

STATE OF CALIFORNIA

Public Utilities Commission  
San Francisco

**M e m o r a n d u m**

**Date:** June 5, 2012

**To:** The Commission  
(Meeting of June 7, 2012)

**From:** Lynn Sadler, Director  
Office of Governmental Affairs (OGA) — Sacramento

**Subject:** **AB 1990 (Fong) – Renewable energy resources: small-scale renewable generation program.**  
**As amended: May 25, 2012**

**LEGISLATIVE SUBCOMMITTEE RECOMMENDATION: OPPOSE**

**SUMMARY OF BILL**

AB 1990 would create a 375 MW program to procure renewable energy projects smaller than 500 kW and located in California's most disadvantaged communities (defined as specific census tracts identified using environmental justice screening method metrics). The program would also encourage hiring local employees from these communities to construct the projects.

The bill requires the CPUC to determine rates "sufficient to stimulate the market for a diverse portfolio of project sizes," effectively creating a new Feed-in-Tariff program for a small, discreet segment of the renewable market. The bill requires the CPUC to create a new proceeding to implement the program by January 31, 2013 with standard contracts to be offered by January 1, 2014. Furthermore, the bill requires the CPUC to ensure that overall program costs do not exceed 0.375% of each utility's total retail sales for 2012. This provision would require the CPUC to assess the on-going impact of individual projects against this overall program cost cap.

*NOTE: Previous versions of this bill required the CPUC to identify and quantify the value of a project's "environmental justice benefits" and to pay generators an adder for such benefits. The current version of this bill, as amended 25 May 2012, does not include this adder, nor does it require the CPUC to develop a method for promoting or assessing environmental justice benefits.*

**SUMMARY OF SUPPORTING ARGUMENTS FOR RECOMMENDATION**

**(1) The bill would impose significant costs on ratepayers.** AB 1990 would force the IOUs to procure resources from a very narrow market segment (projects smaller than 500 kW) sited in specific geographic areas. This program would result in more expensive procurement and would have a larger impact on rates than the bill suggests.

Opportunity Cost: AB 1990 Procurement vs. Existing Procurement Programs:  
SB 2 (1X) required the implementation of a cost containment mechanism on the overall RPS program. While the CPUC has yet to implement cost containment, the program proposed by AB 1990 would ultimately count against the overall cost containment cap, at the expense of other more cost effective procurement programs:

	Existing CPUC Programs		Proposed
	Large-Scale RPS Solicitation	Renewable Auction Mechanism (RAM)	AB 1990
<b>Description:</b>	Primary program to procure renewable generation to meet RPS mandates.	Bi-annual auction for distributed renewable generation.	Proposed small-scale renewable generation program with administratively determined rates.
<b>Program Size:</b>	Unspecified. Several thousands of MWs procured since 2002.	1,000 MW	375 MW
<b>Eligible Project Size:</b>	1 MW – 1,000 MW	1 MW – 20 MW	0 kW – 500 kW
<b>Average Project Size:</b>	~100 MW	~12 MW	Unknown
<b>Frequency:</b>	Annual solicitation per IOU	4 auctions over 2 years	Annual until 2020
<b>Cost:</b>	Most competitive quartile of bids (~250 bids) short-listed by the IOUs from their 2011 RPS Solicitations:  <b>&lt; \$100/MWh</b>	13 contracts for 140 MW approved from 1 <sup>st</sup> RAM Auction in April 2012. Average cost:  <b>&lt; \$80/MWh</b>	Projected cost:  <b>More than \$258/MWh</b>  See below for details.

In March 2012, the CPUC published a study titled “*Technical Potential for Local Distributed Photovoltaics in California*”<sup>1</sup> that analyzed the cost of procuring local distributed solar generating facilities across California. While that study did not analyze

<sup>1</sup> <http://www.cpuc.ca.gov/NR/rdonlyres/8A822C08-A56C-4674-A5D2-099E48B41160/0/LDPVPotentialReportMarch2012.pdf>

projects specifically smaller than 500 kW in size, the study did assess projects less than 1 MW in size (including projects below 500 kW). That study found that distributed solar projects smaller than 1 MW cost far more than the projects participating in the 2011 RPS Solicitation and RAM.

For example, according to this study, the average cost of a solar project smaller than 1 MW located in Los Angeles County is expected to be approximately \$258/MWh. This value is the midpoint between the actual 2010 cost for such a project (\$341/MWh<sup>2</sup>) and the projected cost of such a project in 2020 (\$174/MWh<sup>3</sup>) assuming a learning curve that results in significantly lower costs. For comparison, based on the results of the first RAM auction (referenced above), the CPUC could procure ~1,200 MWs of new renewable generation for the same cost as procuring 375 MW pursuant to AB 1990.

