

AMENDED IN ASSEMBLY MAY 15, 2012

AMENDED IN ASSEMBLY MARCH 1, 2012

AMENDED IN SENATE MAY 25, 2011

AMENDED IN SENATE MAY 11, 2011

AMENDED IN SENATE APRIL 28, 2011

SENATE BILL

No. 594

Introduced by ~~Senator~~ *Senators Wolk and Blakeslee*

(~~Coauthor: Senator Blakeslee~~)

(*Coauthors: Senators Leno and Rubio*)

(~~Coauthor: Assembly Member Williams~~)

(*Coauthors: Assembly Members Gordon, Hill, Valadao, Williams, and Yamada*)

February 17, 2011

An act to amend ~~Section~~ *Sections 2827 and 2827.10* of the Public Utilities Code, relating to energy.

LEGISLATIVE COUNSEL'S DIGEST

SB 594, as amended, Wolk. Energy: net energy metering.

Existing law relative to private energy producers requires every electric utility, as defined, to make available to an eligible customer-generator, as defined, a standard contract or tariff for net energy metering on a first-come-first-served basis until the time that the total rated generating capacity used by eligible customer-generators exceeds 5% of the electric utility's aggregate customer peak demand. Existing law requires the electric utility, upon an affirmative election by the eligible customer-generator to receive service pursuant to this contract or tariff, to either: (1) provide net surplus electricity

compensation for any net surplus electricity generated in the 12-month period, or (2) allow the eligible customer-generator to apply the net surplus electricity as a credit for kilowatthours subsequently supplied by the electric utility to the surplus customer-generator.

This bill would authorize an eligible customer-generator with multiple meters to elect to aggregate the electrical load of the meters located on the property where the generation facility is located and on all property adjacent or contiguous to the property on which the generation facility is located, if those properties are solely owned, *leased, or rented* by the eligible customer-generator, as provided. This bill would prohibit an eligible customer-generator that chooses to aggregate from receiving net surplus electricity compensation and require the electric utility to retain kilowatthours, as prescribed.

Existing law establishes a net energy metering program that is available to an eligible fuel cell customer-generator, as defined. Existing law requires that the net metering calculation be made by measuring the difference between the electricity supplied to the eligible fuel cell customer-generator and the electricity generated by the eligible fuel cell customer-generator and fed back to the electrical grid over a 12-month period. Existing law requires that an electrical corporation determine if the eligible fuel cell customer-generator was a net consumer or producer of electricity during the 12-month period. For purposes of making this determination, existing law requires that the electrical corporation aggregate the electrical load of the eligible fuel cell customer-generator under the same ownership.

This bill would require that in making the determination whether the eligible fuel cell customer-generator is a net consumer or producer of electricity during the 12-month period, the electrical corporation aggregate the electrical load of the meters located on the property where the eligible fuel cell electrical generation facility is located and on all property adjacent or contiguous to the property on which the facility is located, if those properties are solely owned, leased, or rented by the eligible fuel cell customer-generator.

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 bill would require an expansion of the above-described net energy metering programs and would require an order or decision of the commission to implement, a violation of these provisions would

impose a state-mandated local program by expanding the definition of a crime.

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 a specified reason.

Vote: majority. Appropriation: no. Fiscal committee: yes.

State-mandated local program: ~~no~~-yes.

The people of the State of California do enact as follows:

1 SECTION 1. Section 2827 of the Public Utilities Code is
2 amended to read:

3 2827. (a) The Legislature finds and declares that a program
4 to provide net energy metering combined with net surplus
5 compensation, co-energy metering, and wind energy co-metering
6 for eligible customer-generators is one way to encourage substantial
7 private investment in renewable energy resources, stimulate in-state
8 economic growth, reduce demand for electricity during peak
9 consumption periods, help stabilize California's energy supply
10 infrastructure, enhance the continued diversification of California's
11 energy resource mix, reduce interconnection and administrative
12 costs for electricity suppliers, and encourage conservation and
13 efficiency.

14 (b) As used in this section, the following terms have the
15 following meanings:

16 (1) "Co-energy metering" means a program that is the same in
17 all other respects as a net energy metering program, except that
18 the local publicly owned electric utility has elected to apply a
19 generation-to-generation energy and time-of-use credit formula
20 as provided in subdivision (i).

21 (2) "Electrical cooperative" means an electrical cooperative as
22 defined in Section 2776.

