

PUBLIC UTILITIES COMMISSION

505 VAN NESS AVENUE
SAN FRANCISCO, CA 94102-3298



February 11, 2013

Advice Letter 3989-E

Brian K. Cherry
Vice President, Regulation and Rates
Pacific Gas and Electric Company
77 Beale Street, Mail Code B10C
P.O. Box 770000
San Francisco, CA 94177

**Subject: Amended and Restated Power Purchase Agreement for Procurement
of an Eligible Renewable Energy Resource Between Rice Solar Energy,
LLC, and PG&E**

Dear Mr. Cherry:

Advice Letter 3989-E is effective January 24, 2013 per Resolution E-4545.

Sincerely,

A handwritten signature in cursive script that reads "Edward F. Randolph".

Edward F. Randolph, Director
Energy Division

January 17, 2012

Advice 3989-E

(Pacific Gas and Electric Company ID U39 E)

Public Utilities Commission of the State of California

Subject: Amended and Restated Power Purchase Agreement for Procurement of an Eligible Renewable Energy Resource Between Rice Solar Energy, LLC, and Pacific Gas and Electric Company

I. INTRODUCTION**A. Purpose of the Advice Letter**

Pacific Gas and Electric Company (“PG&E”) seeks California Public Utilities Commission (“CPUC” or “Commission”) approval of an Amended and Restated Power Purchase Agreement (“Amended PPA”) between Rice Solar Energy, LLC (“Rice Solar”), a subsidiary of Solar Reserve, LLC, and PG&E. The Amended PPA amends the original power purchase agreement (“Original PPA”) with Rice Solar, which was approved by Commission Resolution E-4340 on July 29, 2010. Since that time, there have been a number of developments that have impacted the development of Rice Solar’s 150 megawatt (“MW”) concentrating solar thermal generating facility (“Project”). In particular, Rice Solar experienced challenges related to its interconnection with the California Independent System Operator (“CAISO”)-controlled grid and, as a result, has proposed changing its interconnection point to be with the Western Area Power Administration (“WAPA”) instead, with delivery to PG&E at the Mead Substation. The change in the delivery point could expose PG&E to the difference in energy value between Mead and the original CAISO delivery point and potentially reduce Resource Adequacy (“RA”) capacity provided by the Project. In late 2010, Rice Solar approached PG&E about amending the PPA to address these issues, as well as to change the guaranteed commercial online date (“GCOD”). After extensive negotiations, the parties agreed to the Amended PPA, which is being submitted in this Advice Letter.

The Amended PPA provides for a change in the Project’s interconnection and delivery points, a revised GCOD, and payment provisions from Rice Solar to PG&E to mitigate

risks to PG&E customers relating to energy value and RA capacity. The specific terms and conditions of the Amended PPA are described in detail in Confidential Appendix D.

B. Subject of the Advice Letter

In December 2009, PG&E entered into the Original PPA with Rice Solar for the development and operation of a renewable project using concentrating solar thermal power tower technology with molten salt thermal storage. PG&E filed the Original PPA for the Rice Solar Project with the Commission on December 22, 2009, in Advice Letter 3581-E, which was approved by the Commission on July 29, 2010 in Resolution E-4340. The Amended PPA for the Project provides for new interconnection and delivery points, a new GCOD, and associated changes to mitigate energy value and RA risk to PG&E. Details of the scope and drivers for these changes are provided in Confidential Appendix D.

C. General Project(s) Description

Project Name:	Rice Solar Energy, LLC
Technology	Solar thermal power tower with molten salt storage technology
Capacity (MW):	150 MW
Capacity Factor	34.1%
Expected Generation (GWh/Year)	Approximately 448 GWh
Guaranteed Commercial Operation Date	December 1, 2015
Date Contract Delivery Term Begins	At Initial Energy Delivery Date
Delivery Term (Years)	25 years
Vintage (New/Existing/Repower)	New Project
Location (City and State)	Rice, CA
Control Area (e.g., CAISO, BPA)	The Project will interconnect to the WAPA system with deliveries at the Mead Substation. The Project will be connected to CAISO under the terms of the

	Pseudo-tie Agreement described below.
Nearest Competitive Renewable Energy Zone (CREZ) as Identified by the Renewable Energy Transmission Initiative (RETI)¹	Riverside East
Type of cooling, if applicable	Dry cooling
Price² relative to MPR (i.e. above/below)	Above the 2011 MPR

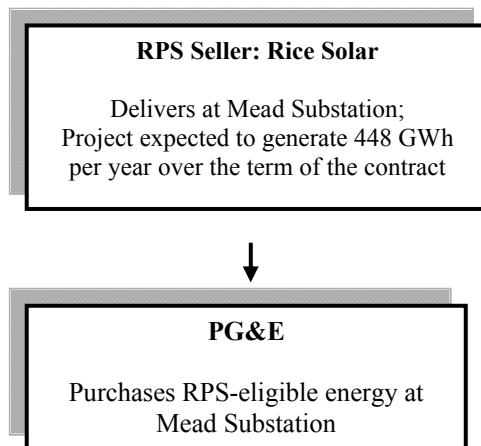
D. General Deal Structure

Under the Amended PPA, the point of interconnection for the Project will be on the WAPA Parker-Blythe #2 230 kv transmission line, and the delivery point will be WAPA's Mead Substation. The Project will be connected to the CAISO through a Pseudo Participating Generator Agreement ("Pseudo-Tie Agreement"). An order accepting the Pseudo-Tie Agreement was issued by the Federal Energy Regulatory Commission ("FERC") on August 9, 2011.³ Under the Pseudo-Tie Agreement, the Project will connect to the CAISO and will be scheduled by PG&E at the CAISO designated PNode as if it were operating in the same manner as any other generating facility located within the CAISO balancing authority area. The Pseudo-tie E Tag will show CAISO generation, a CAISO export into the Western Area Lower Colorado's ("WALC") control area, a leg of WALC transmission to get to the Mead Intertie, and then an import into the CAISO at Mead. PG&E will be the scheduling coordinator for deliveries under the Amended PPA. There is no firming and shaping associated with this transaction. Figure 1 below provides a summary of the delivery structure of the Amended PPA.

¹ Information about RETI is available at: <http://www.energy.ca.gov/reti/>.

² Should refer to the maximum price under the contract.

³ See Letter Order dated August 9, 2011 in FERC Docket No. ER11-3778-000; see also Letter Order dated August 9, 2011 in FERC Docket No. ER11-3779-000 accepting Interconnected Balancing Authority Operating Agreement between the CAISO and WAPA to facilitate Pseudo-Tie Agreement.

