & Poole	Innovation	
	GenOn Energy, Inc.	SCE
Atlas ReFuel	Goodin, MacBride, Squeri, Schlotz &	SDG&E and SoCalGas
BART	Ritchie	
	Green Charge Networks	SPURR
Barkovich & Yap, Inc.	Green Power Institute	San Francisco Water Power and Sewer
Braun Blaising Smith Wynne	Hanna & Morton	Seattle City Light
P.C. CalCom Solar	ICF	Sempra Utilities
California Cotton Ginners & Growers Assn	International Power Technology	Southern California Edison Company
California Energy Commission	Intestate Gas Services, Inc.	Southern California Gas Company
California Public Utilities Commission	Kelly Group	Spark Energy
California State Association of Counties	Ken Bohn Consulting	Sun Light & Power
Calpine	Keyes & Fox LLP	Sunshine Design
Casner, Steve	Leviton Manufacturing Co., Inc.	Tecogen, Inc.
Cenergy Power	Linde	TerraVerde Renewable Partners
Center for Biological Diversity	Los Angeles County Integrated Waste	Tiger Natural Gas, Inc.
City of Palo Alto	Management Task Force	
	Los Angeles Dept of Water & Power	TransCanada
City of San Jose	MRW & Associates	Troutman Sanders LLP
Clean Power Research	Manatt Phelps Phillips	Utility Cost Management
Coast Economic Consulting	Marin Energy Authority	Utility Power Solutions
Commercial Energy	McKenzie & Associates	Utility Specialists
County of Tehama - Department of Public		
Works	Modesto Irrigation District	Verizon
Crossborder Energy	Morgan Stanley	Water and Energy Consulting
Crown Road Energy, LLC	NLine Energy, Inc.	Wellhead Electric Company
Davis Wright Tremaine LLP	NRG Solar	Western Manufactured Housing
Day Carter Murphy		Communities Association (WMA)
	Office of Ratepayer Advocates	Yep Energy
Dept of General Services	OnGrid Solar	
Don Pickett & Associates, Inc.	Pacific Gas and Electric Company	
Douglass & Liddell		