23 (3) "Electric utility" means an electrical corporation, a local
24 publicly owned electric utility, or an electrical cooperative, or any
25 other entity, except an electric service provider, that offers electrical
26 service. This section shall not apply to a local publicly owned

1 electric utility that serves more than 750,000 customers and that
2 also conveys water to its customers.

3 (4) “Eligible customer-generator” means a residential customer,
4 small commercial customer as defined in subdivision (h) of Section
5 331, or commercial, industrial, or agricultural customer of an
6 electric utility, who uses a renewable electrical generation facility,
7 or a combination of those facilities, with a total capacity of not
8 more than one megawatt, that is located on the customer’s owned,
9 leased, or rented premises, and is interconnected and operates in
10 parallel with the ~~electric~~ *electrical* grid, and is intended primarily
11 to offset part or all of the customer’s own electrical requirements.

12 (5) “Renewable electrical generation facility” means a facility
13 that generates electricity from a renewable source listed in
14 paragraph (1) of subdivision (a) of Section 25741 of the Public
15 Resources Code. A small hydroelectric generation facility is not
16 an eligible renewable electrical generation facility if it will cause
17 an adverse impact on instream beneficial uses or cause a change
18 in the volume or timing of streamflow.

19 (6) “Net energy metering” means measuring the difference
20 between the electricity supplied through the ~~electric~~ *electrical* grid
21 and the electricity generated by an eligible customer-generator and
22 fed back to the ~~electric~~ *electrical* grid over a 12-month period as
23 described in subdivisions (c) and (h).

24 (7) “Net surplus customer-generator” means an eligible
25 customer-generator that generates more electricity during a
26 12-month period than is supplied by the electric utility to the
27 eligible customer-generator during the same 12-month period.

28 (8) “Net surplus electricity” means all electricity generated by
29 an eligible customer-generator measured in kilowatthours over a
30 12-month period that exceeds the amount of electricity consumed
31 by that eligible customer-generator.

32 (9) “Net surplus electricity compensation” means a per
33 kilowatthour rate offered by the electric utility to the net surplus
34 customer-generator for net surplus electricity that is set by the
35 ratemaking authority pursuant to subdivision (h).

36 (10) “Ratemaking authority” means, for an electrical
37 corporation, the commission, for an electrical cooperative, its
38 ratesetting body selected by its shareholders or members, and for
39 a local publicly owned electric utility, the local elected body
40 responsible for setting the rates of the local publicly owned utility.

(11) “Wind energy co-metering” means any wind energy project greater than 50 kilowatts, but not exceeding one megawatt, where the difference between the electricity supplied through the electric grid and the electricity generated by an eligible customer-generator and fed back to the ~~electric~~ *electrical* grid over a 12-month period is as described in subdivision (h). Wind energy co-metering shall be accomplished pursuant to Section 2827.8.

(c) (1) Every electric utility shall develop a standard contract or tariff providing for net energy metering, and shall make this standard contract or tariff available to eligible customer-generators, upon request, on a first-come-first-served basis until the time that the total rated generating capacity used by eligible customer-generators exceeds 5 percent of the electric utility’s aggregate customer peak demand. Net energy metering shall be accomplished using a single meter capable of registering the flow of electricity in two directions. An additional meter or meters to monitor the flow of electricity in each direction may be installed with the consent of the eligible customer-generator, at the expense of the electric utility, and the additional metering shall be used only to provide the information necessary to accurately bill or credit the eligible customer-generator pursuant to subdivision (h), or to collect generating system performance information for research purposes relative to a renewable electrical generation facility. If the existing electrical meter of an eligible customer-generator is not capable of measuring the flow of electricity in two directions, the eligible customer-generator shall be responsible for all expenses involved in purchasing and installing a meter that is able to measure electricity flow in two directions. If an additional meter or meters are installed, the net energy metering calculation shall yield a result identical to that of a single meter. An eligible customer-generator that is receiving service other than through the standard contract or tariff may elect to receive service through the standard contract or tariff until the electric utility reaches the generation limit set forth in this paragraph. Once the generation limit is reached, only eligible customer-generators that had previously elected to receive service pursuant to the standard contract or tariff have a right to continue to receive service pursuant to the standard contract or tariff. Eligibility for net energy metering does not limit an eligible customer-generator’s eligibility for any other rebate, incentive, or

1 credit provided by the electric utility, or pursuant to any
2 governmental program, including rebates and incentives provided
3 pursuant to the California Solar Initiative.