Figure 1: Delivery Structure of Amended PPA⁴

E. RPS Statutory Goals

Senate Bill (“SB”) 1078 established the California RPS Program, requiring an electrical corporation to increase its use of eligible renewable energy resources to 20 percent of total retail sales no later than December 31, 2017. The legislature subsequently accelerated the RPS goal to reach 20 percent by the end of 2010. On April 12, 2011, Governor Brown approved Senate Bill 2 in the First Extraordinary Session of the 2011 Legislative Session (“SBX1 2”) increasing California’s RPS target to 33 percent of delivered energy from RPS-eligible facilities by 2020. SBX1 2 also includes incremental goals between 2010 and 2020 to meet California’s 33 percent by 2020 target. The Project is scheduled to become operational on December 1, 2015. The Amended PPA will contribute to achieving PG&E’s incremental targets and the 33 percent by 2020 RPS goal.

F. Confidentiality

In support of this Advice Letter, PG&E has provided the following confidential information, including the PPA and other information that more specifically describes the rights and obligations of the parties. This information is being submitted in the manner directed by Decision (“D.”) 08-04-023 and the August 22, 2006, Administrative Law Judge’s Ruling Clarifying Interim Procedures for Complying with D.06-06-066 to

⁴ The only change in the delivery structure resulting from the Amended PPA is that the delivery point will be the Mead Substation, which is owned by WAPA and is outside the CAISO.

demonstrate the confidentiality of the material and to invoke the protection of confidential utility information provided under either the terms of the Investor Owned Utility (“IOU”) Matrix, Appendix 1 of D.06-06-066 and Appendix C of D.08-04-023, or General Order 66-C. A separate Declaration Seeking Confidential Treatment is being filed concurrently with this Advice Letter.

Confidential Attachments:

Appendix A – Consistency With Commission Decisions and Rules and Project Development Status

Appendix B – 2011 Solicitation Overview

Appendix C – Independent Evaluator Report (Confidential)

Appendix D – Contract Summary

Appendix E – Comparison of Amended PPA With Original PPA

Appendix F – Amended and Restated Power Purchase Agreement

Appendix G – Project’s Contribution Toward RPS Goals

Public Attachments:

Appendix H – Independent Evaluator Report (Public)

II. CONSISTENCY WITH COMMISSION DECISIONS

A. Consistency With PG&E’s Adopted RPS Procurement Plan

PG&E’s 2011 renewable procurement plan (“2011 RPS Plan”) was conditionally approved in D.11-04-030 on April 14, 2011. PG&E submitted a final version of the 2011 RPS Plan on May 4, 2011. The goal of PG&E’s 2011 RPS Plan is to procure approximately one to two percent of PG&E’s annual retail sales volume, or 800 to 1,600 GWh per year. The Amended PPA does not add incremental megawatts to PG&E’s current portfolio of renewable resources that are in development because the Original PPA, which was approved by the Commission in 2010, was for a 150 MW project. The Amended PPA does not modify the Project’s size. If successful, RPS-eligible energy

deliveries from the Project will remain at 448 GWh per year for a term of 25 years commencing with initial deliveries in 2015.

B. Consistency With Commission Guidelines for Bilateral Contracting

The Commission has developed guidelines for how the IOUs may enter into bilateral RPS contracts. In D.03-06-071, the Commission authorized entry into bilateral RPS contracts provided that such contracts did not require Public Goods Charge funds and were “prudent.”⁵ In D.06-10-019, the Commission again held that bilateral contracts were permissible provided that they were at least one month in duration, and also found that such contracts must be reasonable and submitted for Commission approval by advice letter.⁶ In addition, the Commission stated that bilateral contracts were not eligible for supplemental energy payments.⁷ Similarly, the Commission required that bilateral contracts be: (1) submitted for Commission approval; (2) longer than one month in duration; (3) do not receive above-market funds (“AMFs”); and (4) are deemed reasonable by the Commission.⁸ Finally, in D.09-06-050, the Commission determined that bilateral contracts should be reviewed using the same standards as contracts resulting from RPS solicitations.⁹

The Amended PPA satisfies the four requirements listed above and the requirements of D.09-06-050. The Original PPA was approved by the Commission in Resolution E-4340 on July 29, 2010, and the Amended PPA is being submitted for approval through this Advice Letter. The Amended PPA is not eligible for AMFs because it resulted from bilateral negotiations. The Amended PPA has a 25-year term, and is therefore longer than one month in duration. Finally, as PG&E explains in attached Confidential Appendix D, the terms and conditions in the Amended PPA do not materially change the economics of the Project for PG&E as compared to the Original PPA. In Resolution E-4340, the Commission concluded that: “[t]he total all-in costs of the Rice Solar Energy, LLC power purchase agreement are reasonable based on their relation to bids received in response to Pacific Gas & Electric Company’s 2009 solicitation for renewable resources.”¹⁰

⁵ D.03-06-071 at pp. 57-58.

⁶ D.06-10-019 at p. 29.

⁷ *Id.* at p. 31.

⁸ Resolution E-4216 at p. 5.

⁹ D.09-06-050 at p. 29.

¹⁰ Resolution E-4340, Findings and Conclusions No.7.

C. Consistency of Bid Evaluation Process With Least-Cost Best-Fit Decision

The RPS statute requires PG&E to procure the “least-cost best-fit” (“LCBF”) eligible renewable resources.¹¹ The LCBF decision directs the utilities to use certain criteria in their bid ranking¹² and offers guidance regarding the process by which the utility ranks bids in order to select or “shortlist” the bids with which it will commence negotiations. PG&E’s approved process for identifying the LCBF renewable resources focuses on four primary areas:

- 1) Determination of market value of bid;
- 2) Calculation of transmission adders and integration costs;
- 3) Evaluation of portfolio fit; and
- 4) Consideration of non-price factors.

PG&E examined the reasonableness of the Amended PPA using the same comparison tools used with other RPS transactions received in the 2009 RPS Solicitation. The general finding is that the Project is reasonably priced compared to this peer group.

While the economics of this project compare unfavorably to PG&E’s 2011 RPS RFO shortlist, PG&E entered into the Amended PPA with Rice Solar for the following reasons:

1. The Project will provide technology diversity (use of molten salt heat transfer fluid plus storage) to PG&E’s portfolio.
2. The technology used in the Project will allow PG&E to more easily integrate deliveries of intermittent solar energy from this Project.
3. The Amended PPA allows a previously approved project to avoid default by complying with revised terms that do not add material risk / cost to PG&E customers.
4. The Amended PPA delays deliveries from Oct 1, 2013 to Dec 1, 2015. Projects with later start dates are better aligned with PG&E’s incremental RPS compliance needs.

¹¹ Pub. Util. Code § 399.14(a)(2)(B).

¹² D.04-07-029.

PG&E provides below an overview of each of the criteria applied to the Amended PPA. A more detailed discussion of PG&E's evaluation of the amended PPA is provided in Confidential Appendices A and D.

1. Market Valuation

In a "mark-to-market analysis," the present value of the bidder's payment stream is compared with the present value of the product's market value to determine the benefit (positive or negative) from the procurement of the resource, irrespective of PG&E's portfolio. This analysis includes evaluation of the bid price and indirect costs, such as transmission and integration costs. PG&E's analysis of the market value of the Amended PPA is addressed in Confidential Appendix A.

