PUBLIC UTILITIES COMMISSION OF THE STATE OF CALIFORNIA

ENERGY DIVISION

RESOLUTION E-4314 February 25, 2010

REDACTED

<u>R E S O L U T I O N</u>

Resolution E-4314. Pacific Gas and Electric Company (PG&E) requests approval of the amended Topaz Solar Farms LLC renewable resource procurement contract.

PROPOSED OUTCOME: This Resolution approves an amendment to a PG&E renewable energy power purchase agreement with Topaz Solar Farms LLC. The amended contract is approved without modification.

ESTIMATED COST: Costs of this contract are confidential at this time

By Advice Letter 3514-E filed on August 21, 2009.

SUMMARY

PG&E's amended contract with Topaz Solar Farms LLC complies with the Renewables Portfolio Standard procurement guidelines and is approved.

PG&E filed Advice Letter (AL) 3514-E on August 21, 2009 requesting Commission review and approval of an amended power purchase agreement (Amended PPA) to an existing PPA between PG&E and Topaz Solar Farms LLC (Topaz). The PPA was originally approved by the Commission on January 29, 2009 by Resolution E-4211. The Amended PPA consists of changes to the pricing terms, performance assurance requirements, delivery term, and project development milestones.

The Amended PPA complies with the Renewables Portfolio Standard (RPS) procurement guidelines and is approved. The Amended PPA price is deemed by the Commission to be reasonable and fully recoverable in rates over the life of

417493

the Amended PPA, subject to Commission review of PG&E's administration of the Amended PPA.

The following tables compare the substantive features of the original and amended PPAs:

Original Topaz PPA

Generating Facility	Technology Type	Term (Years)	Minimum Capacity (MW)	Minimum Energy (GWh)	Contract Delivery Start Date	Location
Topaz Solar Farms	Solar PV	20	550	1,096	12/31/2011 to 06/30/2013	Carrizo Plain, San Luis Obispo
						County

Amended Topaz PPA

Generating Facility	Technology Type	Term (Years)	Minimum Capacity (MW)	Minimum Energy (GWh)	Contract Delivery Start Date	Location
Topaz Solar Farms	Solar PV	25	550	1,066	12/31/2012 to 6/30/2014 Guaranteed Commercial Operation Date for 550 MW is June 30, 2014.	Carrizo Plain, San Luis Obispo County

NOTICE

Notice of AL 3514-E was made by publication in the Commission's Daily Calendar. PG&E states that a copy of the Advice Letter was mailed and distributed in accordance with Section 3.14 of General Order 96-B.

PROTESTS

Advice Letter 3514-E was not protested.

DISCUSSION

Overview Of RPS Program

The RPS Program administered by the Commission requires each utility to increase its total procurement of eligible renewable energy resources by at least 1% of retail sales per year so that 20% of the utility's retail sales are procured from eligible renewable energy resources no later than December 31, 2010.¹

Additional background information about the Commission's RPS Program, including links to relevant laws and Commission decisions, is available at http://www.cpuc.ca.gov/PUC/energy/Renewables/overview.htm and http://www.cpuc.ca.gov/PUC/energy/Renewables/decisions.htm.

PG&E requests approval of the Amended PPA with Topaz

The Topaz PPA is for a 550 MW solar PV project in the Carrizo Plain, San Luis Obispo County, California. The PPA resulted from PG&E's 2007 RPS solicitation. The original PPA was negotiated and executed with OptiSolar Inc. (Optisolar).² First Solar, Inc. has since acquired Optisolar, including the Topaz project and associated PPA with PG&E. PG&E was notified by First Solar that Topaz would not be able to perform under the original PPA. First Solar cited project cost increases due to differences between OptiSolar's and First Solar's equipment, project operation assumptions, and overall economic conditions that differ from those existing when Topaz and PG&E executed the original PPA.

The Amended PPA includes the following modifications:

- An increase in the contract price.
- An increase in the delivery term of the PPA from 20 to 25 years.
- An increase in performance assurance requirements.
- A one-year extension of project development milestones, including commercial operation date.

¹ See Pub. Utils. Code § 399.15(b)(1).

² See Resolution E-4221.

- A decrease in average annual deliveries from 1,096 GWh per year to an average of 1,066 GWh per year over the 25 year delivery term.
- Additional changes discussed in Confidential Appendix A.