4 (2) An electrical corporation shall include a provision in the net
5 energy metering contract or tariff requiring that any customer with
6 an existing electrical generating facility and meter who enters into
7 a new net energy metering contract shall provide an inspection
8 report to the electrical corporation, unless the electrical generating
9 facility and meter have been installed or inspected within the
10 previous three years. The inspection report shall be prepared by a
11 California licensed contractor who is not the owner or operator of
12 the facility and meter. A California licensed electrician shall
13 perform the inspection of the electrical portion of the facility and
14 meter.

15 (3) (A) On an annual basis, every electric utility shall make
16 available to the ratemaking authority information on the total rated
17 generating capacity used by eligible customer-generators that are
18 customers of that provider in the provider's service area and the
19 net surplus electricity purchased by the electric utility pursuant to
20 this section.

21 (B) An electric service provider operating pursuant to Section
22 394 shall make available to the ratemaking authority the
23 information required by this paragraph for each eligible
24 customer-generator that is their customer for each service area of
25 an electrical corporation, local publicly owned electrical utility,
26 or electrical cooperative, in which the eligible customer-generator
27 has net energy metering.

28 (C) The ratemaking authority shall develop a process for making
29 the information required by this paragraph available to electric
30 utilities, and for using that information to determine when, pursuant
31 to paragraphs (1) and (4), an electric utility is not obligated to
32 provide net energy metering to additional eligible
33 customer-generators in its service area.

34 (4) An electric utility is not obligated to provide net energy
35 metering to additional eligible customer-generators in its service
36 area when the combined total peak demand of all electricity used
37 by eligible customer-generators served by all the electric utilities
38 in that service area furnishing net energy metering to eligible
39 customer-generators exceeds 5 percent of the aggregate customer
40 peak demand of those electric utilities.

1 (d) Every electric utility shall make all necessary forms and
2 contracts for net energy metering and net surplus electricity
3 compensation service available for download from the Internet.

4 (e) (1) Every electric utility shall ensure that requests for
5 establishment of net energy metering and net surplus electricity
6 compensation are processed in a time period not exceeding that
7 for similarly situated customers requesting new electric service,
8 but not to exceed 30 working days from the date it receives a
9 completed application form for net energy metering service or net
10 surplus electricity compensation, including a signed interconnection
11 agreement from an eligible customer-generator and the electric
12 inspection clearance from the governmental authority having
13 jurisdiction.

14 (2) Every electric utility shall ensure that requests for an
15 interconnection agreement from an eligible customer-generator
16 are processed in a time period not to exceed 30 working days from
17 the date it receives a completed application form from the eligible
18 customer-generator for an interconnection agreement.

19 (3) If an electric utility is unable to process a request within the
20 allowable timeframe pursuant to paragraph (1) or (2), it shall notify
21 the eligible customer-generator and the ratemaking authority of
22 the reason for its inability to process the request and the expected
23 completion date.

24 (f) (1) If a customer participates in direct transactions pursuant
25 to paragraph (1) of subdivision (b) of Section 365, or Section 365.1,
26 with an electric service provider that does not provide distribution
27 service for the direct transactions, the electric utility that provides
28 distribution service for the eligible customer-generator is not
29 obligated to provide net energy metering or net surplus electricity
30 compensation to the customer.

31 (2) If a customer participates in direct transactions pursuant to
32 paragraph (1) of subdivision (b) of Section 365 with an electric
33 service provider, and the customer is an eligible
34 customer-generator, the electric utility that provides distribution
35 service for the direct transactions may recover from the customer's
36 electric service provider the incremental costs of metering and
37 billing service related to net energy metering and net surplus
38 electricity compensation in an amount set by the ratemaking
39 authority.

1 (g) Except for the time-variant kilowatthour pricing portion of
2 any tariff adopted by the commission pursuant to paragraph (4) of
3 subdivision (a) of Section 2851, each net energy metering contract
4 or tariff shall be identical, with respect to rate structure, all retail
5 rate components, and any monthly charges, to the contract or tariff
6 to which the same customer would be assigned if the customer did
7 not use a renewable electrical generation facility, except that
8 eligible customer-generators shall not be assessed standby charges
9 on the electrical generating capacity or the kilowatthour production
10 of a renewable electrical generation facility. The charges for all
11 retail rate components for eligible customer-generators shall be
12 based exclusively on the customer-generator's net kilowatthour
13 consumption over a 12-month period, without regard to the eligible
14 customer-generator's choice as to from whom it purchases
15 electricity that is not self-generated. Any new or additional demand
16 charge, standby charge, customer charge, minimum monthly
17 charge, interconnection charge, or any other charge that would
18 increase an eligible customer-generator's costs beyond those of
19 other customers who are not eligible customer-generators in the
20 rate class to which the eligible customer-generator would otherwise
21 be assigned if the customer did not own, lease, rent, or otherwise
22 operate a renewable electrical generation facility is contrary to the
23 intent of this section, and shall not form a part of net energy
24 metering contracts or tariffs.