2. Portfolio Fit

Portfolio fit considers how well an offer's features match PG&E's portfolio needs. As part of the portfolio fit assessment, PG&E differentiates offers by the firmness of their energy delivery and by their energy delivery patterns. A higher portfolio fit measure is assigned to the energy that PG&E is sure to receive and fits the needs of the existing portfolio. Because deliveries under the Amended PPA will occur mainly during the daytime and largely coincide with PG&E's peak demand, the amended PPA provides a reasonable match to PG&E's portfolio needs. In addition, the storage capabilities of this Project enhances PG&E's renewable generation portfolio. PG&E further addresses portfolio fit in Confidential Appendix D.

3. Consistency With the Transmission Ranking Cost Decision

Under D.04-06-013, the total potential cost of accepting energy deliveries from a project must be considered when determining the project's value. The change of delivery point in the Amended PPA could impact transmission and integration costs. The impacts, and provisions included in the Amended PPA to mitigate these impacts, are described in more detail in Confidential Appendix D.

4. Consistent Application of TODs

Application of TOD factors to the PPA is addressed in Confidential Appendix D.

5. Qualitative Factors

PG&E considered qualitative factors, including environmental factors, when evaluating the Project, as required by D.04-07-029 and D.07-02-011. The Project uses only a nominal amount of water due to its dry-cooling process, instead of the much greater amounts generally required in a wet-cooling process. The Project is located on private, previously disturbed land. Additionally, because of the thermal capacity of Rice Solar's CSP design, the Project uses no fossil fuel once construction is completed and operation begins (*i.e.*, there is no fossil fuel used for co-firing or supplemental heating).

D. Compliance With Standard Terms and Conditions

The Commission set forth standard terms and conditions to be incorporated into contracts for the purchase of electricity from eligible renewable energy resources in D.04-06-014 and D.07-02-011, as modified by D.07-05-057 and D.07-11-025. These terms and conditions were compiled and published in D.08-04-009. Additionally, the non-modifiable term related to Green Attributes was finalized in D.08-08-028 and the non-modifiable terms related to Tradable Renewable Energy Credits ("TREC's") were finalized in D.10-03-021.

The non-modifiable terms in the Amended PPA conforms exactly to the "non-modifiable" terms set forth in Attachment A of D.07-11-025 and Appendix A of D.08-04-009, as modified by D.08-08-028 and by Appendix C of D.10-03-021.

The following tables set forth the specific page and section number where the Commission's non-modifiable terms are located in the Amended PPA:

Non-Modifiable Term	Amended PPA Section No.	Amended PPA Page No.
STC 1: CPUC Approval	1.49	5
STC 2: Renewable Energy Credits ("REC") and Green Attributes		
• Definition of Green Attributes	1.119	11 - 12
• Conveyance of Green Attributes	3.2	31
STC 6: Eligibility	10.2(b)	61

STC 17: Applicable Law	10.12	69
STC REC-1 Transfer of RECs	10.2(b)	61
STC REC-2 Tracking of RECs in WREGIS	3.1(k)(viii)	28

The terms in the Amended PPA that correspond to the “modifiable” standard terms and conditions drafted in D.07-11-025 and D.08-04-009 have been modified based upon mutual agreement reached during negotiations. Highlighting of the modifiable and non-modifiable terms in the Amended PPA is provided in Confidential Appendix E.

Each provision in the Amended PPA is essential to the negotiated agreement between the parties, and, therefore, the Commission should not modify any of the provisions. The Commission should consider the Amended PPA as a whole in terms of its ultimate effect on utility customers. PG&E submits that the Amended PPA protects the interests of its customers while achieving the Commission’s goal of increasing procurement from eligible renewable resources.

E. Consistency With Unbundled Renewable Energy Credit Transactions

The Amended PPA is for the purchase of bundled RPS-eligible energy and therefore does not include the purchase of unbundled renewable energy credits.

F. Consistency With Minimum Quantity Decision

In D.07-05-028, the Commission determined that in order to count energy deliveries from short-term contracts with existing facilities toward RPS goals, RPS-obligated load-serving entities must contract for deliveries equal to at least 0.25 percent of their prior year’s retail sales through long-term contracts or through short-term contracts with new facilities. The Amended PPA is an amendment to long-term contract and thus counts toward PG&E’s contracting obligation under D.07-05-028. PG&E expects that, commencing in 2011, it will be in compliance with the minimum quantity set forth in D.07-05-028.

G. Tier 2 Short-Term Contract “Fast Track” Process

PG&E is not submitting this contract under the “Fast Track” Process.

H. Market-Price Referent

The actual price under the Amended PPA is confidential, market-sensitive information. It is appropriate to compare the price in the Amended PPA with the most recently approved market-price referent (“MPR”) which is the 2011 MPR established in Resolution E-4442 on December 1, 2011. The price under the Amended PPA is above the applicable 2011 MPR. Total cost information is discussed in Confidential Appendices A and D.

I. Above-Market Funds

Since the Amended PPA is a bilateral contract, it is not eligible for AMFs.

J. Compliance With Interim Emissions Performance Standard

In D.07-01-039, the Commission adopted an Emissions Performance Standard (“EPS”) that applies to new and renewal contracts for a term of five or more years for baseload generation with an annualized plant capacity factor of at least 60 percent. The Project and associated Amended PPA is not a form of covered procurement subject to the EPS because the generating facility has a forecast annualized capacity factor of less than 60 percent and therefore does not constitute baseload generation as defined by statute and the Adopted Interim EPS Rules. Notification of compliance with D.07-01-039 is provided through this Advice Letter, which has been served on the service list in the RPS rulemaking, Rulemaking (“R.”) 11-05-005.

K. Procurement Review Group Participation

The Procurement Review Group (“PRG”) for PG&E includes the Commission’s Energy Division and Division of Ratepayer Advocates, Department of Water Resources (“DWR”), Union of Concerned Scientists (“UCS”), The Utility Reform Network (“TURN”), the California Utility Employees (“CUE”), and Jan Reid, as a PG&E ratepayer. The PRG was informed of the Original PPA on August 14, 2009, and of the Amended PPA on July 20, 2011, December 1, 2011, and December 13, 2011. Additional information concerning the PRG response to the Amended PPA is provided in Confidential Appendix A.

L. Independent Evaluator

The Independent Evaluator (“IE”) for the Amended PPA was Arroyo Seco Consulting. The findings of the IE are contained in Confidential Appendix C and Public Appendix H.

