

TESTIMONY OF HERMINA MORITA  
CHAIR, PUBLIC UTILITIES COMMISSION  
DEPARTMENT OF BUDGET AND FINANCE  
STATE OF HAWAII  
TO THE  
HOUSE COMMITTEE ON ENERGY & ENVIRONMENTAL PROTECTION

FEBRUARY 7, 2013  
9:00 a.m.

**MEASURE:** H.B. No. 1363

**TITLE:** Relating to Community-Based Renewable Energy

Chair Lee and Members of the Committee:

**DESCRIPTION:**

This measure would create a net energy metering-like structure called the Hawaii Community-Based Renewable Energy Program where an electric utility customer may purchase an interest in a community renewable energy facility ("facility") located within the customer's service territory for the purpose of offsetting the customer's electricity use with energy produced by the facility. The measure would require every electric utility to develop a standard contract or tariff for all participants similar to the net energy metering ("NEM") tariff, where charges for all retail rate components for participants shall be based exclusively on a net kilowatt-hour consumption calculation that subtracts a set share of the production from the facility from the customer's electricity consumption. Also, credits for excess energy produced can be earned by participants during each twelve-month reconciliation period. The measure would have the Public Utilities Commission ("Commission") maintain a publicly available database of facilities.

**POSITION:**

The Commission supports the concept of this bill, but believes the measure is premature given the Commission's ongoing evaluation of procurement methods. The following comments are offered for the Committee's consideration.

**COMMENTS:**

This bill mimics the NEM statutes under Chapter 269, Hawaii Revised Statutes, changing the "eligible customer-generator" to a "participant" who has an interest in a "community renewable energy facility." The Commission considers this measure to be a form of renewable energy procurement, and would be premature given the procurement evaluations being conducted by the Commission. As previously testified to

this Committee in a prior hearing,<sup>1</sup> the Commission was awarded a grant from the National Association of Regulatory Utility Commissioners to evaluate and identify improvements for Hawaii's various renewable energy procurement methods, including a review of NEM, Hawaii's feed-in tariff program ("FIT"), and the existing competitive bidding framework ("NARUC Grant"). This fully-funded review is scheduled to be completed by September of this year. The NARUC Grant review will examine and evaluate how various energy acquisition programs function independently and comprehensively in meeting Hawaii's clean energy mandates through the most efficient processes to 1) achieve the highest level of renewable energy penetration at the lowest cost, 2) ensure that all ratepayers can share in the benefits of clean energy, and 3) ensure and improve the reliability of the system. Therefore, the Commission believes Hawaii's existing renewable energy procurement programs must be fully evaluated first before creating a new Community-Based Renewable Energy Program.

The Commission's NARUC Grant Request for Qualifications, dated January 17, 2013, is attached here for the Committee's perusal.

Please also note that, should this measure be enacted, Commission staff time and other resources will have to be reallocated to carry out the requirements of a Hawaii Community-Based Renewable Energy Program, and this reallocation will detract from other priorities currently before the Commission.

Thank you for the opportunity to testify on this measure.

Attachment

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<sup>1</sup>Please see the Commission's submitted testimonies on H.B. No. 728, relating to net energy metering, and H.B. No. 1199, relating to Energy, both bills having been heard by this Committee, the House Committee on Energy & Environmental Protection, on Tuesday, February 5, 2013 at 8:30 a.m.



N A R U C  
National Association of Regulatory Utility Commissioners

## **Request for Qualifications, HAWAII January 17, 2013**

The National Association of Regulatory Utility Commissioners (NARUC) is in need of the services of an expert consultant or consultants to support the Hawaii Public Utilities Commission (“Commission”) as it seeks a review, evaluation, & recommendation for improvements to the current variety of renewable energy procurement (“REP”) methods used by electric utilities to procure utility-scale & customer-sited generation.

This request for qualifications (“RFQ”) invites consultants to submit their qualifications in order to be considered for performing this work under contract to NARUC. It is one of several RFQs being issued under NARUC’s Recovery Act-funded State Electricity Regulators’ Capacity Assistance and Training (“SERCAT”) program. (More information at [www.naruc.org/sercat](http://www.naruc.org/sercat)).

