A Bill for an Act Relating to Renewable Energy Resources.

Be It Enacted by the Legislature of the State of Hawaii:

PART I. RENEWABLES PORTFOLIO STANDARD

SECTION 1. It is the intent of the legislature to recognize the economic, environmental, and fuel diversity benefits of renewable energy resources and to encourage the establishment of a market for renewable energy in Hawaii using the State's renewable energy resources and to encourage the further development of those resources. The legislature finds that while Hawaii is a national leader in the development of renewable energy resources for electricity production, there may be more that the State can do to encourage the development and implementation of renewable energy. These efforts can reduce the amount of imported oil used for the generation of electricity.

Accordingly, the legislature finds that it should establish goals for electric utilities to guide them in incorporating renewable resources into their resource portfolios to reduce the use of imported oil.

The purpose of this Act is to lessen Hawaii's dependence on imported oil by encouraging the greater use of renewable energy by:

- (1) Establishing goals for electric utility companies in implementing renewable portfolio standards by including a minimum percentage of renewable energy resources within an overall resource portfolio; and
- (2) Enabling qualified customer-generators to utilize net energy metering and allow for monthly billing.

SECTION 2. For the purposes of this Act:

"Electric utility company," means a public utility as defined under section 269-1, Hawaii Revised Statutes, for the production, conveyance, transmission, delivery, or furnishing of power.

"Renewable energy" means electrical energy produced by wind, solar energy, hydropower, landfill gas, waste to energy, geothermal resources, ocean thermal energy conversion, wave energy, biomass including municipal solid waste, biofuels or fuels derived entirely from organic sources, hydrogen fuels derived entirely from renewable energy, or fuel cells where the fuel is derived entirely from renewable sources. "Renewable energy" also means electrical energy savings brought about by the use of solar and heat pump water heating.

"Renewable portfolio standard" means the percentage of electrical energy sales that is represented by renewable energy.

SECTION 3. Renewable portfolio standards. Each electric utility company that sells electricity for consumption in the State shall establish a renewables portfolio standard goal of:

- (1) Seven per cent of its net electricity sales by December 31, 2003;
- (2) Eight per cent of its net electricity sales by December 31, 2005; and

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(3) Nine per cent of its net electricity sales by December 31, 2010.

SECTION 4. An electric utility company and its electric utility affiliates may aggregate their renewable portfolios in order to achieve the renewable portfolio standard.

SECTION 5. Any electric utility company not meeting the renewable portfolio standard shall report to the public utilities commission within ninety days following the goal dates established in section 3 of this Act, and provide an explanation for not meeting the renewable portfolio standard. The public utilities commission shall have the option to either grant a waiver from the renewable portfolio standard or an extension for meeting the prescribed standard.

The public utilities commission may provide incentives to encourage electric utility companies to exceed their renewable portfolio standards or to meet their renewable portfolio standards ahead of time, or both.

PART II. NET ENERGY METERING

SECTION 6. Chapter 269, Hawaii Revised Statutes, is amended by adding a new part to be appropriately designated and to read as follows:

"PART . NET ENERGY METERING

§269-A Definitions. As used in this part:

"Eligible customer-generator" means a metered residential or commercial customer of an electric utility who owns and operates a solar, wind turbine, biomass, or hydroelectric energy generating facility, or a hybrid system consisting of two or more of these facilities, with a capacity of not more than ten kilowatts, that is:

- (1) Located on the customer's premises;
- (2) Operated in parallel with the utility's transmission and distribution facilities;
- (3) In conformance with the utility's interconnection requirements; and
- (4) Intended primarily to offset part or all of the customer's own electrical requirements.

"Net energy metering" means measuring 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 grid over a monthly billing period; provided that:

- (1) Net energy metering shall be accomplished using a single meter capable of registering the flow of electricity in two directions;
- (2) An additional meter or meters to monitor the flow of electricity in each direction may be installed with the consent of the 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 customer-generator, or to collect solar, wind turbine, biomass, or hydroelectric energy generating system performance information for research purposes;
- (3) If the existing electrical meter of an eligible customer-generator is not capable of measuring the flow of electricity in two directions, the electric utility shall be responsible for all expenses involved in purchasing and installing a meter that is able to measure electricity flow in two directions;
- (4) If an additional meter or meters are installed, the net energy metering calculation shall yield a result identical to that of a single meter; and
- (5) An eligible customer-generator who already owns an existing solar, wind turbine, biomass, or hydroelectric energy generating facility, or a hybrid system consisting of two or more of these facilities, is eligible to receive net energy metering service in accordance with this part.

\$269-B Standard contract or tariff; rate structure. (a) Every electric utility shall develop a standard contract or tariff providing for net energy metering, and shall make this contract available to eligible customer-generators, upon request,

on a first-come-first-served basis until the time that the total rated generating capacity produced by eligible customer-generators equals .5 per cent of the electric utility's system peak demand.