M. Consistency With Decision Implementing Portfolio Content Categories

SB X1 2 set out three portfolio content categories that apply to RPS-eligible generation associated with RPS procurement contracts signed after June 1, 2010. The Commission recently described these three categories in detail in D.11-12-052. In that decision, the Commission also required the IOUs to include in their advice letters an upfront showing related to the categorization of their RPS procurement transactions signed after June 1, 2010.¹³

The Amended PPA was originally signed prior to June 1, 2010, and thus is exempt from the D.11-12-052 categorization requirements for new RPS procurement.¹⁴ The procurement associated with the Amended PPA counts in full toward procurement requirements in effect prior to SB X1 2 as long as it satisfies the following three statutory requirements:¹⁵

- (1) The renewable energy resource was eligible under the rules in place as of the date when the contract was executed.
- (2) For an electrical corporation, the contract has been approved by the commission, even if that approval occurs after June 1, 2010.
- (3) Any contract amendments or modifications occurring after June 1, 2010, do not increase the nameplate capacity or expected quantities of annual generation, or substitute a different renewable energy resource. The duration of the contract may be extended if the original contract specified a procurement commitment of 15 or more years.

¹³ D.11-12-052 at p. 10.

¹⁴ *Id.* at pp. 62-63.

¹⁵ Pub. Util. Code Section 399.16(d).

The generation associated with the Original PPA qualified as RPS-eligible renewable energy under the rules in place when the Original PPA was executed and, as mentioned above, the Original PPA was approved by Commission Resolution E-4340 on July 29, 2010. The Amended PPA does not increase the nameplate capacity for the Project or the expected quantities of annual generation and the duration remains unchanged under the Amended PPA.

III. Project Development Status

A. Company/Development Team

Rice Solar is a subsidiary of Solar Reserve, the management team of which includes executives with a wide range of energy technology, finance, and power plant development expertise. Solar Reserve reports that the aggregate industry experience of its professionals is 350 years, stemming from former employment at companies such as Rocketdyne, Invergy, HSBC, Edison, and Sempra. Solar Reserve also represented that its employees collectively have a successful track record of permitting, developing, financing, constructing, and commissioning power projects throughout the world. This includes experience on over 50 projects, in 16 countries, and totaling over 5,000 MWs financed and built.

B. Technology

1. Technology Type and Level of Technology Maturity

Rice Solar will employ a CSP tower technology that utilizes molten salt as the working fluid and that incorporates thermal storage. This technology is licensed from United Technologies Corporation (“UTC”), and was successfully demonstrated in the “Solar Two” project, a Department of Energy (“DOE”)-sponsored 10 MW demonstration project near Barstow, California. Gemasolar, a 17 MW project in Spain, utilizes similar technology and came online in 2011.

Rice Solar’s technology works by reflecting sunlight from thousands of tracking mirrors, called heliostats, and concentrating this reflected sunlight on a receiver situated at the top of a tower in the center of the heliostat field. A digital control system focuses the heliostats on the receiver as they track the sun across the sky, concentrating the sunlight hundreds of times more than its normal intensity. The receiver collects the concentrated sunlight and uses it to heat molten salt flowing through the receiver to over 1000 degrees Fahrenheit. The heated molten salt flows into a thermal storage tank and then to a steam generator. The steam produced drives a standard turbine to generate electricity.

The Project will be located in the Sonoran Desert, which is an ideal solar site in for concentrating solar technologies that require high Direct Normal Insolation (“DNI”). The historical solar resource for the area is well characterized.

2. Quality of Renewable Resource

The Project features a new, promising concentrating solar thermal power tower technology that combines efficient generation of electricity from steam (due to higher temperature steam production and low water usage) with thermal storage for an improved generation profile.

3. Other Resources Required

No other resources are required.

C. Development Milestones

The Amended PPA includes certain performance criteria and milestones based on PG&E’s filed 2011 form RPS PPA. These and other contingencies and milestones constitute sensitive commercial information and are accordingly addressed in Confidential Appendix D. The Project received its California Energy Commission certification on December 15, 2010, which authorizes the Project to begin construction. Rice Solar expects to qualify for the investment tax credit (“ITC”). Rice Solar further may qualify for the cash grant in lieu of tax credit, assuming certain conditions are met. The financing plan for the Project is discussed in detail in Confidential Appendix A.

1. Site Control

Project siting and the developer’s control over the site are discussed in Confidential Appendix A.

2. Equipment Procurement

The procurement status for the Project is discussed in Confidential Appendix A.

3. Permitting/Certification Status

The below table summarizes permits necessary for the construction and operation of the Project. Further details are included in Confidential Appendix A.

Permit and Lease Table <u>Rice Solar</u>			
Name of Permit or lease required	Public or Private?	Agency	Description of Permit
Application for Certification	Public	California Energy Commission	Lead agency permit
NEPA Record of Decision	Public	Bureau of Land Management	Environmental permit for transmission right-of-way
Interconnection Agreement	Public	Western Area Power Administration (WAPA)	Agreement to fund construction of interconnection facilities
Construction Permit & Operating Permit	Public	Mojave Desert Air Quality Management District	Air permit

4. Production Tax Credit / Investment Tax Credit

Rice Solar expects to qualify for the ITC. Rice Solar may qualify for the cash grant in lieu of tax credit, assuming certain conditions are met.

5. Transmission

The point of delivery will be Mead Substation. Additional transmission-related issues are addressed in Confidential Appendix A.

D. Financing Plan

The financing plan for the Project is discussed in Confidential Appendix A.

IV. CONTINGENCIES AND/OR PROJECT MILESTONES

The Amended PPA includes certain performance criteria and milestones based on PG&E's filed form of RPS PPA. These and other contingencies and milestones constitute sensitive commercial information and are accordingly addressed in Confidential Appendix D.

V. REGULATORY PROCESS

A. Requested Effective Date

PG&E requests that the Commission issue a resolution approving this advice filing no later than August 2, 2012. Justification for this date is provided in Confidential Appendix D.

B. Earmarking

PG&E reserves the right to earmark deliveries from the Amended PPA.

C. Request for Confidential Treatment

In support of this Advice Letter, PG&E has provided the following confidential information: the Amended PPA and other information that more specifically describes the rights and obligations of the parties. This information is being submitted in the manner directed by D.08-04-023 and the August 22, 2006, Administrative Law Judge's Ruling Clarifying Interim Procedures for Complying with D.06-06-066 to demonstrate the confidentiality of the material and to invoke the protection of confidential utility information provided under either the terms of the IOU Matrix, Appendix 1 of D.06-06-066 and Appendix C of D.08-04-023, or General Order 66-C. A separate Declaration Seeking Confidential Treatment is being filed concurrently with this Advice Letter.