PG&E requests the Commission to issue a resolution that:

- 1. Approves the Amended PPA in its entirety, subject to the Commission's review of PG&E's administration of the Amended PPA.
- 2. Approves all contracted-for payments to be made by PG&E for the purchase of renewable energy generated by the Project.
- 3. 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 RPS (Public Utilities Code Section 399.11 et seq.), D.03-06-071 and D.06-10-050, or other applicable law.
- 4. Finds that PG&E's contracted-for procurement of renewable energy generated by the Project 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 RPS (Public Utilities Code Section 399.11 et seq.), D.03-06-071 and D.06-10-050, or other applicable law.
- 5. Finds that all procurement and administrative costs, as provided by Public Utilities Code section 399.14(g), associated with PG&E's contracted-for purchase of renewable energy generated by the Project shall be recovered in rates.
- 6. Adopts the following conclusions of law in support of CPUC Approval:
 - a. The terms of the Amended PPA, including the price of delivered energy, are reasonable.
 - b. PG&E's entry into the Amended PPA is reasonable.
- 7. Adopts the following finding of fact and conclusion of law in support of cost recovery:

- a. The utility's contracted-for costs for the purchase of renewable energy generated by the Project shall be recovered through PG&E's Energy Resource Recovery Account.
- b. Any stranded costs that may arise from PG&E's contracted-for purchase of renewable energy generated by the Project are subject to the provisions of D.04-12-048 that authorize recovery of stranded renewables procurement costs over the life of the applicable contract. The implementation of the D.04-12-048 stranded cost recovery mechanism is addressed in D.08-09-012.
- 8. Adopts the following finding with respect to resource compliance with the EPS adopted in R.06-04-009:
 - a. The Amended PPA is not a 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.

Energy Division Review Of The Amended PPA

Energy Division evaluated the Amended PPA for the following criteria:

- Consistency with Resolution E-4199 which established requirements and evaluation criteria for contract amendments affecting price
- Cost Reasonableness
- Consistency with RPS standard terms and conditions (STC)
- Consistency with PG&E's renewable resource needs
- Project Viability
- Consistency with the Interim Emissions Performance Standard (EPS)
- Procurement Review Group (PRG) participation

Consistency With The Requirements Of Resolution E-4199

Resolution E-4199 set forth eligibility criteria and guidelines for approving requests for above-market costs of renewable energy contracts negotiated

through competitive solicitations. Because the Topaz project was selected through a competitive solicitation process, and the amended price is above the market price referent (MPR), the criteria outlined in E-4199 apply.³ Pursuant to E-4199, the utility must explain why the contract change is needed and provide all relevant data and information to justify the change. Also, a utility must make a sufficient showing in the advice letter that the amended contract is competitive based on current market data. Specifically, the amended contract's price should be compared to the projects that the IOU is negotiating and to its most recent shortlist.

Pursuant to Resolution E-4199, the Commission requires the use of an Independent Evaluator (IE) when a contract amendment is subject to requirements of Resolution E-4199. The developer must provide the IE and the Commission with cash flow models for the project's original price and proposed new price as well as the information needed to determine whether its proposed price increase reflects net changes in costs. The IE must submit a confidential report with the advice letter or application that, at minimum, includes its evaluation of the new price based on the project's market valuation as compared to the bids in the utility's most recent solicitation, a review of the cash flow model and an evaluation of the change in model inputs. An IE's conclusions must not be based on whether the developer's rate of return is reasonable, but rather whether the change in model inputs are reasonable and justify the price change.

PG&E provided the necessary Independent Evaluator report with AL 3514-E and compared the contract to the results of its 2008 solicitation. <u>AL 3514-E meets the requirements of Resolution E-4199.</u>

Cost Reasonableness

PG&E compared the Amended PPA price with projects it is negotiating and its 2008 shortlist. Based on this analysis, Energy Division determined that the Topaz Amended PPA compares favorably with bids received in response to

³ The original PPA was above the 2007 market price referent.

Resolution E-4314 PG&E AL 3514-E/AB1

PG&E's 2008 RPS solicitation. In addition, Energy Division reviewed the Independent Evaluator report which found that the Topaz price increase could be attributed to the different project structures and an increase in costs.

The total all-in costs of the Amended PPA are reasonable based on their relation to bids received in response to PG&E's 2008 RPS solicitation.

Provided the generation is from an eligible renewable energy resource, or Seller is otherwise compliant with Standard Term and Condition 6, set forth in Appendix A of D.08-04-009 and included in the terms of the PPA, payments made by PG&E under the Amended PPA are fully recoverable in rates over the life of the Amended PPA, subject to Commission review of PG&E's administration of the Amended PPA.