Furthermore, it is also worth noting that this study did not analyze projects with sufficient granularity to provide cost estimates for projects smaller than 500 kW in particular. As a result, the cost estimates provided here are for projects up to 1 MW in size, which can be assumed to be more cost effective than sub-500 kW projects due to economies of scale. As such, the actual cost of procuring exclusively sub-500 kW projects should be expected to be even more than this \$258/MWh figure, which is already 2-3 times as expensive as existing CPUC procurement opportunities.

*NOTE: Energy Division staff spoke with a consultant working on behalf of advocates of this bill who disputed our estimated cost of \$258/MWh to procure these resources. This consultant suggested his analysis showed a cost closer to \$130/MWh.*

*Energy Division asked to review the consultant's economic model and, upon doing so, discovered two critically flawed assumptions:*

- (1) The model presumed a financing structure inconsistent with both the language of AB 1990 and the existing RPS statute. The consultant assumed in their model a commercial owner/operator using the on-site generation to offset their bill, rather than selling the energy wholesale.*
- (2) The model presumed that projects built pursuant to the AB 1990 program would receive a separate REC payment of \$25/MWh.*

*On the wholesale side of the meter, projects built pursuant to the AB 1990 program would be paid through a PPA with a utility. As a result, the revenue stream from the project would be taxable. Additionally, projects would not receive a separate payment for their REC value as the REC attributes would be transferred to the utility for RPS compliance purposes.*

*Correcting these two assumptions in their model increased the expected cost from \$131/MWh to \$245/MWh. The reason this increased value still falls short of Energy Division's estimated \$258/MWh likely has to do with the assumed capacity factor of the*

---

<sup>2</sup> *Id.* at A-60.

<sup>3</sup> *Id.* at A-3.

*project (Energy Division's analysis used Los Angeles County as a sample and thus attributed a capacity factor of 19.3%, while the consultant's model assumed a capacity factor of 22.1%).*

Potential Rate Impact:

AB 1990 requires the CPUC to contain overall program cost to less than 0.375% of the utility's retail sales in 2012. This cost containment provision does not, however, necessarily result in ratepayer indifference.

The California Alternate Rates for Energy (CARE) program protects low income residents (defined as households with an income not greater than 200% of the federal poverty rate) from certain utility rate increases. According to the most recent compliance report filed with the CPUC on March 20, 2012, approximately 4.9 million California households are currently participating in the CARE program.

As a result, non-CARE utility customers in California would bear a disproportionate burden of the increase in rates resulting from procurement of less cost effective MWs pursuant to AB 1990's small-scale renewable generation program.

Procuring a "Diverse Portfolio"

Energy Division staff is also concerned that AB 1990 requires establishing rates to stimulate a "diverse portfolio" of projects. While we have included projected cost estimates for small-scale Solar PV (estimated at \$258/MWh above), it is likely that rates would need to be significantly higher still to procure non-solar PV (e.g., wind, biomass, geothermal, etc.) projects of this size.

**(2) AB 1990 would also impose a significant administrative burden on the CPUC.**

The expected fiscal impact is \$363,000 annually to support the addition of one PURA III, one PURA V, and one ALJ II to implement and administer the program.

This level of new staffing would be required because of the significant requirements that AB 1990 would impose on CPUC staff. Pursuant to the bill, the CPUC would have to:

- Create a **new proceeding** to assist in implementation of this new program by January 31, 2013.
- Establish annual **procurement targets** for the IOUs.
- Apply environmental justice screening method metrics to **identify specific census tracts to site** these projects.
- **Establish payment rates** "sufficient to stimulate the market" for a diverse portfolio of project sizes and to achieve the targets and benefits of program.
- Develop an **annual cost limitation** for the program no greater than 0.375% of each IOUs' forecast annual retail sales in 2020. This would require the CPUC to assess and monitor the on-going impact of individual projects against this overall program cost cap.

- Require the IOUs to “**ensure expedited interconnection**” for projects participating in this program.
- **Create maps** to publish online showing where participating projects may “best be located on the distribution grid.”
- Publish an **annual report** demonstrating program status, including local employment and economic development opportunities provided by the program and progress towards meeting environmental justice goals.
- Evaluate methods for **integrating this program** with energy efficiency and other demand-side programs.
- **Evaluate contract structures**, loan guarantees, and other arrangements with financial institutions to reduce cost and ensure benefits of the program.

**(3) The proposed program overlaps with existing CPUC programs.**

The AB 1990 small-scale generation program would be, in many respects, duplicative of existing CPUC programs. On May 24, 2012, the CPUC adopted Decision (D.) 12-05-035 implementing the **revised Section 399.20 Feed-in-Tariff (SB 32)** program. D.12-05-035, among other things, expands the size of the Feed-in-Tariff program in California to 750 MW statewide and creates the Renewable Market Adjusting Tariff (Re-MAT). The Re-MAT was designed specifically to allow the market to determine the rate required for eligible projects to successfully participate in the program. The Re-MAT provides for procurement of the most cost-effective MWs for ratepayers.