Confidential Attachments:

Appendix A – Consistency With Commission Decisions and Rules and Project Development Status

Appendix B – 2009 Solicitation Overview

Appendix C – Independent Evaluator Report (Confidential)

Appendix D – Contract Summary

Appendix E – Comparison of Amended PPA With Original PPA

Appendix F – Amended and Restated Power Purchase Agreement

Appendix G – Project's Contribution Toward RPS Goals

Public Attachments:**Appendix H – Independent Evaluator Report (Public)****VI. REQUEST FOR COMMISSION APPROVAL**

PG&E requests that the Commission issue a resolution no later than **August 2, 2012**, that:

1. Approves the Amended PPA in its entirety, including payments to be made by PG&E pursuant to the Amended PPA, subject to the Commission’s review of PG&E’s administration of the Amended PPA.
2. Finds that any procurement pursuant to the Amended PPA is procurement from an eligible renewable energy resource for purposes of determining PG&E’s compliance with any obligation that it may have to procure eligible renewable energy resources pursuant to the California Renewables Portfolio Standard (Public Utilities Code Section 399.11 et seq.) (“RPS”), Decision (“D.”) 03-06-071 and D.06-10-050, or other applicable law.
3. Finds that all procurement and administrative costs, as provided by Public Utilities Code section 399.14(g), associated with the Amended PPA shall be recovered in rates.
4. Adopts the following finding of fact and conclusion of law in support of CPUC Approval:
 - a. The Amended PPA is consistent with PG&E’s 2011 RPS procurement plan.
 - b. The terms of the Amended PPA, including the price of delivered energy, are reasonable.
5. Adopts the following finding of fact and conclusion of law in support of cost recovery for the Amended PPA:
 - a. The utility’s costs under the Amended PPA shall be recovered through PG&E’s Energy Resource Recovery Account.
 - b. Any stranded costs that may arise from the Amended PPA is subject to the provisions of D.04-12-048 that authorize recovery of stranded renewables procurement costs over the life of the contract. The implementation of the

D.04-12-048 stranded cost recovery mechanism is addressed in D.08-09-012.

6. Adopts the following findings with respect to resource compliance with the Emissions Performance Standard (“EPS”) adopted in R.06-04-009:
 - a. The Amended PPA is not covered procurement subject to the EPS because the generating facility has a forecast capacity factor of less than 60 percent each and, therefore, are not baseload generation under paragraphs 1(a)(ii) and 3(2)(a) of the Adopted Interim EPS Rules.
7. Adopts a finding of fact and conclusion of law that deliveries from the Amended PPA shall count in full toward PG&E’s RPS requirements and shall be exempt from the RPS portfolio content category requirements because the original PPA and the amendment meet the criteria set forth in Section 399.16(d) of the Public Utilities Code.

Protests:

Anyone wishing to protest this filing may do so by sending a letter by **February 6, 2012**, which is **20** days from the date of this filing. The protest must state the grounds upon which it is based, including such items as financial and service impact, and should be submitted expeditiously. Protests should be mailed to:

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

Facsimile: (415) 703-2200
E-mail: mas@cpuc.ca.gov and jjj@cpuc.ca.gov

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

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

Pacific Gas and Electric Company
Attention: Brian K. Cherry
Vice President, Regulation and Rates
77 Beale Street, Mail Code B10C
P.O. Box 770000
San Francisco, California 94177

Facsimile: (415) 973-6520
E-Mail: PGETariffs@pge.com

Effective Date:

PG&E requests that the Commission issue a resolution approving this advice filing on or before **August 2, 2012**.

Notice:

In accordance with General Order 96-B, Section IV, a copy of this Advice Letter excluding the confidential appendices is being sent electronically and via U.S. mail to parties shown on the attached list and the service lists for R.11-05-005 and R.10-05-006. Non-market participants who are members of PG&E's Procurement Review Group and have signed appropriate Non-Disclosure Certificates will also receive the Advice Letter and accompanying confidential attachments by overnight mail. Address changes to the General Order 96-B service list should be directed to 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. Advice letter filings can also be accessed electronically at <http://www.pge.com/tariffs>.



Vice President – Regulation and Rates

cc: Service List for R.11-05-005
Service List for R.10-05-006
Paul Douglas – Energy Division
Jason Simon – Energy Division
Adam Schultz – Energy Division
Joseph Abhulimen – DRA
Cynthia Walker - DRA

Attachments

Limited Access to Confidential Material:

The portions of this Advice Letter marked Confidential Protected Material are submitted under the confidentiality protection of Section 583 and 454.5(g) of the Public Utilities Code and General Order 66-C. This material is protected from public disclosure because it consists of, among other items, the contract itself, price information, and analysis of the proposed RPS contract, which are protected pursuant to D.06-06-066 and D.08-04-023. A separate Declaration Seeking Confidential Treatment regarding the confidential information is filed concurrently herewith.

CALIFORNIA PUBLIC UTILITIES COMMISSION

ADVICE LETTER FILING SUMMARY

ENERGY UTILITY

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

Company name/CPUC Utility No. **Pacific Gas and Electric Company (ID U39 E)**

Utility type:

ELC GAS
 PLC HEAT WATER

Contact Person: Meredith Allen/Linda Tom-Martinez

Phone #: (415) 973-2868/(415) 973-4612

E-mail: meae@pge.com/lmt1@pge.com

EXPLANATION OF UTILITY TYPE

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

(Date Filed/ Received Stamp by CPUC)

Advice Letter (AL) #: **3989-E**

Tier: 3

Subject of AL: **Amended and Restated Power Purchase Agreement for Procurement of an Eligible Renewable Energy Resource Between Rice Solar Energy, LLC, and Pacific Gas and Electric Company**

Keywords (choose from CPUC listing): Portfolio, Contracts

AL filing type: Monthly Quarterly Annual One-Time Other _____

If AL filed in compliance with a Commission order, indicate relevant Decision/Resolution #:

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 AL¹: _____

Is AL requesting confidential treatment? If so, what information is the utility seeking confidential treatment for: Yes. See the attached matrix that identifies all of the confidential information.

Confidential information will be made available to those who have executed a nondisclosure agreement: Yes No All members of PG&E's Procurement Review Group who have signed nondisclosure agreements will receive the confidential information.

Name(s) and contact information of the person(s) who will provide the nondisclosure agreement and access to the confidential information: Uday Mathur (415-973-2784)

Resolution Required? Yes No

Requested effective date: **August 2, 2012**

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

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

CPUC, Energy Division
Tariff Files, Room 4005
DMS Branch
505 Van Ness Ave.,
San Francisco, CA 94102
jnj@cpuc.ca.gov and mas@cpuc.ca.gov

Pacific Gas and Electric Company
Attn: Brian Cherry
Vice President, Regulation and Rates
77 Beale Street, Mail Code B10C
P.O. Box 770000
San Francisco, CA 94177
E-mail: PGETariffs@pge.com

**DECLARATION OF UDAY MATHUR
SEEKING CONFIDENTIAL TREATMENT
FOR CERTAIN DATA AND INFORMATION
CONTAINED IN ADVICE LETTER 3989-E
(PACIFIC GAS AND ELECTRIC COMPANY - U 39 E)**

I, Uday Mathur, declare:

1. I am presently employed by Pacific Gas and Electric Company ("PG&E") and have been an employee since 2007. I am a principal in the Structured Transactions Group in the Energy Procurement department within PG&E. My responsibilities include negotiating PG&E's Renewables Portfolio Standard ("RPS") power purchase agreements with counterparties in the business of producing electric energy. In carrying out these responsibilities, I have acquired knowledge of such sellers in general and, based on my experience in dealing with facility owners and operators, I am familiar with the types of data and information about their operations that such owners and operators consider confidential and proprietary.