25 (h) For eligible customer-generators, the net energy metering
26 calculation shall be made by measuring the difference between
27 the electricity supplied to the eligible customer-generator and the
28 electricity generated by the eligible customer-generator and fed
29 back to the ~~electric~~ *electrical* grid over a 12-month period. The
30 following rules shall apply to the annualized net metering
31 calculation:

32 (1) The eligible residential or small commercial
33 customer-generator, at the end of each 12-month period following
34 the date of final interconnection of the eligible
35 customer-generator's system with an electric utility, and at each
36 anniversary date thereafter, shall be billed for electricity used
37 during that 12-month period. The electric utility shall determine
38 if the eligible residential or small commercial customer-generator
39 was a net consumer or a net surplus customer-generator during
40 that period.

(2) At the end of each 12-month period, where the electricity supplied during the period by the electric utility exceeds the electricity generated by the eligible residential or small commercial customer-generator during that same period, the eligible residential or small commercial customer-generator is a net electricity consumer and the electric utility shall be owed compensation for the eligible customer-generator's net kilowatthour consumption over that 12-month period. The compensation owed for the eligible residential or small commercial customer-generator's consumption shall be calculated as follows:

(A) For all eligible customer-generators taking service under contracts or tariffs employing "baseline" and "over baseline" rates, any net monthly consumption of electricity shall be calculated according to the terms of the contract or tariff to which the same customer would be assigned to, or be eligible for, if the customer was not an eligible customer-generator. If those same customer-generators are net generators over a billing period, the net kilowatthours generated shall be valued at the same price per kilowatthour as the electric utility would charge for the baseline quantity of electricity during that billing period, and if the number of kilowatthours generated exceeds the baseline quantity, the excess shall be valued at the same price per kilowatthour as the electric utility would charge for electricity over the baseline quantity during that billing period.

(B) For all eligible customer-generators taking service under contracts or tariffs employing time-of-use rates, any net monthly consumption of electricity shall be calculated according to the terms of the contract or tariff to which the same customer would be assigned, or be eligible for, if the customer was not an eligible customer-generator. When those same customer-generators are net generators during any discrete time-of-use period, the net kilowatthours produced shall be valued at the same price per kilowatthour as the electric utility would charge for retail kilowatthour sales during that same time-of-use period. If the eligible customer-generator's time-of-use electrical meter is unable to measure the flow of electricity in two directions, paragraph (1) of subdivision (c) shall apply.

(C) For all eligible residential and small commercial customer-generators and for each billing period, the net balance of moneys owed to the electric utility for net consumption of

1 electricity or credits owed to the eligible customer-generator for
2 net generation of electricity shall be carried forward as a monetary
3 value until the end of each 12-month period. For all eligible
4 commercial, industrial, and agricultural customer-generators, the
5 net balance of moneys owed shall be paid in accordance with the
6 electric utility's normal billing cycle, except that if the eligible
7 commercial, industrial, or agricultural customer-generator is a net
8 electricity producer over a normal billing cycle, any excess
9 kilowatthours generated during the billing cycle shall be carried
10 over to the following billing period as a monetary value, calculated
11 according to the procedures set forth in this section, and appear as
12 a credit on the eligible commercial, industrial, or agricultural
13 customer-generator's account, until the end of the annual period
14 when paragraph (3) shall apply.