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### **Background**

Electricity generation in the State of Hawaii (“Hawaii” or “State”) is highly dependent on imported oil, and, consequently, the State has the highest average electricity rates in the country. Hawaii’s utilities are actively procuring renewable-sourced generation in an effort to meet aggressive Renewable Portfolio Standards (“RPS”) and to stabilize the high cost of electricity. As a result of these efforts, Hawaii is experiencing exponential growth in solar photovoltaic (“PV”) systems (cumulative solar PV additions of approximately 200 megawatts (“MW”) installed) and significant wind resource additions (over 200 MW installed) on a collective statewide grid just 1,600 MW in size. These progressive policies have resulted in the State’s electric utilities, under the oversight of the Commission, employing a wide variety of renewable energy procurement (“REP”) methods and programs to achieve state-mandated requirements. The Commission now seeks assistance to complete a full, comprehensive review of the effectiveness of existing procurement methods. This review will consider the effectiveness of existing programs in terms of purchased power costs, progress toward meeting renewable energy goals, administrative costs and ease of process, and fairness and equity across ratepayer classes.

Specifically, the Commission seeks the assistance of a consultant(s) to review, evaluate, and recommend improvements to the current variety of REP methods used by the State’s electric utilities to procure utility-scale and customer-sited generation (“Project”). These utility-scale mechanisms include a feed-in tariff (“FIT”) program, acquisitions under a Commission-established competitive bidding framework, and bilateral negotiations between independent power producers (“IPP”) and the utilities. Customer-sited renewable energy programs include net energy metering (“NEM”), standard interconnection agreements, and the “Schedule Q” tariff that pays for customer-sited generation based on avoided costs. The consultant(s), having expertise in REP and standard regulatory practices, will assist the Commission in determining the overall effectiveness of the above mentioned procurement methods.

The REP programs identified have all been quickly and almost simultaneously deployed, and the Commission believes now is the right time to evaluate the general effectiveness of these methods

and programs both individually and in concert. Hawaii's customer-side renewable energy procurement mechanisms have been in operation for several years without yet having comprehensive program effectiveness reviews performed. Utility-scale procurement programs have likewise been developing and operating in varying degrees, and now programs like FIT have reached a point where the Commission believes comprehensive review and evaluation is necessary to move the program forward. Additionally, renewable energy procurement projects in the State under a Commission-created competitive bidding framework have begun to significantly increase in terms of both proposed project size and the frequency of applications.<sup>1</sup>

### **Funding**

Up to \$72,800 is available for the consultant or consultants to support this effort.

### **Deliverables**

This project is envisioned as being a two-phase process. Phase 1 involves the research, review, evaluation, and recommendation steps discussed in the Background section above. The selected consultant(s) would examine the effectiveness of current Hawaii REP methods and programs both individually and collectively, evaluate such methods and programs in relation to similar mechanisms in other jurisdictions, and offer recommendations based on consultant(s) evaluation. In the anticipated Phase 2 of this Project, the consultant or consultants performing the initial review and evaluation will further assist the Commission in an advisory capacity in related proceedings to amend, revoke, or create new procurement methods as a result of the deliverable (i.e. Commission proceedings to examine the existing FIT or NEM programs).

The intended deliverables are an Interim Report during the research/evaluation process and Final Report at the conclusion of Phase 1 including all findings and recommendations from the review and evaluation of Hawaii's REP methods and programs. The submitted reports should include on an interim or final basis, where applicable, 1) a review of existing Hawaii procurement mechanisms, 2) a survey and description of similar programs implemented in different states, 3) an evaluation of the effectiveness of the reviewed procurement mechanisms, and 4) recommendations for improving the effectiveness of the reviewed procurement mechanisms. In addition, the report should include a summation of lessons learned from the State's various renewable energy procurement methods and programs, as well as a comparative matrix of the effectiveness of the various renewable energy procurement methods being reviewed and evaluated. In the course of completing the required report, the consultant(s) will likely need to conduct interviews and meetings with the Commission.

Phase 2 deliverables will be determined through discussions with the Commission and the potential consultant(s), although this will require consultant(s) to advise and report to the Commission on the progress of implementing the Phase 1-generated recommendations in the course of Commission proceedings. Again, the contracting, funding, and performance of Phase 2 are expected to be outside the scope of this grant process.