Additionally, the previous **Section 399.20 Feed-in-Tariff (AB 1969)** provided an opportunity for this market segment, offering the Market Price Referent (MPR) via standard contract to small-scale renewable generators not more than 1,500 kW in size and with a statewide program cap of 250 MW.

The projects targeted by AB 1990 have been eligible to participate in the AB 1969 Feed-in-Tariff program and would still be eligible to participate in the expanded SB 32 Feed-in-Tariff program.

Small-scale renewable generators not greater than 500 kW are also eligible to participate in various customer-side CPUC programs, such as the **Community Solar Initiative (CSI)** and the **Self-Generator Incentive Program (SGIP)**. CSI, for instance, pays Expected Performance-Based Buydown (\$/Watt) for projects < 50 kW and pays Performance-Based Incentives (\$/kWh) for projects > 50 kW.

**(4) The proposed program pre-empts ongoing CPUC analysis.**

The CPUC expects to soon award a multi-year consulting contract, the scope of work of which will address a number of issues relevant to AB 1990:

- Quantification of the economic development and job creation benefits of renewable distributed generation projects.

- Development of a detailed mapping tool to optimize the siting of renewable distributed generation.
- Quantification of the potential environmental benefits of renewable distributed generation.

AB 1990 would create a procurement program that attempts to capture these benefits of renewable distributed generation before an analytical framework has been developed to properly inform such a program. This is a misguided effort; the CPUC's ongoing analysis should be completed before a program is designed to capture these potential benefits.

## SUMMARY OF SUGGESTED AMENDMENTS

Should AB 1990 move forward, certain amendments are necessary to ensure that the bill is able to be implemented successfully. These amendments include the following:

- Amend the bill such that the proposed program is added to the existing Section 399.20 of the Public Utilities Code, rather than creating a new Section 399.23.
  - The bill should explicitly authorize an additional 375 MW of procurement within the Section 399.20 Feed-in-Tariff program (beyond the 750 MW authorized by SB 32 for the Section 399.20 Feed-in-Tariff).
- Amend the bill to clarify specifically which census tracts qualify as proper sites for locating projects under this program. Currently, Section (b)(2) of the bill identifies metrics as published in the May 2011 volume of the *International Journal of Environmental Research and Public Health* to be used in determining which census tracts are appropriate. The bill should be amended to identify precisely which census tracts meet the definition intended by the bill's author pursuant to these metrics; such application of these metrics should not be left to the CPUC.
- State law allows 18 months for the Commission to complete a proceeding, yet AB 1990 requires the CPUC to implement this program by January 31, 2013 (less than a month after the bill would become law). Given this requirement, and particularly in light of the administrative complexity of the proposed program, AB 1990 should be amended to provide at least 18 months for the CPUC to implement this program.
- Clearly define the parameters by which the program may exceed 375 MW of procurement.
- Expressly provide for CPUC to delay implementation of the program until the analysis generated by its DG Technical Analysis contract is vetted by stakeholders and incorporated into the IOUs' Least-Cost Best-Fit (LCBF) methodologies via Commission Decision.

## **DIVISION ANALYSIS (Energy Division)**

- SB 2 (1X) imposed cost containment on the entire RPS program (yet to be implemented) – thus procuring less cost-effective MWs with the AB 1990 program would reduce the ability to procure more cost-effective MWs from other RPS programs.
- AB 1990 undermines the purpose of the existing AB 1969 FiT and the SB 32 FiT (adopted by the CPUC on May 24, 2012 in D.12-05-035) that provides a market-based pricing mechanism to procure small-scale renewable projects at the least cost to ratepayers. Additionally, the AB 1990 program would create a forum shopping opportunity: projects eligible to participate in the AB 1990 program could choose between the administratively determined rates in that program, and the market-based rates set by the revised FiT (SB 32).
- The CSI program (customer-side) already provides market opportunity for small-scale solar projects up to 5MW and SGIP provides a market opportunity for projects up to 3MW.
- AB 1990 undermines the objectives of the CPUC's soon-to-be-awarded \$1.2 million / 4 year contract to hire an external consultant to assess and quantify some of the very things that this bill seeks to impose (quantifying environmental benefits of DG, quantifying the job creation potency of renewable DG programs, etc.).

## **PROGRAM BACKGROUND**

The RPS program, as set forth in Public Utilities Code Sections 399.11- 399.31, requires that California retail sellers and publically owned utilities increase the portion of retail sales that comes from RPS-eligible resources so that by 2020 and for each year thereafter 33% of California's retail electricity sales is supplied by RPS-eligible resources.