(b) Each net energy metering contract or tariff shall be identical, with respect to rate structure, to the contract or tariff to which the same customer would be assigned if the customer was not an eligible customer-generator. The charges for all retail rate components for eligible customer-generators shall be based exclusively on the eligible customer-generator's net kilowatt-hour consumption over a monthly billing period. Any new or additional demand charge, standby charge, customer charge, minimum monthly charge, interconnection charge, or other charge that would increase an eligible customer-generator's costs beyond those of other customers in the rate class to which the eligible customer-generator would otherwise be assigned are contrary to the intent of this section, and shall not form a part of net energy metering contracts or tariffs.

§269-C Generating capacity. On an annual basis, beginning in 2003, every electric utility shall make available to the public utilities commission information on the total rated generating capacity produced by eligible customer-generators that are customers of that utility in the utility's service area. The public utilities commission shall develop a process for making the information required by this section available to electric utilities, and for using that information to determine when, pursuant to section 269-D, an electric utility is not obligated to provide net energy metering to additional customer-generators in its service area.

§269-D Additional customer-generators. Notwithstanding section 269-B, an electric utility is not obligated to provide net energy metering to additional customer-generators in its service area when the combined total peak generating capacity of all eligible customer-generators served by all the electric utilities in that service area furnishing net energy metering to eligible customer-generators equals .5 per cent of the system peak demand of those electric utilities.

\$269-E Calculation. The net energy metering calculation shall be made by measuring the difference between the electricity supplied to the eligible customergenerator and the electricity generated by the eligible customer-generator and fed back to the electric grid over a monthly billing period.

\$269-F Billing periods. Billing of net metering customers shall be only on a monthly basis.

§269-G Net electricity consumers. At the end of each monthly billing period, where the electricity supplied during the period by the electric utility exceeds the electricity generated by the eligible customer-generator during that same period, the eligible customer-generator is a net electricity consumer and the electric utility shall be owed compensation for the eligible customer-generator's net kilowatt-hour consumption over that same period. The compensation owed for the eligible customer-generator's net monthly kilowatt-hour consumption shall be calculated at the retail rate of the rate class the customer is normally assigned to.

§269-H Net electricity producers. At the end of each monthly billing period, where the electricity generated by the eligible customer-generator during the month exceeds the electricity supplied by the electric utility during that same period, the eligible customer-generator is a net electricity producer and the electric utility shall retain any excess kilowatt-hours generated during the prior monthly billing period. The eligible customer-generator shall not be owed any compensation for those excess kilowatt-hours unless the electric utility enters into a purchase agreement with the eligible customer-generator for those excess kilowatt-hours.

\$269-I Net electricity consumption or production information. The electric utility shall provide every eligible customer-generator with net electricity consumption or production information with each regular monthly bill, which shall include the current monetary balance owed the electric utility for net electricity consumed or net electricity produced since the end of the last monthly billing period.

§269-J Termination by eligible customer-generators. If an eligible 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 monthly billing period following the last reconciliation, according to the requirements set forth in this part.

§269-K Safety and performance standards. A solar, wind turbine, biomass, or hydroelectric energy generating system, or a hybrid system consisting of two or more of these facilities, used by an eligible customer-generator shall meet all applicable safety and performance standards established by the National Electrical Code, the Institute of Electrical and Electronics Engineers, and accredited testing laboratories such as the Underwriters Laboratories and, where applicable, rules of the public utilities commission regarding safety and reliability. An eligible customer-generator whose solar, wind turbine, biomass, or hydroelectric energy generating system, or whose hybrid system consisting of two or more of these facilities, meets those standards and rules shall not be required to install additional controls, perform or pay for additional tests, or purchase additional liability insurance."

SECTION 7. Section 269-1, Hawaii Revised Statutes, is amended as follows: 1. By deleting the definition of "eligible customer-generator".

[""Éligible customer-generator" means a metered residential customer of an electric utility who owns and operates a solar, wind, or micro hydro electric energy generating facility with a capacity of not more than ten kilowatts, that is located on the customer's premises, operates in parallel with the utility's transmission and distribution facilities, is in conformance with the utility's interconnection requirements, and is intended primarily to offset part or all of the customer's own electrical requirements."]

2. By deleting the definitions of "incremental cost of alternative electric energy", and "net energy metering". [""Incremental cost of alternative electric energy" means, with respect to

["...Incremental cost of alternative electric energy" means, with respect to electric energy purchased from an eligible customer generator, the cost to the utility of the electric energy that, but for the purchase from the eligible customer-generator, the utility would generate or purchase from another non-firm source.

"Net energy metering" means using a non-time-differentiated meter to measure the electricity supplied by a utility and another non-time-differentiated meter to measure the electricity generated by an eligible customer generator and fed back to the utility over an entire billing period."]

SECTION 8. Section 269-16.21, Hawaii Revised Statutes, is repealed.

PART III.

SECTION 9. In codifying the new sections added by section 6 of this Act, the revisor of statutes shall substitute appropriate section numbers for the letters used in designating the new sections in this Act.

SECTION 10. Statutory material to be repealed is bracketed and stricken.¹

SECTION 11. This Act shall take effect upon its approval. (Approved June 25, 2001.)

Note

1. Edited pursuant to HRS §23G-16.5.

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