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<sup>1</sup> Included among the utility-initiated requests for proposals ("RFP") for renewable energy generation capacity currently before the Commission is a RFP for 200MW of as-available intermittent renewable energy generation for delivery to the island of Oahu under Commission Docket No. 2011-0225, and an RFP for 50MW of electricity generated from geothermal energy resources for use by Hawaii Electric Light Company under Commission Docket No. 2012-0092.

### **Period of performance**

Selected consultants will be interviewed by NARUC and the Commission by telephone, and a selection is anticipated by February 2012. The proposed consultant work would be performed between February 2013 and September 15, 2013.

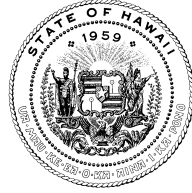
### **Responding with your qualifications**

Please send an email that includes a letter of your interest in being considered for this activity, with a project brief. This brief should identify staff who would be assigned, outline rates and estimate involvement (in total hours) for each individual proposed, include individual curriculum vitae for these individuals, and provide corporate qualifications (or links to relevant efforts) for your organization. Please provide these electronically to Miles Keogh and Ivy Wheeler at [mkeogh@naruc.org](mailto:mkeogh@naruc.org) and [iwheeler@naruc.org](mailto:iwheeler@naruc.org) by COB February 14, 2013. Consultant qualifications should demonstrate that they are able to perform the tasks described above. Further consultant selection will occur via teleconference with NARUC and the Commission Staff.

Questions should also be addressed to Miles and Ivy at the email addresses above.

Acknowledgment: "This material is based upon work supported by the Department of Energy under Award Number(s) DE-OE0000123."

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**TO THE HOUSE COMMITTEE  
ON ENERGY AND ENVIRONMENTAL PROTECTION**

**THE TWENTY-SEVENTH LEGISLATURE  
REGULAR SESSION OF 2013**

**THURSDAY, FEBRUARY 7, 2013  
9:00 A.M.**

**TESTIMONY OF JEFFREY T. ONO, EXECUTIVE DIRECTOR, DIVISION OF  
CONSUMER ADVOCACY, DEPARTMENT OF COMMERCE AND CONSUMER  
AFFAIRS, TO THE HONORABLE CHRIS LEE, CHAIR,  
AND MEMBERS OF THE COMMITTEE**

**HOUSE BILL NO. 1363 - RELATING TO COMMUNITY-BASED  
RENEWABLE ENERGY**

**DESCRIPTION:**

This measure proposes to establish the Hawaii community-based renewable energy program. Enables utility customers to participate in a community-based renewable energy facility and benefit from the electricity generated from such a facility. Effective July 1, 2013.

**POSITION:**

The Division of Consumer Advocacy (Consumer Advocate) supports this bill and offers the following comments.

COMMENTS:

Thus far, distributed renewable energy systems, such as solar photovoltaic (“pv”) systems, have been available to only those who can afford the significant up front cash payment that is required for system installation. A large segment of Hawaii’s population has been locked out of this market for a number of reasons, including economic, living in multi-family dwellings, significant shading over their rooftops, and rooftop construction that does not allow for solar pv installation. A properly designed community-based renewable energy program has the potential to provide significant energy cost-savings to this under-served market. It also opens up access to affordable renewable energy to schools and community organizations that might otherwise be unable to participate in renewable energy self-generation programs.

On the other hand, the Consumer Advocate is concerned with the potential bill impact a community-based renewable energy program would have on non-participating ratepayers. Furthermore, this bill needs to insure adequate protection to participants of the program. The Consumer Advocate is willing to work with interested stake-holders and this committee to modify this bill to include additional protections to participants and non-participant consumers.

The following are the Consumer Advocate’s concerns and recommendations with respect to this bill:

- (1) There should be a provision that specifically limits the billing credits to be applied to electricity generation only;
- (2) As part of the pre-amble, there should be a statement that indicates the Legislature’s intent that the Public Utilities Commission (“PUC”) make every effort to minimize the rate impact the program would have on non-participating consumers;
- (3) There should be a provision that allows the PUC to revise and modify the bill credit mechanism at any time if the PUC concludes that program participants are not receiving fair value and other benefits from the renewable energy facility;
- (4) The PUC should be required to establish a facility rate for each community renewable energy facility;
- (5) There should be included a provision that authorizes the PUC to enforce the disclosures required in proposed section 269H;
- (6) The bill should make it clear that these projects will count toward the electric utility achieving the Renewable Portfolio Standard goals;

- (7) The PUC should be given authority to fully investigate any aspect of this program; and
- (8) The Legislature should consider authorizing the PUC to roll this program out on a pilot or trial basis.