2. Based on my knowledge and experience, and in accordance with Decision ("D.") 08-04-023 and the August 22, 2006 the "Administrative Law Judge's Ruling Clarifying Interim Procedures for Complying with Decision 06-06-066," I make this declaration seeking confidential treatment of Appendices A, B, C, D, E, F, and G to Advice Letter 3989-E submitted on January 17, 2012. By this Advice Letter, PG&E is seeking this Commission's approval of an amended and restated power purchase agreement that PG&E has executed with Rice Solar Energy.

3. Attached to this declaration is a matrix identifying the data and information for which PG&E is seeking confidential treatment. The matrix specifies that the material

PG&E is seeking to protect constitutes the particular type of data and information listed in Appendix 1 of D. 06-06-066 and Appendix C of D. 08-04-023 (“the IOU Matrix”), or constitutes information that should be protected under General Order 66-C. The matrix also specifies the category or categories in the IOU Matrix to which the data and information corresponds (where applicable), and why confidential protection is justified. Finally, the matrix specifies that: (1) that PG&E is complying with the limitations specified in the IOU Matrix for that type of data or information (where applicable); (2) that the information is not already public; and (3) that the data cannot be aggregated, redacted, summarized or otherwise protected in a way that allows partial disclosure. By this reference, I am incorporating into this declaration all of the text in the attached matrix that is pertinent to this filing.

I declare under penalty of perjury, under the laws of the State of California that, to the best of my knowledge, the foregoing is true and correct. Executed on January 17, 2012, at San Francisco, California.



Uday Mathur

PACIFIC GAS AND ELECTRIC COMPANY

Advice Letter 3989-E

January 17, 2012

IDENTIFICATION OF CONFIDENTIAL INFORMATION

Redaction Reference	1) The material submitted constitutes a particular type of data listed in the Matrix, appended as Appendix 1 to D.06-06-066 (Y/N)	2) Which category or categories in the Matrix the data correspond to:	3) That it is complying with the limitations on confidentiality specified in the Matrix for that type of data (Y/N)	4) That the information is not already public (Y/N)	5) The data cannot be aggregated, redacted, summarized, masked or otherwise protected in a way that allows partial disclosure (Y/N)	PG&E's Justification for Confidential Treatment	Length of Time
Document: Appendices		Item VII G) Renewable Resource Contracts under RPS program - Contracts without SEPs.					
Appendix A	Y	Item VII (un-numbered category following VII G) Score sheets, analyses, evaluations of proposed RPS projects. Item VIII A) Bid information and B) Specific quantitative analysis involved in scoring and evaluation of participating bids. General Order 66-C.	Y	Y	Y	This Appendix contains bid information and evaluations from the 2009 and 2011 RPS Solicitations; discusses, analyzes and evaluates the Project and the terms of the PPA; contains information concerning and analyses and evaluations of project viability; and contains confidential information of the counterparties. Disclosure of this information would provide valuable market sensitive information to competitors. Release of this information would be damaging to negotiations with other counterparties and should remain confidential. In addition, if information about and evaluations of project viability is made public, it could harm the counterparties and adversely affect project viability. Finally, this information has been obtained in confidence from the counterparty under an expectation of confidentiality. It is in the public interest to treat such information as confidential	For information covered under Item VII G) remain confidential for three years after the commercial operation date, or one year after expiration (whichever is sooner). For information covered under Item VII (un-numbered category following VII G), remain confidential for three years. For information covered under Item VIII A), remain

PACIFIC GAS AND ELECTRIC COMPANY

Advice Letter 3989-E

January 17, 2012

IDENTIFICATION OF CONFIDENTIAL INFORMATION

Redaction Reference	1) The material submitted constitutes a particular type of data listed in the Matrix, appendix 1 to D.06-06-066 (Y/N)	2) Which category or categories in the Matrix the data correspond to:	3) That it is complying with the limitations on confidentiality specified in the Matrix for that type of data (Y/N)	4) That the information is not already public (Y/N)	5) The data cannot be aggregated, redacted, summarized, masked or otherwise protected in a way that allows partial disclosure (Y/N)	PG&E's Justification for Confidential Treatment	Length of Time
Appendix B	Y	Item VIII A) Bid information and B) Specific quantitative analysis involved in scoring and evaluation of participating bids.	Y	Y	Y	<p>because if such information were made public, it would put the counterparty at a business disadvantage, could create a disincentive to do business with PG&E and other regulated utilities, and could have a damaging effect on current and future negotiations with other counterparties.</p>	<p>confidential until after final contracts submitted to CPUC for approval. For information covered under Item VIII B), remain confidential for three years after winning bidders selected. For information covered under General Order 66-C, remain confidential indefinitely.</p>
						<p>This Appendix contains bid information and bid evaluations from the 2009 and 2011 RPS Solicitations. This information would provide market sensitive information to competitors and is therefore considered confidential. Furthermore, offers received outside of the solicitations are still under negotiation, further substantiating why releasing this information</p>	<p>For information covered under Item VIII A), remain confidential until after final contracts submitted to CPUC for approval</p>

PACIFIC GAS AND ELECTRIC COMPANY

Advice Letter 3989-E

January 17, 2012

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Appendix C	Y	Item VII G) Renewable Resource Contracts under RPS program - Contracts without SEPs. Item VII (un-numbered category following VII G) Score sheets, analyses, evaluations of proposed RPS projects. Item VIII A) Bid information and B) Specific quantitative analysis involved in scoring and evaluation of participating bids.	Y	Y	Y	would be damaging to the negotiation process. This Appendix contains bid information and evaluation from the 2009 and 2011 RPS Solicitations; discusses, analyzes and evaluates the Project and the terms of the PPA; contains information concerning and analyses and evaluations of project viability; and contains confidential information of the counterparties. Disclosure of this information would provide valuable market sensitive information to competitors. Release of this information would be damaging to negotiations with other counterparties and should remain confidential. In addition, if information about and evaluations of project viability is made public, it could harm the counterparties and adversely affect project viability.	For information covered under Item VIII B), remain confidential for three years after winning bidders selected. For information covered under Item VII G) remain confidential for three years after the commercial operation date, or one year after expiration (whichever is sooner). For information covered under Item VII (un-numbered category following VII G), remain

PACIFIC GAS AND ELECTRIC COMPANY

Advice Letter 3989-E

January 17, 2012

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		General Order 66-C.				<p>Finally, this information has been obtained in confidence from the counterparty under an expectation of confidentiality. It is in the public interest to treat such information as confidential because if such information were made public, it would put the counterparty at a business disadvantage, could create a disincentive to do business with PG&E and other regulated utilities, and could have a damaging effect on current and future negotiations with other counterparty.</p>	<p>confidential for three years.</p> <p>For information covered under Item VIII A), remain confidential until after final contracts submitted to CPUC for approval.</p> <p>For information covered under Item VIII B), remain confidential for three years after winning bidders selected.</p> <p>For information covered under General Order 66-C, remain confidential indefinitely.</p>