15 (3) At the end of each 12-month period, where the electricity
16 generated by the eligible customer-generator during the 12-month
17 period exceeds the electricity supplied by the electric utility during
18 that same period, the eligible customer-generator is a net surplus
19 customer-generator and the electric utility, upon an affirmative
20 election by the net surplus customer-generator, shall either (A)
21 provide net surplus electricity compensation for any net surplus
22 electricity generated during the prior 12-month period, or (B) allow
23 the net surplus customer-generator to apply the net surplus
24 electricity as a credit for kilowatthours subsequently supplied by
25 the electric utility to the net surplus customer-generator. For an
26 eligible customer-generator that does not affirmatively elect to
27 receive service pursuant to net surplus electricity compensation,
28 the electric utility shall retain any excess kilowatthours generated
29 during the prior 12-month period. The eligible customer-generator
30 not affirmatively electing to receive service pursuant to net surplus
31 electricity compensation shall not be owed any compensation for
32 the net surplus electricity unless the electric utility enters into a
33 purchase agreement with the eligible customer-generator for those
34 excess kilowatthours. Every electric utility shall provide notice to
35 eligible customer-generators that they are eligible to receive net
36 surplus electricity compensation for net surplus electricity, that
37 they must elect to receive net surplus electricity compensation,
38 and that the 12-month period commences when the electric utility
39 receives the eligible customer-generator's election. For an electric
40 utility that is an electrical corporation or electrical cooperative,

1 the commission may adopt requirements for providing notice and
2 the manner by which eligible customer-generators may elect to
3 receive net surplus electricity compensation.

4 (4) (A) An eligible customer-generator with multiple meters
5 may elect to aggregate the electrical load of the meters located on
6 the property where the generation facility is located and on all
7 property adjacent or contiguous to the property on which the
8 generation facility is located, if those properties are solely owned,
9 *leased, or rented* by the eligible customer-generator. If the eligible
10 customer-generator elects to aggregate the electric load pursuant
11 to this paragraph, the electric utility shall use the aggregated load
12 for the purpose of determining whether an eligible
13 customer-generator is a net consumer or a net surplus
14 customer-generator during a 12-month period.

15 (B) If an eligible customer-generator chooses to aggregate
16 pursuant to subparagraph (A), the eligible customer-generator shall
17 be permanently ineligible to receive net surplus electricity
18 compensation, and the electric utility shall retain any kilowatthours
19 in excess of the eligible customer-generator's aggregated electrical
20 load generated during the 12-month period.

21 (5) (A) The ratemaking authority shall establish a net surplus
22 electricity compensation valuation to compensate the net surplus
23 customer-generator for the value of net surplus electricity generated
24 by the net surplus customer-generator. The commission shall
25 establish the valuation in a ratemaking proceeding. The ratemaking
26 authority for a local publicly owned electric utility shall establish
27 the valuation in a public proceeding. The net surplus electricity
28 compensation valuation shall be established so as to provide the
29 net surplus customer-generator just and reasonable compensation
30 for the value of net surplus electricity, while leaving other
31 ratepayers unaffected. The ratemaking authority shall determine
32 whether the compensation will include, where appropriate
33 justification exists, either or both of the following components:

34 (i) The value of the electricity itself.

35 (ii) The value of the renewable attributes of the electricity.

36 (B) In establishing the rate pursuant to subparagraph (A), the
37 ratemaking authority shall ensure that the rate does not result in a
38 shifting of costs between eligible customer-generators and other
39 bundled service customers.

(6) (A) Upon adoption of the net surplus electricity compensation rate by the ratemaking authority, any renewable energy credit, as defined in Section 399.12, for net surplus electricity purchased by the electric utility shall belong to the electric utility. Any renewable energy credit associated with electricity generated by the eligible customer-generator that is utilized by the eligible customer-generator shall remain the property of the eligible customer-generator.

(B) Upon adoption of the net surplus electricity compensation rate by the ratemaking authority, the net surplus electricity purchased by the electric utility shall count toward the electric utility's renewables portfolio standard annual procurement targets for the purposes of paragraph (1) of subdivision (b) of Section 399.15, or for a local publicly owned electric utility, the renewables portfolio standard annual procurement targets established pursuant to Section 387.

(7) The electric utility shall provide every eligible residential or small commercial customer-generator with net electricity consumption and net surplus electricity generation information with each regular bill. That information shall include the current monetary balance owed the electric utility for net electricity consumed, or the net surplus electricity generated, since the last 12-month period ended. Notwithstanding this subdivision, an electric utility shall permit that customer to pay monthly for net energy consumed.

(8) If an eligible residential or small commercial customer-generator terminates the customer relationship with the electric utility, the electric utility shall reconcile the eligible customer-generator's consumption and production of electricity during any part of a 12-month period following the last reconciliation, according to the requirements set forth in this subdivision, except that those requirements shall apply only to the months since the most recent 12-month bill.

(9) If an electric service provider or electric utility providing net energy metering to a residential or small commercial customer-generator ceases providing that electric service to that customer during any 12-month period, and the customer-generator enters into a new net energy metering contract or tariff with a new electric service provider or electric utility, the 12-month period, with respect to that new electric service provider or electric utility,

1 shall commence on the date on which the new electric service
2 provider or electric utility first supplies electric service to the
3 customer-generator.