Thank you for this opportunity to testify.





**DEPARTMENT OF BUSINESS,  
ECONOMIC DEVELOPMENT & TOURISM**

**NEIL ABERCROMBIE**  
GOVERNOR

**RICHARD C. LIM**  
DIRECTOR

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Statement of  
**RICHARD C. LIM**  
**Director**  
Department of Business, Economic Development, and Tourism  
before the  
**HOUSE COMMITTEE ON ENERGY AND ENVIRONMENTAL PROTECTION**

Thursday, February 7, 2013  
9:00 AM  
State Capitol, Conference Room 325

in consideration of  
**HB 1363**  
**RELATING TO COMMUNITY-BASED RENEWABLE ENERGY.**

Chair Lee, Vice Chair Thielen, and Members of the Committee.

The Department of Business, Economic Development, and Tourism (DBEDT) supports the intent of HB 1363, which would establish the Hawaii community-based renewable energy program.

The concept has merit, with the National Renewable Energy Laboratory reporting that such a program could provide for improved economies of scale, optimal project siting, and increased public understanding of renewable energy. This is consistent with the State's clean energy objectives calling for greater adoption of renewable energy.

We respectfully defer to the Public Utilities Commission for comment on any regulatory issues that would need to be carefully considered under this bill.

Thank you for the opportunity to offer these comments on HB 1363.

**Testimony Before the  
House Committee on Energy & Environmental Protection**

**HB 1363 – RELATING TO COMMUNITY-BASED RENEWABLE ENERGY**

**Thursday, February 7, 2013  
9:00 AM, Conference Room 325**

**By Darren Ishimura  
Director, Distributed Technology Applications  
Hawaiian Electric Company, Inc.**

Chair Lee, Vice Chair Thielen, and Members of the Committee:

My name is Darren Ishimura, and I represent Hawaiian Electric Company, and its subsidiary utilities Hawaii Electric Light Company, and Maui Electric Company (collectively the Companies). I appreciate the opportunity to present testimony on HB 1363.

While the Companies support the intent to lower electricity bills for people who are unable to install photovoltaics (PV) at their premise, we oppose HB 1363 for the following reasons:

- Our net energy metering (NEM) program is among the most successful in the country, but this measure would result in additional administrative costs and encourage oversizing of PV systems, which could have unintended consequences affecting grid reliability.
- The proposed program relies on “participant organizations” to sign up customers and to provide the Companies with information to determine bill credits to participating customers’ accounts. This reliance on outside parties adds complexity and potential for conflicts and disputes over bill credits and customer expectations of the value of their investments under the proposed program.
- This bill would increase the rates to our customers because the utility is not compensated for the use of the utilities’ facilities to transport electricity from one site to another by the few customers that are able to participate in this program.
- Moreover, the Companies may be able to acquire renewable energy at a lower cost through feed-in tariff (FIT) and power purchase agreements (PPA) in which all the utilities’ customers benefit.

Thus we ask the committee to hold this bill.

Thank you for the opportunity to testify.

February 7, 2013



**HOUSE COMMITTEE ON ENERGY & ENVIRONMENTAL PROTECTION**

February 7, 2013, 9:00 A.M.

Room 325

**(Testimony is 7 pages long)**

**TESTIMONY IN STRONG SUPPORT OF HB 1363**

Chair Lee and members of the Energy & Environmental Protection Committee:

The Blue Planet Foundation strongly supports HB 1363, establishing a community-based renewable energy program to expand the number of Hawaii residents who can participate in the benefits of clean energy. This measure would allow residents to invest in and benefit from solar and wind energy systems—even if those systems are not sited on their property.