The RPS program was adopted in SB 1078 (Sher, Stats. 2002, ch. 516), and subsequently modified by SB 107 (Simitian, Stats. 2006, ch. 464), SB 1036 (Perata, Stats. 2007, ch. 685) and SB 2 (1X) (Simitian, Stats. 2011, ch. 1). The CPUC is statutorily responsible for 1) requiring each utility to submit an RPS Procurement Plan, 2) establishing a RPS cost limitation, 3) adopting a process that utilities must use to evaluate renewable energy projects proposed by independent power producers in response to the utilities' RPS solicitations, 4) adopting RPS compliance rules, 5) reviewing and approving or rejecting utilities' RPS contracts, and 6) reporting to the Legislature on various aspects of the RPS program.

The CPUC has adopted over 40 decisions to implement the RPS program and has approved approximately 200 RPS contracts for approximately 17,000 megawatts (2,500 megawatts of which have already begun delivering RPS eligible energy).

## **LEGISLATIVE HISTORY**

Within the RPS Program, Section 399.20 was added to the Public Utilities Code by AB 1969, effective January 1, 2007, to create the Feed-in-Tariff program. The AB 1969 FiT program was limited to projects no greater than 1.5 MW in size. The new SB 32 FiT program increases this maximum project size to 3 MW and is currently being implemented by the CPUC.

Since 2007, the Legislature has adopted several amendments to this code section, including SB 380, SB 32, and SB 2 (1X), and the Commission has adopted D.07-07-027 implementing the Commission's Section 399.20 FiT program as set forth in AB 1969. The proposed decision issued by ALJ DeAngelis on March 20, 2012 addresses the amendments to Section 399.20 enacted by SB 380 (Kehoe, 2008), SB 32 (Negrete McLeod, 2009), and SB 2 1X (Simitian, 2011). Primarily, the recently issued proposed decision addresses the pricing mechanism for the FiT program. More general terms and conditions for the FiT program will be addressed in another forthcoming Commission Decision, while the majority of interconnection related issues will be addressed in the ongoing R.11-09-011 proceeding.

## **FISCAL IMPACT**

The expected fiscal impact is \$363,000 annually to support the addition of one PURA III, one PURA V, and one ALJ II to implement and administer the program.

## **STATUS**

AB 1990 is pending hearing in the Senate Energy, Utilities and Communications Committee.

## **SUPPORT/OPPOSITION**

### Support

Asian & Pacific Islanders California Action Network (APIsCAN)  
Asian and Pacific Islander Obesity Prevention Alliance (APIOPA)  
Asian Communities for Reproductive Justice (ACRJ)  
Asian Immigrant Women Advocates (AIWA)  
Asian Law Caucus  
Asian Neighborhood Design  
Asian Pacific American Legal Center (APALC)  
Asian Pacific Environmental Network (APEN)  
Asian Pacific Policy & Planning Council (A3PCON)  
Association of Irrigated Residents (AIR)  
Bus Riders Union  
California Environmental Justice Alliance (CEJA)  
California Healthy Nail salon Collaborative (Collaborative)

California Rural Legal Assistance Foundation (CRLAF)  
Californians for Renewable Energy, Inc. (CARE)  
Center for Biological Diversity  
Center for Community Action and Environmental Justice (CCA EJ)  
Center on Race, Poverty & the Environment  
Chinese for Affirmative Action (CAA)  
Chinese Progressive Association (CPA)  
City Heights Community Development Corporation (CHCDC)  
Clean Coalition  
Comite Rosas  
Committee For a Better Arvin  
Committee For a Better Shafter  
Communities for a Better Environment (CBE)  
Communities for Clean Ports  
Community Health for Asian Americans  
Ella Baker Center for Human Rights, Green-Collar Jobs Campaign  
EndOil  
Environment California  
Environmental Health Coalition  
Environmental Justice Task Force of A3PCON  
Equal Action  
Filipino Advocates for Justice  
Filipino/American Coalition for Environmental Solidarity (FACES)  
Fresno Center for New Americans  
Fresno Metro Ministry  
Global Alliance for Incinerator Alternatives  
Global Green USA  
Great Leap, Inc.  
Helping Hand Tools  
Khmer Girls in Action  
Korean Resource Center (KRC)  
Koreatown Immigrant Workers Alliance  
Lao Lu Mien Culture Association, Inc. (LIMCA)  
Lao Khmu Association, Inc. (LKA)  
Little Tokyo Service Center  
Los Angeles Business Council (LABC)  
Merced Lao Family Community, Inc.  
Movement Generation: Justice & Ecology Project  
Natural Resources Defense Council (NRDC)  
Pacific Asian Consortium in Employment (PACE)  
Pacific Environment  
Pacific Isle Environment Reserve (PIER)  
People Organizing to demand Environmental and Economic Rights (PODER)  
People's Community Organization for Reform and Empowerment (People's CORE)  
RYSE Youth Center  
San Diego Coastkeeper

San Francisco Baykeeper  
Search To Involve Pilipino Americans (SIPA)  
Sierra Club California  
Silicon Valley Toxics Coalition (SVPC)  
Solaria  
Southeast Asian Assistance Center (SAAC)  
Students for Economic and Environmental Justice, UC Berkeley  
School of Law  
To'utupu 'oe 'Otu Felenite (TOFA, Inc.)  
Union of Concerned Scientists (UCS)  
Vote Solar Initiative