PACIFIC GAS AND ELECTRIC COMPANY

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Appendix D	Y	Item VII G) Renewable Resource Contracts under RPS program - Contracts without SEPs. Item VII (un-numbered category following VII G) Score sheets, analyses, evaluations of proposed RPS projects. Item VIII A) Bid information and B) Specific quantitative analysis involved in scoring and evaluation of participating bids. General Order 66-C.	Y	Y	Y	This Appendix contains bid information and evaluations from the 2009 and 2011 RPS Solicitations; discusses, analyzes and evaluates the Project and the terms of the PPA; and contains confidential information of the counterparties. Disclosure of this information would provide valuable market sensitive information to competitors. Release of this information would be damaging to negotiations with other counterparties and should remain confidential. Furthermore, the counterparties to the PPA have an expectation that the terms of the PPA will remain confidential pursuant to confidentiality provisions in the PPA. It is in the public interest to treat such information as confidential because if such information were made public, it would put the counterparty at a business disadvantage, could create a disincentive to do business with PG&E and other regulated utilities, and could have a damaging effect on current and future negotiations with other counterparty.	For information covered under Item VII G) remain confidential for three years after the commercial operation date, or one year after expiration (whichever is sooner). For information covered under Item VII (un-numbered category following VII G), remain confidential for three years. For information covered under Item VIII A), remain confidential until

PACIFIC GAS AND ELECTRIC COMPANY

Advice Letter 3989-E

January 17, 2012

IDENTIFICATION OF CONFIDENTIAL INFORMATION

Redaction Reference	1) The material submitted constitutes a particular type of data listed in the Matrix, appended as Appendix 1 to D.06-06-066 (Y/N)	2) Which category or categories in the Matrix the data correspond to:	3) That it is complying with the limitations on confidentiality specified in the Matrix for that type of data (Y/N)	4) That the information is not already public (Y/N)	5) The data cannot be aggregated, redacted, summarized, masked or otherwise protected in a way that allows partial disclosure (Y/N)	PG&E's Justification for Confidential Treatment	Length of Time
Appendix E	Y	Item VII G) Renewable Resource Contracts under RPS program - Contracts without SEPs.	Y	Y	Y	This Appendix contains the PPA for which PG&E seeks approval in the Advice Letter filing. Disclosure of certain terms of the PPA would provide valuable market sensitive information to competitors. Release of this information would be damaging to negotiations with other counterparties and should remain	after final contracts submitted to CPUC for approval. For information covered under Item VIII B), remain confidential for three years after winning bidders selected. For information covered under General Order 66-C, remain confidential indefinitely.

PACIFIC GAS AND ELECTRIC COMPANY
Advice Letter 3989-E
January 17, 2012

IDENTIFICATION OF CONFIDENTIAL INFORMATION

Redaction Reference	1) The material submitted constitutes a particular type of data listed in the Matrix, appended 1 to D.06-06-066 (Y/N)	2) Which category or categories in the Matrix the data correspond to:	3) That it is complying with the limitations on confidentiality specified in the Matrix for that type of data (Y/N)	4) That the information is not already public (Y/N)	5) The data cannot be aggregated, redacted, summarized, masked or otherwise protected in a way that allows partial disclosure (Y/N)	PG&E's Justification for Confidential Treatment	Length of Time
Appendix F	Y	Item VII G) Renewable Resource Contracts under RPS program - Contracts without SEPs.	Y	Y	Y	confidential. Furthermore, the counterparty to the PPA has an expectation that the terms of the PPA will remain confidential pursuant to confidentiality provisions in the PPA. This Appendix contains the PPA. Disclosure of the PPA would provide valuable market sensitive information to competitors. Release of this information would be damaging to negotiations with other counterparties and should remain confidential. Furthermore, the counterparty to the PPA has an expectation that the terms of the PPA will remain confidential pursuant to confidentiality provisions in the PPA.	one year after expiration (whichever is sooner). For information covered under Item VII G), remain confidential for three years after the commercial operation date, or one year after expiration (whichever is sooner).
Appendix G	Y	Item VII (un-numbered category following VII G) Score sheets, analyses, evaluations of proposed RPS projects. Item VI B) Utility Bundled Net Open	Y	Y	Y	This Appendix contains information that, if disclosed, would provide valuable market sensitive information to competitors and allow them to see PG&E's remaining RPS net open energy position. Since negotiations are still in progress with other counterparties, this information should remain confidential for three years.	Remain confidential for three years.

PACIFIC GAS AND ELECTRIC COMPANY

Advice Letter 3989-E

January 17, 2012

IDENTIFICATION OF CONFIDENTIAL INFORMATION

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		Position for Energy (MWh).					

PUBLIC APPENDIX H
INDEPENDENT EVALUATOR REPORT

ARROYO SECO CONSULTING

PACIFIC GAS AND
ELECTRIC COMPANY
BILATERAL CONTRACT
EVALUATION

ADVICE LETTER REPORT OF THE
INDEPENDENT EVALUATOR ON AN
AMENDED AND RESTATED CONTRACT
WITH RICE SOLAR ENERGY, LLC

JANUARY 17, 2012

This report updates an independent opinion about an amendment to a bilaterally negotiated contract between Pacific Gas and Electric Company (“PG&E”) and Rice Solar Energy, LLC (“Rice Solar”), a wholly-owned subsidiary of SolarReserve, LLC, for the output of a proposed solar thermal generation station. An independent evaluator (“IE”), Arroyo Seco Consulting (“Arroyo”) had prepared and submitted an IE report in December 2009 to accompany PG&E’s advice letter filing for the original contract.

In that prior IE report Arroyo had expressed an opinion that the Rice Solar contract merited California Public Utilities Commission (“CPUC”) approval, based on its high portfolio fit, a ranking as moderate in price and valuation when compared to then-available peer groups of competing alternatives, and an interesting contribution to the technological diversity of PG&E’s renewable portfolio. Arroyo noted in the prior report that it would not have, on its own, selected the Rice Solar contract for execution, based its independent ranking of the project as low for project viability.

In December 2010, SolarReserve notified PG&E that it intended to change the point of interconnection of the Rice Solar project, a change that required an amendment to the Power Purchase Agreement (PPA). Arroyo observed negotiations between the parties to arrive at the amended and restated agreement with Rice Solar that was executed on December 6, 2011. Arroyo has updated its prior analyses of the contract against the evaluation criteria used by the utility in selecting proposals in competitive solicitations.