4 (i) Notwithstanding any other provisions of this section,
5 paragraphs (1), (2), and (3) shall apply to an eligible
6 customer-generator with a capacity of more than 10 kilowatts, but
7 not exceeding one megawatt, that receives electric service from a
8 local publicly owned electric utility that has elected to utilize a
9 co-energy metering program unless the local publicly owned
10 electric utility chooses to provide service for eligible
11 customer-generators with a capacity of more than 10 kilowatts in
12 accordance with subdivisions (g) and (h):

13 (1) The eligible customer-generator shall be required to utilize
14 a meter, or multiple meters, capable of separately measuring
15 electricity flow in both directions. All meters shall provide
16 time-of-use measurements of electricity flow, and the customer
17 shall take service on a time-of-use rate schedule. If the existing
18 meter of the eligible customer-generator is not a time-of-use meter
19 or is not capable of measuring total flow of electricity in both
20 directions, the eligible customer-generator shall be responsible for
21 all expenses involved in purchasing and installing a meter that is
22 both time-of-use and able to measure total electricity flow in both
23 directions. This subdivision shall not restrict the ability of an
24 eligible customer-generator to utilize any economic incentives
25 provided by a governmental agency or an electric utility to reduce
26 its costs for purchasing and installing a time-of-use meter.

27 (2) The consumption of electricity from the local publicly owned
28 electric utility shall result in a cost to the eligible
29 customer-generator to be priced in accordance with the standard
30 rate charged to the eligible customer-generator in accordance with
31 the rate structure to which the customer would be assigned if the
32 customer did not use a renewable electrical generation facility.
33 The generation of electricity provided to the local publicly owned
34 electric utility shall result in a credit to the eligible
35 customer-generator and shall be priced in accordance with the
36 generation component, established under the applicable structure
37 to which the customer would be assigned if the customer did not
38 use a renewable electrical generation facility.

39 (3) All costs and credits shall be shown on the eligible
40 customer-generator's bill for each billing period. In any months

1 in which the eligible customer-generator has been a net consumer
2 of electricity calculated on the basis of value determined pursuant
3 to paragraph (2), the customer-generator shall owe to the local
4 publicly owned electric utility the balance of electricity costs and
5 credits during that billing period. In any billing period in which
6 the eligible customer-generator has been a net producer of
7 electricity calculated on the basis of value determined pursuant to
8 paragraph (2), the local publicly owned electric utility shall owe
9 to the eligible customer-generator the balance of electricity costs
10 and credits during that billing period. Any net credit to the eligible
11 customer-generator of electricity costs may be carried forward to
12 subsequent billing periods, provided that a local publicly owned
13 electric utility may choose to carry the credit over as a kilowatthour
14 credit consistent with the provisions of any applicable contract or
15 tariff, including any differences attributable to the time of
16 generation of the electricity. At the end of each 12-month period,
17 the local publicly owned electric utility may reduce any net credit
18 due to the eligible customer-generator to zero.

19 (j) A renewable electrical generation facility used by an eligible
20 customer-generator shall meet all applicable safety and
21 performance standards established by the National Electrical Code,
22 the Institute of Electrical and Electronics Engineers, and accredited
23 testing laboratories, including Underwriters Laboratories
24 Incorporated and, where applicable, rules of the commission
25 regarding safety and reliability. A customer-generator whose
26 renewable electrical generation facility meets those standards and
27 rules shall not be required to install additional controls, perform
28 or pay for additional tests, or purchase additional liability
29 insurance.

30 (k) If the commission determines that there are cost or revenue
31 obligations for an electrical corporation that may not be recovered
32 from customer-generators acting pursuant to this section, those
33 obligations shall remain within the customer class from which any
34 shortfall occurred and shall not be shifted to any other customer
35 class. Net energy metering and co-energy metering customers shall
36 not be exempt from the public goods charges imposed pursuant to
37 Article 7 (commencing with Section 381), Article 8 (commencing
38 with Section 385), or Article 15 (commencing with Section 399)
39 of Chapter 2.3 of Part 1.