Opposition

Southern California Edison (SCE)

**STAFF CONTACTS**

Lynn Sadler, Director-OGA (916) 327-3277  
Nick Zanjani, Legislative Liaison-OGA (916) 327-3277

[ls1@cpuc.ca.gov](mailto:ls1@cpuc.ca.gov)  
[nkz@cpuc.ca.gov](mailto:nkz@cpuc.ca.gov)

## BILL LANGUAGE

BILL NUMBER: AB 1990 AMENDED  
BILL TEXT

AMENDED IN ASSEMBLY MAY 25, 2012  
AMENDED IN ASSEMBLY MAY 10, 2012  
AMENDED IN ASSEMBLY MAY 1, 2012  
AMENDED IN ASSEMBLY MARCH 29, 2012

INTRODUCED BY Assembly Member Fong

FEBRUARY 23, 2012

An act to add Section 399.23 to the Public Utilities Code, relating to electricity.

### LEGISLATIVE COUNSEL'S DIGEST

AB 1990, as amended, Fong. Renewable energy resources: small-scale renewable generation program.

Under existing law, the Public Utilities Commission (PUC) has regulatory authority over public utilities, including electrical corporations, as defined, while local publicly owned electric utilities, as defined, are under the direction of their governing board. Existing law requires every electrical corporation to file with the commission a standard tariff for electricity generated by an electric generation facility, as defined, that qualifies for the tariff, is owned and operated by a retail customer of the electrical corporation, and is located within the service territory of, and developed to sell electricity to, the electrical corporation. Existing law requires that, in order to qualify for the tariff, the electric generation facility: (1) have an effective capacity of not more than 3 megawatts, subject to the authority of the PUC to reduce this megawatt limitation, (2) be interconnected and operate in parallel with the electric transmission and distribution grid, (3) be strategically located and interconnected to the electric transmission system in a manner that optimizes the deliverability of electricity generated at the facility to load centers, and (4) meet the definition of an eligible renewable energy resource under the California Renewables Portfolio Standard Program. Existing decisions of the PUC implementing these requirements refer to these tariff requirements as a renewable feed-in tariff. Existing law requires a local publicly owned electric utility that sells electricity at retail to 75,000 or more customers to adopt and implement a tariff for electricity purchased from an electric generation facility meeting certain size, deliverability, and interconnection requirements and to consider certain factors.

This bill would establish the small-scale renewable generation program with the goal of installing 375 megawatts of electrical generating capacity from small-scale renewable generation facilities, as defined, in the state's most impacted and disadvantaged communities, as defined. The bill would require the PUC, in consultation with electrical corporations and interested

stakeholders, to develop program elements ~~—, as specified,~~  
for the program that are applicable to electrical  
corporations and that ~~achieve certain environmental justice  
objectives— encourage the hiring of employees from the  
state's most impacted and disadvantaged communities~~ . The bill  
would require each electrical corporation to file with the PUC a  
standard tariff for electricity purchased pursuant to a clean energy  
contract, as defined, with a small-scale renewable generation  
facility owner or operator. The bill would require the PUC to  
establish a schedule of standard tariff rates for electricity that  
electrical corporations are required to purchase through clean energy  
contracts with a small-scale renewable generation facility owner or  
operator. The bill requires each local publicly owned electric  
utility that sells electricity at retail to establish a schedule of  
standard tariff rates for electricity purchased through clean energy  
contracts from small-scale renewable generation facilities pursuant  
to a small-scale generation program for the utility. The bill would  
require the PUC to allocate procurement targets for each electrical  
corporation, and require the governing board of a local publicly  
owned electric utility to allocate procurement targets for the  
utility, in proportion to each utility's percentage share of the  
state's total peak demand measured in megawatts for the calendar year  
ending December 31, 2012.

Under existing law, a violation of the Public Utilities Act or any  
order, decision, rule, direction, demand, or requirement of the  
commission is a crime.

Because the provisions of this bill would be a part of the act and  
because a violation of an order or decision of the commission  
implementing its requirements would be a crime, the bill would impose  
a state-mandated local program by creating a new crime. Because the  
bill would impose various duties upon local publicly owned electric  
utilities, the bill would impose a state-mandated local program.

The California Constitution requires the state to reimburse local  
agencies and school districts for certain costs mandated by the  
state. Statutory provisions establish procedures for making that  
reimbursement.

This bill would provide that no reimbursement is required by this  
act for specified reasons.

Vote: majority. Appropriation: no. Fiscal committee: yes.  
State-mandated local program: yes.