Changes in Contract Terms and Attributes

SolarReserve has chosen to alter the contractual point of interconnection of the Rice Solar project to the electrical grid in a manner that now places it outside the balancing authority area of the California Independent System Operator (CAISO). This change has various adverse consequences for customers who must take delivery of Rice Solar’s output inside the CAISO. The resulting amended contract shifts certain risks to ratepayers from the project, exposing them to potential costs that they would not have borne under the original contract and the original point of interconnection. PG&E has prudently included terms in the amended contract that are intended to insulate ratepayers from most of the risks that are consequences of the changed interconnection point. However, a specific risk exposure that represents a small part of the overall risk incurred by the change remains. This renders the amended contract less attractive to ratepayers than the original PPA.

The amended contract now obligates PG&E to take specific actions in support of the Rice Solar transaction, a set of obligations that it has not previously undertaken to provide for other counterparties, to Arroyo’s knowledge. This unique treatment creates the appearance, if not the reality, of less than fully fair treatment of SolarReserve’s competitors. It could act in the future as an impediment to or limitation on PG&E procuring more competitively priced renewable energy than Rice Solar’s from other generation projects.

Changes in Ranking on Evaluation Criteria

The contract price of the amended Rice Solar contract now ranks as high, rather than moderate, when compared to currently or recently available alternatives for PG&E to procure renewable energy. This is not because the pricing or expected ratepayer cost of the

contract is substantially worsened by the amendment (though the total cost of the PPA could indeed be higher because of the amendment), but because the market price of long-term contracts for RPS-eligible energy in California has dropped materially since 2009, through no fault of SolarReserve.

Similarly, using PG&E's Least-Cost, Best-Fit valuation methodology, the Rice Solar PPA at its contract price now ranks as low in value when compared to competing alternatives instead of as moderate. Using Arroyo's independent but simpler valuation approach, the PPA ranks as moderate in value.

SolarReserve has made material progress in developing the Rice Solar facility since the prior IE report was drafted. However, Arroyo still scores Rice Solar's project viability as ranking low using the 2011 version of the Energy Division's Project Viability Calculator, in comparison to competing alternatives. PG&E rejected numerous Offers in its 2011 RPS solicitation that had both higher net value and higher project viability (as scored by PG&E) than Rice Solar currently offers, though Rice Solar has an executed contract with PG&E and most of these Offers did not.

PG&E altered its protocols for evaluating portfolio fit between its 2009 and 2011 RPS solicitations. Arroyo now ranks Rice Solar's fit with the utility's portfolio as moderate rather than high using the logic of the 2011 protocol.

After Arroyo prepared the original IE report for Rice Solar, the project design changed, in a manner that improved its consistency with PG&E's RPS Goals evaluation criterion, which is applied to proposed projects in renewable energy solicitations. This change eliminates Arroyo's prior concern about the project's inconsistency with the RPS Goals criterion.

Opinion Regarding Merit for CPUC Approval

Based on these observations, Arroyo would find it difficult to conclude that the amended and restated Rice Solar contract merits CPUC approval. The changes to the project's interconnection point and the terms of the amended contract make the PPA riskier for ratepayers. The unique treatment of Rice Solar in a specific provision of the amended contract that relates to dealing with that revised interconnection point creates at least the appearance of unfair treatment of competing developers. This specific contract provision may limit ratepayers' future opportunities to procure more competitively priced renewable energy. The contract is now distinctly uncompetitive when compared to alternatives available to PG&E. Despite progress the developer has made, Rice Solar still ranks low in project viability when scored using the Project Viability Calculator when compared to competing alternatives. To execute the amended Rice Solar contract while rejecting numerous 2011 Offers for projects with both higher viability, higher net value, and lower price creates the appearance of unfairness to those projects' developers.

However, Arroyo acknowledges that policymakers, utility executives, and other observers could easily place greater value on the innovative technology that the Rice Solar project would employ at a first-of-its-kind scale, and on the relative firmness of Rice Solar's output (as compared to the intermittency of the output of competing wind and photovoltaic

generators), rather than on the cost exposure that the amendment shifts to ratepayers or the uncompetitive high price it requires in comparison to currently available alternatives. Observers who have a different set of priorities and judgments regarding tradeoffs of price, ratepayer risk, fairness to competitors, technology diversity, and firmness of generating output could certainly come to a different opinion.

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

AT&T	Department of Water Resources	North Coast SolarResources
Alcantar & Kahl LLP	Dept of General Services	Northern California Power Association
Ameresco	Douglass & Liddell	Occidental Energy Marketing, Inc.
Anderson & Poole	Downey & Brand	OnGrid Solar
BART	Duke Energy	Praxair
Barkovich & Yap, Inc.	Economic Sciences Corporation	R. W. Beck & Associates
Bartle Wells Associates	Ellison Schneider & Harris LLP	RCS, Inc.
Bloomberg	Foster Farms	Recurrent Energy
Bloomberg New Energy Finance	G. A. Krause & Assoc.	SCD Energy Solutions
Boston Properties	GLJ Publications	SCE
Braun Blaising McLaughlin, P.C.	GenOn Energy, Inc.	SMUD
Brookfield Renewable Power	Goodin, MacBride, Squeri, Schlotz & Ritchie	SPURR
CA Bldg Industry Association	Green Power Institute	San Francisco Public Utilities Commission
CLECA Law Office	Hanna & Morton	Seattle City Light
CSC Energy Services	Hitachi	Sempra Utilities
California Cotton Ginners & Growers Assn	In House Energy	Sierra Pacific Power Company
California Energy Commission	International Power Technology	Silicon Valley Power
California League of Food Processors	Intestate Gas Services, Inc.	Silo Energy LLC
California Public Utilities Commission	Lawrence Berkeley National Lab	Southern California Edison Company
Calpine	Los Angeles Dept of Water & Power	Spark Energy, L.P.
Cardinal Cogen	Luce, Forward, Hamilton & Scripps LLP	Sun Light & Power
Casner, Steve	MAC Lighting Consulting	Sunshine Design
Center for Biological Diversity	MBMC, Inc.	Sutherland, Asbill & Brennan
Chris, King	MRW & Associates	Tabors Caramanis & Associates
City of Palo Alto	Manatt Phelps Phillips	Tecogen, Inc.
City of Palo Alto Utilities	McKenzie & Associates	Tiger Natural Gas, Inc.
City of San Jose	Merced Irrigation District	TransCanada
City of Santa Rosa	Modesto Irrigation District	Turlock Irrigation District
Clean Energy Fuels	Morgan Stanley	United Cogen
Coast Economic Consulting	Morrison & Foerster	Utility Cost Management
Commercial Energy	NLine Energy, Inc.	Utility Specialists
Consumer Federation of California	NRG West	Verizon
Crossborder Energy	NaturEner	Wellhead Electric Company
Davis Wright Tremaine LLP	Navigant Consulting	Western Manufactured Housing Communities Association (WMA)
Day Carter Murphy	Norris & Wong Associates	eMeter Corporation
Defense Energy Support Center	North America Power Partners	