(l) A net energy metering, co-energy metering, or wind energy co-metering customer shall reimburse the Department of Water Resources for all charges that would otherwise be imposed on the customer by the commission to recover bond-related costs pursuant to an agreement between the commission and the Department of Water Resources pursuant to Section 80110 of the Water Code, as well as the costs of the department equal to the share of the department's estimated net unavoidable power purchase contract costs attributable to the customer. The commission shall incorporate the determination into an existing proceeding before the commission, and shall ensure that the charges are nonbypassable. Until the commission has made a determination regarding the nonbypassable charges, net energy metering, co-energy metering, and wind energy co-metering shall continue under the same rules, procedures, terms, and conditions as were applicable on December 31, 2002.

(m) In implementing the requirements of subdivisions (k) and (l), an eligible customer-generator shall not be required to replace its existing meter except as set forth in paragraph (1) of subdivision (c), nor shall the electric utility require additional measurement of usage beyond that which is necessary for customers in the same rate class as the eligible customer-generator.

(n) It is the intent of the Legislature that the Treasurer incorporate net energy metering, including net surplus electricity compensation, co-energy metering, and wind energy co-metering projects undertaken pursuant to this section as sustainable building methods or distributive energy technologies for purposes of evaluating low-income housing projects.

SEC. 2. Section 2827.10 of the Public Utilities Code is amended to read:

2827.10. (a) As used in this section, the following terms have the following meanings:

(1) "Electrical corporation" means an electrical corporation, as defined in Section 218.

(2) "Eligible fuel cell electrical generating facility" means a facility that includes the following:

(A) Integrated powerplant systems containing a stack, tubular array, or other functionally similar configuration used to electrochemically convert fuel to electric energy.

(B) An inverter and fuel processing system where necessary.

1 (C) Other plant equipment, including heat recovery equipment,
2 necessary to support the plant's operation or its energy conversion.

3 (3) "Eligible fuel cell customer-generator" means a customer
4 of an electrical corporation that meets all the following criteria:

5 (A) Uses a fuel cell electrical generating facility with a capacity
6 of not more than one megawatt that is located on or adjacent to
7 the customer's owned, leased, or rented premises, is interconnected
8 and operates in parallel with the ~~electric~~ *electrical* grid while the
9 grid is operational or in a grid independent mode when the grid is
10 nonoperational, and is sized to offset part or all of the eligible fuel
11 cell customer-generator's own electrical requirements.

12 (B) Is the recipient of local, state, or federal funds, or who
13 self-finances projects designed to encourage the development of
14 eligible fuel cell electrical generating facilities.

15 (C) Uses technology the commission has determined will
16 achieve reductions in emissions of greenhouse gases pursuant to
17 subdivision (b), and meets the emission requirements for eligibility
18 for funding set forth in subdivision (c), of Section 379.6.

19 (4) "Net energy metering" means measuring the difference
20 between the electricity supplied through the electrical grid and the
21 difference between the electricity generated by an eligible fuel cell
22 electrical generating facility and fed back to the ~~electric~~ *electrical*
23 grid over a 12-month period as described in subdivision (e). Net
24 energy metering shall be accomplished using a time-of-use meter
25 capable of registering the flow of electricity in two directions. If
26 the existing electrical meter of an eligible fuel cell
27 customer-generator is not capable of measuring the flow of
28 electricity in two directions, the eligible fuel cell
29 customer-generator shall be responsible for all expenses involved
30 in purchasing and installing a meter that is able to measure
31 electricity flow in two directions. If an additional meter or meters
32 are installed, the net energy metering calculation shall yield a result
33 identical to that of a time-of-use meter.

34 (b) Every electrical corporation shall, not later than March 1,
35 2004, file with the commission a standard tariff providing for net
36 energy metering for eligible fuel cell customer-generators,
37 consistent with this section. Every electrical corporation shall make
38 this tariff available to eligible fuel cell customer-generators upon
39 request, on a first-come-first-served basis, until the total cumulative
40 rated generating capacity used by the eligible fuel cell

customer-generators equals 45 megawatts within the service territory of the electrical corporation for an electrical corporation with a peak demand above 10,000 megawatts, or equals 22.5 megawatts within the service territory of the electrical corporation for an electrical corporation with a peak demand of 10,000 megawatts or below. The combined statewide cumulative rated generating capacity used by the eligible fuel cell customer-generators in the service territories of all electrical corporations in the state may not exceed 112.5 megawatts.

(c) In determining the eligibility for the cumulative rated generating capacity within an electrical service area, preference shall be given to facilities which, at the time of installation, are located in a community with significant exposure to air contaminants or localized air contaminants, or both, including, but not limited to, communities of minority populations or low-income populations, or both, based on the ambient air quality standards established pursuant to Section 39607 of the Health and Safety Code.