THE PEOPLE OF THE STATE OF CALIFORNIA DO ENACT AS FOLLOWS:

SECTION 1. It is the intent of the Legislature to support  
small-scale local clean energy in communities throughout the state in  
order to increase green jobs and businesses that benefit the  
communities where electrical utility customers live, especially in  
the most impacted and disadvantaged communities with high  
unemployment that bear a disproportionate burden from air pollution,  
disease, and other impacts from the generation of electricity from  
the burning of fossil fuels.

SEC. 2 Section 399.23 is added to the Public Utilities Code, to  
read:

399.23. (a) It is the goal of this state and the intent of the  
Legislature to install, by December 31, 2020, 375 megawatts of  
electrical generation capacity from small-scale renewable generation

facilities in the state's most impacted and disadvantaged communities with high unemployment, supported by a program that provides carefully calibrated payments for the electricity generated and that are designed to benefit the state's most impacted and disadvantaged communities.

(b) For purposes of this section, the following terms have the following meanings:

(1) "Clean energy contract" means a standard offer long-term contract through which an electrical corporation or local publicly owned electric utility is required to purchase electricity generated by a small-scale renewable generation facility according to a preestablished price schedule when the requirements of this section are met.

(2) "Most impacted and disadvantaged communities" means ~~those areas within a region having the highest 10 percent air pollution and socioeconomic vulnerability, or those areas within a region having the highest 10 percent vulnerability to direct health or environmental impacts of climate change. The evaluation criteria for air pollution exposure shall include, at a minimum, criteria and toxic air pollution levels, proximity to sources of air pollution, and the presence of sensitive populations. The evaluation criteria for socioeconomic vulnerability, to the extent feasible, shall include multiple indicators, including poverty level, percent home ownership, unemployment level, and educational attainment within an air basin that does not meet one or more national or state ambient air quality standards, or those areas having the highest 10 percent socioeconomic vulnerability to direct health, or environmental, impacts of climate change—~~ *census tracts that are identified using the environmental justice screening method metrics developed by Professors James L. Sadd, Manuel Pastor, Rachel Morello-Frosch, Justin Scoggins, and Bill Jesdale (Vol. 8, International Journal of Environmental Research and Public Health (May 2011), Playing It Safe: Assessing Cumulative Impact and Social Vulnerability through an Environmental Justice Screening Method in the South Coast Air Basin, California, pages 1441 to 1459, inclusive)*

(3) "Small-scale renewable generation facility" means an electrical generation facility, located within the service territory of, and developed to sell electricity to, an electrical corporation or local publicly owned electric utility, that meets all of the following requirements:

(A) Has a rated capacity of not more than 500 kilowatts.

(B) Is interconnected and operates in parallel with the electrical distribution grid.

(C) Is interconnected to the electrical distribution grid in a manner that optimizes the deliverability of electricity generated at the facility to load centers.

(D) Is an eligible renewable energy resource.

(c) (1) The commission, in consultation with electrical corporations and interested stakeholders shall develop program elements for the small-scale renewable generation program applicable to electrical corporations, including eligibility criteria and payment rates for clean energy contracts with small-scale renewable generation facilities to be located in, and ~~methods to accomplish some or all of the following environmental justice benefits for—~~ *that encourage the hiring of employees from* , the state's most impacted and disadvantaged

~~communities:— communities.~~

~~—(A) Create quality local green jobs that provide prevailing wages, opportunity for advancement, and benefits.~~

~~—(B) Promote the hiring of employees from the state's most impacted and disadvantaged communities and from high quality local green job training programs.~~

~~—(C) Promote the development of local green businesses.~~

~~—(D) Promote local manufacturing in the state's most impacted and disadvantaged communities.~~

~~—(E) Promote environmentally responsible recycling of manufactured renewable energy products.~~

~~—(F) Promote local ownership of green businesses and small scale renewable generation facilities.~~

~~—(G) Facilitate efforts to target construction job opportunities to disadvantaged residents, generate tax revenue and other income for the state's most impacted and disadvantaged communities, and provide lasting remediation for the conditions of poverty and unemployment by providing careers in the skilled construction trades.~~

(2) The commission shall allocate procurement targets for each electrical corporation with the goal of procuring 375 megawatts of electrical generating capacity from small-scale renewable generation facilities statewide by December 31, 2020. The targets shall be allocated in proportion to each electrical corporation's percentage share of the state's total peak demand, measured in megawatts, for the calendar year ending December 31, 2012.

~~—(3) The commission shall determine the capacity of small scale renewable generation facilities that can be built in the state's most impacted and disadvantaged communities in order to achieve the environmental justice benefits described in paragraph (1).~~

~~—(4) The program shall be designed to support the development of a variety of generating technologies and project sizes so as to achieve a diverse portfolio of eligible renewable energy resources that provides benefits to the distribution grid and achieves the environmental justice benefits described in paragraph (1).~~

~~—(5)~~

(3) The commission shall establish a schedule of standard tariff rates for electricity that electrical corporations are required to purchase through clean energy contracts with a small-scale renewable generation facility owner or operator. The tariff payment rates shall be sufficient to stimulate the market for ~~each type of electrical generation sufficiently to meet the program targets. Separate tariff payment rates shall be created for each type of electrical generation service provided, including peaking, base load, and, as available, specific for the size range and the specified benefits of projects included in~~ a diverse portfolio of project sizes and to achieve the targets and specified benefits of the program, while maintaining ratepayer indifference for the program as a whole. Tariff rates may be adjusted to account for the availability of tax credits or other subsidies to owners of small-scale renewable electric generation facilities, to the extent necessary to ensure achievement of the benefits of this program.