Consistency With RPS Standard Terms And Conditions (STCs)

The Amended PPA includes the Commission adopted RPS standard terms and conditions, including those deemed "non-modifiable".

Consistency With PG&E's Renewable Resource Needs

The project is expected to deliver in the near term and may contribute to PG&E's RPS goals in 2010 through the use of flexible compliance mechanisms.

The Amended PPA is consistent with PG&E's renewable resource needs.

Project Viability

PG&E asserts that the Amended PPA will increase the overall viability of the project. The Topaz project will now utilize First Solar's proven, thin-film photovoltaic (PV) panels, combined with a modular PV array system. First Solar has supplied panels to, constructed and operated several utility-scale PV plants, including Sempra's 10 MW El Dorado plant in Nevada which is currently delivering to PG&E and the 21 MW Blythe plant in California which is currently delivering to Southern California Edison Company.

Additionally, First Solar purchased Ausra's 177 MW solar thermal project in the Carrizo Plain in late 2009. The purchase of the project gives First Solar additional land and consequently greater flexibility for Topaz's site layout.

Compliance With The Interim Greenhouse Gas Emissions Performance Standard (EPS)

California Pub. Utils. Code §§ 8340 and 8341 require that the Commission consider emissions costs associated with new long-term (five years or greater) power contracts procured on behalf of California ratepayers.

D.07-01-039 adopted an interim EPS that establishes an emission rate quota for obligated facilities to levels no greater than the greenhouse gas (GHG) emissions of a combined-cycle gas turbine powerplant. The EPS applies to all energy contracts for baseload generation that are at least five years in duration.⁴ Renewable energy contracts are deemed compliant with the EPS except in cases where intermittent renewable energy is firmed and shaped with generation from non-renewable resources.

The Amended PPA is exempt from the EPS because it concerns an in-state RPS-eligible facility with a capacity factor less than 60 percent.

Procurement Review Group (PRG) Participation

PG&E's PRG consists of: the California Department of Water Resources, the Union of Concerned Scientists, the Division of Ratepayer Advocates, the Coalition of California Utility Employees, The Utility Reform Network, Jan Reid as a PG&E ratepayer, and the Commission's Energy Division.

PG&E informed the PRG of the Amended PPA on May 15, 2009 and June 12, 2009.

Although Energy Division participates in the PRG, it reserved judgment on the Amended PPA until the AL was filed. Energy Division reviewed the transaction independently of the PRG, and allowed for a full protest period before concluding its analysis.

⁴ "Baseload generation" is electricity generation at a power plant "designed and intended to provide electricity at an annualized plant capacity factor of at least 60%." Pub. Utils. Code § 8340 (a).

With regard to the Amended PPA, <u>PG&E</u> has complied with the Commission's rules for involving the Procurement Review Group (PRG).

The PRG feedback, as described in the confidential information provided with the AL, did not provide a basis for disapproval of the Amended PPA.

RPS ELIGIBILITY AND CPUC APPROVAL

Pursuant to Pub. Utils. Code § 399.13, the CEC certifies eligible renewable energy resources. Generation from a resource that is not CEC-certified cannot be used to meet RPS requirements. To ensure that only CEC-certified energy is procured under a Commission-approved RPS contract, the Commission has required standard and non-modifiable "eligibility" language in all RPS contracts. That language requires a seller to warrant that the project qualifies and is certified by the CEC as an "Eligible Renewable Energy Resource," that the project's output delivered to the buyer qualifies under the requirements of the California RPS, and that the seller use commercially reasonable efforts to maintain eligibility should there be a change in law affecting eligibility.⁵

The Commission requires a standard and non-modifiable clause in all RPS contracts that requires "CPUC Approval" of a PPA to include an explicit finding that "any procurement pursuant to this Agreement is procurement from an eligible renewable energy resource for purposes of determining Buyer'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.*), Decision 03-06-071, or other applicable law."

Notwithstanding this language, the Commission has no jurisdiction to determine whether a project is an eligible renewable energy resource, nor can the Commission determine prior to final CEC certification of a project, that "any procurement" pursuant to a specific contract will be "procurement from an eligible renewable energy resource."

Therefore, while we include the required finding here, this finding has never been intended, and shall not be read now, to allow the generation from a non-

⁵ See, e.g. D. 08-04-009 at Appendix A, STC 6, Eligibility.

⁶ See, e.g. D. 08-04-009 at Appendix A, STC 1, CPUC Approval.