(d) Each net energy metering contract or tariff shall be identical, with respect to rate structure, all retail rate components, and any monthly charges, to the contract or tariff to which the customer would be assigned if the customer was not an eligible fuel cell customer-generator. Any new or additional demand charge, standby charge, customer charge, minimum monthly charge, interconnection charge, or other charge that would increase an eligible fuel cell customer-generator's costs beyond those of other customers in the rate class to which the eligible fuel cell customer-generator would otherwise be assigned are contrary to the intent of the Legislature in enacting the act adding this section, and may not form a part of net energy metering tariffs.

(e) The net metering calculation shall be made by measuring the difference between the electricity supplied to the eligible customer-generator and the electricity generated by the eligible customer-generator and fed back to the ~~electric~~ *electrical* grid over a 12-month period. The following rules shall apply to the annualized metering calculation:

(1) The eligible fuel cell customer-generator shall, at the end of each 12-month period following the date of final interconnection of the eligible fuel cell electrical generating facility with an electrical corporation, and at each anniversary date thereafter, be

1 billed for electricity used during that period. The electrical
2 corporation shall determine if the eligible fuel cell
3 customer-generator was a net consumer or a net producer of
4 electricity during that period. For purposes of determining if the
5 eligible fuel cell customer-generator was a net consumer or a net
6 producer of electricity during that period, the electrical corporation
7 shall aggregate the electrical load of the *meters located on the*
8 *property where the eligible fuel cell electrical generation facility*
9 *is located and on all property adjacent or contiguous to the*
10 *property on which the facility is located, if those properties are*
11 *solely owned, leased, or rented by the eligible fuel cell*
12 *customer-generator under the same ownership.* Each aggregated
13 account shall be billed and measured according to a time-of-use
14 rate schedule.

15 (2) At the end of each 12-month period, where the electricity
16 supplied during the period by the electrical corporation exceeds
17 the electricity generated by the eligible fuel cell customer-generator
18 during that same period, the eligible fuel cell customer-generator
19 is a net electricity consumer and the electrical corporation shall
20 be owed compensation for the eligible fuel cell
21 customer-generator's net kilowatthour consumption over that same
22 period. The compensation owed for the eligible fuel cell
23 customer-generator's consumption shall be calculated as follows:

24 (A) The generation charges for any net monthly consumption
25 of electricity shall be calculated according to the terms of the tariff
26 to which the same customer would be assigned to or be eligible
27 for if the customer was not an eligible fuel cell customer-generator.
28 When the eligible fuel cell customer-generators is a net generator
29 during any discrete time-of-use period, the net kilowatthours
30 produced shall be valued at the same price per kilowatthour as the
31 electrical corporation would charge for retail kilowatthour sales
32 for generation, exclusive of any surcharges, during that same
33 time-of-use period. If the eligible fuel cell customer-generator's
34 time-of-use electrical meter is unable to measure the flow of
35 electricity in two directions, paragraph (4) of subdivision (a) shall
36 apply. All other charges, other than generation charges, shall be
37 calculated in accordance with the eligible fuel cell
38 customer-generator's applicable tariff and based on the total
39 kilowatthours delivered by the electrical corporation to the eligible
40 fuel cell customer-generator. To the extent that charges for

transmission and distribution services are recovered through demand charges in any particular month, no standby reservation charges shall apply in that monthly billing cycle.

(B) The net balance of moneys owed shall be paid in accordance with the electrical corporation's normal billing cycle.

(3) At the end of each 12-month period, where the electricity generated by the eligible fuel cell customer-generator during the 12-month period exceeds the electricity supplied by the electrical corporation during that same period, the eligible fuel cell customer-generator is a net electricity producer and the electrical corporation shall retain any excess kilowatthours generated during the prior 12-month period. The eligible fuel cell customer-generator shall not be owed any compensation for those excess kilowatthours.

(4) If an eligible fuel cell customer-generator terminates service with the electrical corporation, the electrical corporation shall reconcile the eligible fuel cell customer-generator's consumption and production of electricity during any 12-month period.

(f) A fuel cell electrical generating facility shall not be eligible for participation in the tariff established pursuant to this section unless it commenced operation before January 1, 2014. A fuel cell customer-generator shall be eligible for the tariff established pursuant to this section only for the operating life of the eligible fuel cell electrical generating facility.

SEC. 3. No reimbursement is required by this act pursuant to Section 6 of Article XIII B of the California Constitution because the only 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.