~~—(6)~~

(4) The commission shall establish an annual cost

limitation for the small-scale renewable generation program, which shall not exceed 0.375 percent of the total cost of each electrical corporation's forecast retail sales in the calendar year ending December 31, 2020. The commission shall endeavor to design the program so that the program goals can reasonably be expected to be met within the cost containment limitation.

—(7)

(5) Clean energy contracts shall be for a period of 20 or more years, as authorized by the commission. It is the intent of the Legislature that long-term contracts be used to lower the average cost per kilowatthour for small-scale renewable electric generation facilities.

—(8)

(6) The commission may modify or adjust the requirements of this section for any electrical corporation with less than 100,000 service connections, as individual circumstances merit.

—(9)

(7) Every electrical corporation shall file with the commission a standard tariff for electricity purchased pursuant to a clean energy contract with a small-scale renewable generation facility owner or operator. The tariff shall provide for payment for every kilowatthour of electricity purchased from a small-scale renewable generation facility pursuant to the clean energy contract.

—(10)

(8) ~~The~~ *Not later than January 31, 2013, the* commission shall open a proceeding or expand the scope of an existing proceeding in order to accomplish the requirements of this subdivision ~~no later than January 31, 2013,~~ and shall ensure that electrical corporations begin offering clean energy contracts pursuant to the program by January 1, 2014.

(d) (1) Each local publicly owned electric utility that sells electricity at retail shall establish a schedule of standard tariff rates for electricity purchased through clean energy contracts from small-scale renewable generation facilities pursuant to a small-scale generation program for the utility. The schedule of tariff rates shall provide for payment for every kilowatthour of electricity purchased from a small-scale renewable generation facility. ~~The program shall be designed to support the development of a variety of generating technologies and project sizes so as to achieve a diverse portfolio of eligible renewable energy resources that provides benefits to the distribution grid and achieves the environmental justice benefits described in paragraph (1) of subdivision (c).~~

(2) Clean energy contracts shall be for a period of 20 or more years, as authorized by the local publicly owned electric utility. It is the intent of the Legislature that long-term contracts be used to lower the average cost per kilowatthour for small-scale renewable electric generation facilities.

(3) The tariff payment rates shall be sufficient to stimulate the market for ~~each type of electrical generation sufficiently to meet the program targets. Separate tariff payment rates shall be created for each type of electrical generation service provided, including peaking, base load, and, as available, specific for the size range and the specified benefits of projects included in~~

*a diverse portfolio of project sizes and to achieve the targets and specified benefits of the program, while maintaining ratepayer indifference for the program as a whole. Tariff rates may be adjusted to account for the availability of tax credits or other subsidies to owners of small-scale renewable electric generation facilities, to the extent necessary to ensure achievement of the benefits of this program.*

(4) Each local publicly owned electric utility shall establish an expedited interconnection procedure for small-scale renewable generation facilities.

(5) Each local publicly owned electric utility shall begin to offer clean energy contracts pursuant to its small-scale renewable generation program by January 1, 2014.

(6) Each local publicly owned electric utility shall establish a procurement target for the utility with the goal of procuring 375 megawatts of electrical generating capacity from small-scale renewable generation facilities statewide by December 31, 2020, to be allocated in proportion to each utility's percentage share of the state's total peak demand measured in megawatts for the calendar year ending December 31, 2012.

(7) The governing board of a publicly owned electric utility with fewer than 75,000 service connections may modify or adjust the requirements of this section to account for demographic distribution of population meeting the environmental justice screening method, or as individual circumstances merit. For these purposes, "environmental justice screening methodology" means the environmental justice screening method metrics developed by Professors James L. Sadd, Manuel Pastor, Rachel Morello-Frosch, Justin Scoggins, and Bill Jesdale (Vol. 8, International Journal of Environmental Research and Public Health (May 2011), Playing It Safe: Assessing Cumulative Impact and Social Vulnerability through an Environmental Justice Screening Method in the South Coast Air Basin, California, pages 1441 to 1459).

(8) The governing board of a publicly owned electric utility with 75,000 or more service connections shall ensure that the requirements of this section are met.

(e) The program shall be implemented at a regular annual pace over a period of six years. Each electrical corporation and local publicly owned electric utility shall make the clean energy contract tariff available to the owner or operator of a small-scale renewable generation facility until the utility reaches that portion of the 375 megawatts of electrical generation capacity allocated to it by the commission pursuant to paragraph (2) of subdivision (c).