RPS eligible resource to count towards an RPS compliance obligation. Nor shall such a finding absolve any contracting party of its obligation to obtain CEC certification and/or to pursue remedies for breach of contract to ensure that only RPS-eligible generation is delivered and paid for under a Commission-approved contract. Such contract enforcement activities shall be reviewed pursuant to the Commission's authority to review the administration of such contracts.

CONFIDENTIAL INFORMATION

The Commission, in implementing Pub. Utils. Code § 454.5(g), has determined in D.06-06-066, as modified by D.07-05-032, that certain material submitted to the Commission as confidential should be kept confidential to ensure that market sensitive data does not influence the behavior of bidders in future RPS solicitations. D.06-06-066 adopted a time limit on the confidentiality of specific terms in RPS contracts. Such information, such as price, is confidential for three years from the date the contract states that energy deliveries begin, except contracts between IOUs and their affiliates, which are public.

The confidential appendices, marked "[REDACTED]" in the public copy of this resolution, as well as the confidential portions of the advice letter, should remain confidential at this time.

COMMENTS ON THIS RESOLUTION

Pub. Utils. Code § 311(g)(1) provides that this resolution must be served on all parties and subject to at least 30 days public review and comment prior to a vote of the Commission. Section 311(g)(2) provides that this 30-day period may be reduced or waived upon the stipulation of all parties in the proceeding.

The 30-day comment period for the draft of this resolution was neither waived nor reduced. Accordingly, this draft resolution was mailed to parties for comment. No comments were filed.

FINDINGS AND CONCLUSIONS

- 1. Advice Letter 3514-E meets the requirements of Resolution E-4199.
- 2. The total all-in costs of the Amended PPA are reasonable based on their relation to bids received in response to Pacific Gas & Electric Company's (PG&E) 2008 Renewables Portfolio Standard (RPS) solicitation.

- 3. Provided the generation is from an eligible renewable energy resource, or Seller is otherwise compliant with Standard Term and Condition 6, set forth in Appendix A of D.08-04-009 and included in the terms of the Amended PPA, payments made by PG&E under the Amended PPA are fully recoverable in rates over the life of the Amended PPA, subject to Commission review of PG&E's administration of the Amended PPA.
- 4. The Amended PPA includes the Commission-adopted RPS standard terms and conditions including those deemed "non-modifiable".
- 5. The Amended PPA is consistent with PG&E's renewable resource needs.
- 6. The Amended PPA is exempt from the Interim Greenhouse Gas Emissions Performance Standard (EPS) because it concerns an in-state RPS-eligible facility with 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.
- 7. Pursuant to D.02-08-071, PG&E's Procurement Review Group (PRG) participated in the review of the Amended PPA.
- 8. The PRG feedback, as described in the confidential information provided with the advice letter, did not provide a basis for disapproval of the Amended PPA.
- 9. 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.), D.03-06-071 and D.06-10-050, or other applicable law.
- 10. The immediately preceding finding shall not be read to allow generation from a non-RPS eligible renewable energy resource under the Amended PPA to count towards an RPS compliance obligation. Nor shall that finding absolve PG&E of its obligation to enforce compliance with Standard Term and Condition 6, set forth in Appendix A of D.08-04-009, and included in the Amended PPA.
- 11. The confidential appendices, marked "[REDACTED]" in the public copy of this resolution, as well as the confidential portions of the advice letter, should remain confidential at this time.
- 12. AL 3514-E should be approved effective today.

THEREFORE IT IS ORDERED THAT:

- 1. The request by Pacific Gas and Electric Company in Advice Letter 3514-E to enter into the Amended Power Purchase Agreement with Topaz Solar Farms LLC is approved.
- 2. This Resolution is effective today.

I certify that the foregoing resolution was duly introduced, passed and adopted at a conference of the Public Utilities Commission of the State of California held on February 25, 2010; the following Commissioners voting favorably thereon:

/s/ PAUL CLANON
PAUL CLANON
Executive Director

MICHAEL R. PEEVEY
President
DIAN M. GRUENEICH
JOHN A. BOHN
TIMOTHY ALAN SIMON
NANCY E. RYAN
Commissioners

Confidential Appendix A

Summary of PPA terms and conditions [REDACTED]

Confidential Appendix B

Independent Evaluator Report Analyzing Topaz Price Increase

[REDACTED]

Confidential Appendix C

Appendix XV of the Amended PPA

[REDACTED]