(f) Within 10 days of receipt of a request for a clean energy contract pursuant to this section from an owner or operator of a small-scale renewable generation facility, the electrical corporation or local publicly owned electric utility receiving the request shall post a copy of the request on its Internet Web site. The information posted on the Internet Web site shall include the name of the city in which the facility is located, but information that is proprietary and confidential, including the address information beyond the name of the city in which the facility is located, shall be redacted.

(g) (1) An electrical corporation or local publicly owned electric utility may deny a request for a clean energy contract pursuant to this section if the utility determines any of the following to be true:

(A) The generation facility does not meet the requirements of this

section.

(B) The distribution grid that would serve as the point of interconnection is inadequate.

(C) The small-scale renewable generation facility does not meet all applicable state and local laws and building standards, and utility interconnection requirements.

(D) The aggregate of all small-scale renewable generating facilities on a distribution circuit would adversely impact utility operation and load restoration efforts of the distribution system.

(2) (A) Upon receiving a notice of denial from an electrical corporation, the owner or operator of the electric generation facility denied a clean energy contract shall have the right to appeal that decision to the commission.

(B) Upon receiving a notice of denial from a local publicly owned electric utility, the owner or operator of the small-scale renewable generation facility denied a clean energy contract shall have the right to appeal that decision to the governing board of the local publicly owned electric utility.

(3) In order to ensure the safety and reliability of small-scale renewable generation facilities, the owner of a facility receiving a clean energy contract pursuant to this section shall provide an inspection and maintenance report to the electrical corporation or local publicly owned electric utility at least once every other year. The inspection and maintenance report shall be prepared at the expense of the owner or operator by a California-licensed contractor who is not the owner or operator of the small-scale renewable generation facility. A California-licensed electrician shall perform the inspection of the electrical portion of the facility.

(4) The clean energy contract between the owner or operator of a small-scale renewable generation facility and the electrical corporation or local publicly owned electric utility shall contain provisions that ensure that construction of the facility complies with all applicable state and local laws and building standards, and utility interconnection requirements.

(h) (1) All construction and installation of facilities of the electrical corporation or local publicly owned electric utility, including at the point of the output meter or at the transmission or distribution grid, shall only be performed by that utility.

(2) All interconnection facilities installed on the utility's side of the transfer point for electricity between the electrical corporation or local publicly owned electric utility and the electrical conductors of the small-scale renewable generation facility shall be owned, operated, and maintained only by the utility. The ownership, installation, operation, reading, and testing of revenue metering equipment for electric generating facilities shall only be performed by the utility.

(i) The commission shall require electrical corporations to ensure expedited interconnection of small-scale renewable generation facilities.

(j) Every kilowatthour of electricity purchased by an electrical corporation or local publicly owned electric utility from a small-scale renewable generation facility through a clean energy contract shall count toward meeting that utility's procurement requirements for electricity products meeting the first priority portfolio content category requirements of paragraph (1) of subdivision (b) of Section 399.16, but shall not count toward the procurement requirements of subdivision (e) of Section 387.6 or

subdivision (f) of Section 399.20.

(k) ~~The commission~~ Each electrical corporation and local publicly owned electric utility shall post ~~on its Internet Web site for electrical corporations, and each local publicly owned electric utility shall post on its Internet Web site,~~ updated information on the program on its Internet Web site, that includes all of the following:

(1) Maps showing where small-scale renewable electric generation facilities may best be located on the distribution grid.

(2) Current tariffs and available capacity in the program.

(3) Local employment and economic development opportunities provided by the program.

(4) Annual reports on the program that show capacity of and energy generated by each renewable energy technology installed, progress on meeting program targets ~~and environmental justice goals, benefits of the program~~, and any recommendations for modifications to the program that would help to meet the program goals.

(1) The commission and local publicly owned electric utilities shall evaluate ways to integrate the small-scale renewable generation program with energy efficiency and other demand-side programs, and shall implement measures that will optimize the benefits and reduce the costs of the programs.

(m) The commission and local publicly owned electric utilities shall evaluate contract structures, loan guarantees, arrangements with financial institutions, community bulk purchase agreements, and other potential program elements, and shall implement measures that will reduce the cost and ensure the benefits of the small-scale renewable generation program.

SEC. 3. No reimbursement is required by this act pursuant to Section 6 of Article XIII B of the California Constitution because a local agency or school district has the authority to levy service charges, fees, or assessments sufficient to pay for the program or level of service mandated by this act or because costs that may be incurred by a local agency or school district will be incurred because this act creates a new crime or infraction, eliminates a crime or infraction, or changes the penalty for a crime or infraction, within the meaning of Section 17556 of the Government Code, or changes the definition of a crime within the meaning of Section 6 of Article XIII B of the California Constitution.