House Bill 728 makes renewable energy accessible for many Hawai'i residents, businesses, and agencies who cannot currently take advantage of energy cost savings available from solutions like rooftop solar photovoltaic energy. Community-based renewable energy boosts private investment in our green energy infrastructure while it maximizes the flexibility of our clean energy solutions. In doing so, it benefits all Hawai'i residents by reducing the amount of money we send out of the state to pay for imported fossil fuels.

**Our current system leaves many Hawaii households, businesses, and public agencies unable to participate in renewable energy cost savings**

Many homeowners have been able to use solar power and other technologies to break free from energy costs being driven upward by fossil fuels. Unfortunately, many individuals and households are currently unable to directly participate in renewable energy because of their location, building type, access to the electric utility grid, or other impediments. For example, (a) it may be difficult for a single condominium owner to install solar panels, without a wider installation on behalf of the entire condominium; (b) it may be difficult for homeowners with shaded roofs to harness as much of the sun's energy as their neighbors; or (c) a homeowner may find that the utility is limiting the amount of energy from the homeowner's particular circuit. All of these situations can be addressed with community-based renewable energy.

## Community-based renewable energy unlocks renewable energy solutions, improves our economy, and benefits our electrical grid

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Community-based renewable energy allows residents to join together to find energy solutions. For example, several condominium owners in different buildings may collectively install solar panels in another location with spare rooftop capacity. Even larger communities can join together to install renewable energy in ways that are most effective and efficient for their particular community. Or public agencies, such as schools, colleges, universities, and local governments will have more flexibility to access renewable energy across their systems. The cost savings can benefit important educational programs, social services, and new hiring.

Community-based renewable energy can also help make our energy system more robust, by evening out the distribution of renewable energy on the grid. For example, homeowners on a crowded circuit can install solar panels on another circuit, and receive the credit against their energy bill. By promoting renewable energy on under-utilized circuits, it can help the utility to operate our electrical system more effectively and efficiently. In addition to these benefits, group net metering creates new construction jobs, stimulates the economy, reduces emissions of greenhouse gases, promotes energy independence, and will assist in meeting the state's clean energy goals.

## Community-based renewable energy is spreading across the country—don't let Hawaii fall behind

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Community-based renewable energy is an innovative solution that is already happening in other states, such as California, Colorado, Massachusetts, Washington, Maryland, and Maine.<sup>1</sup> There is no reason Hawaii shouldn't enable its residents to do the same thing.

For all of these reasons, it is in the public interest to promote this type of broader participation in self-generation by Hawaii residents, public agencies, and businesses. For wealthy homeowners with large roofs, solar electricity is a no-brainer. But for most residents, solar power is simply out of reach. The policy proposed in HB 1363 brings some social equality to our clean energy policy. Everyone should be able to participate in Hawai'i's clean energy future.

We respectfully request that HB 1363 be forwarded for further consideration. Thank you for the opportunity to testify.

*The following pages contain an "FAQ" on community-based renewable energy and a 4-page brief reviewing some case studies of successful community-based renewable energy programs.*

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<sup>1</sup> The U.S. Dep't of Energy's National Renewable Energy Laboratory has reported on elements of these programs, <http://www.nrel.gov/docs/fy11osti/49930.pdf>.

## Community-based renewable energy FAQ

### ***Q: Why is community-based renewable energy necessary?***

A: While solar has been an incredible success story in Hawaii, the majority of residents simply cannot directly participate in renewable energy because of their lack of access to a suitable rooftop for solar, such as many of the 40% of residents who live in multi-unit housing such as condos, or those whose roofs are shaded or otherwise incapable of supporting solar. Community-based renewable energy allows residents to invest in and benefit from solar and wind energy systems—even if those systems weren't directly on their property. It's a matter of fairness and equality. Everyone should be able to participate in Hawaii's clean energy future, not just those fortunate enough to have a big roof over their heads.

### ***Q: What are the benefits of community-based renewable energy?***

Aside from making Hawaii's clean energy policies more equitable, community-based renewable energy can bring real economic value to those who need it the most. Under California's Multifamily Affordable Solar Housing program (established in 2008, now with 7 MW installed, and 13 MW signed up), community based renewable energy is estimated to save low income households 30% on their electric bills.

### ***Q: Is anyone else doing community-based renewable energy?***

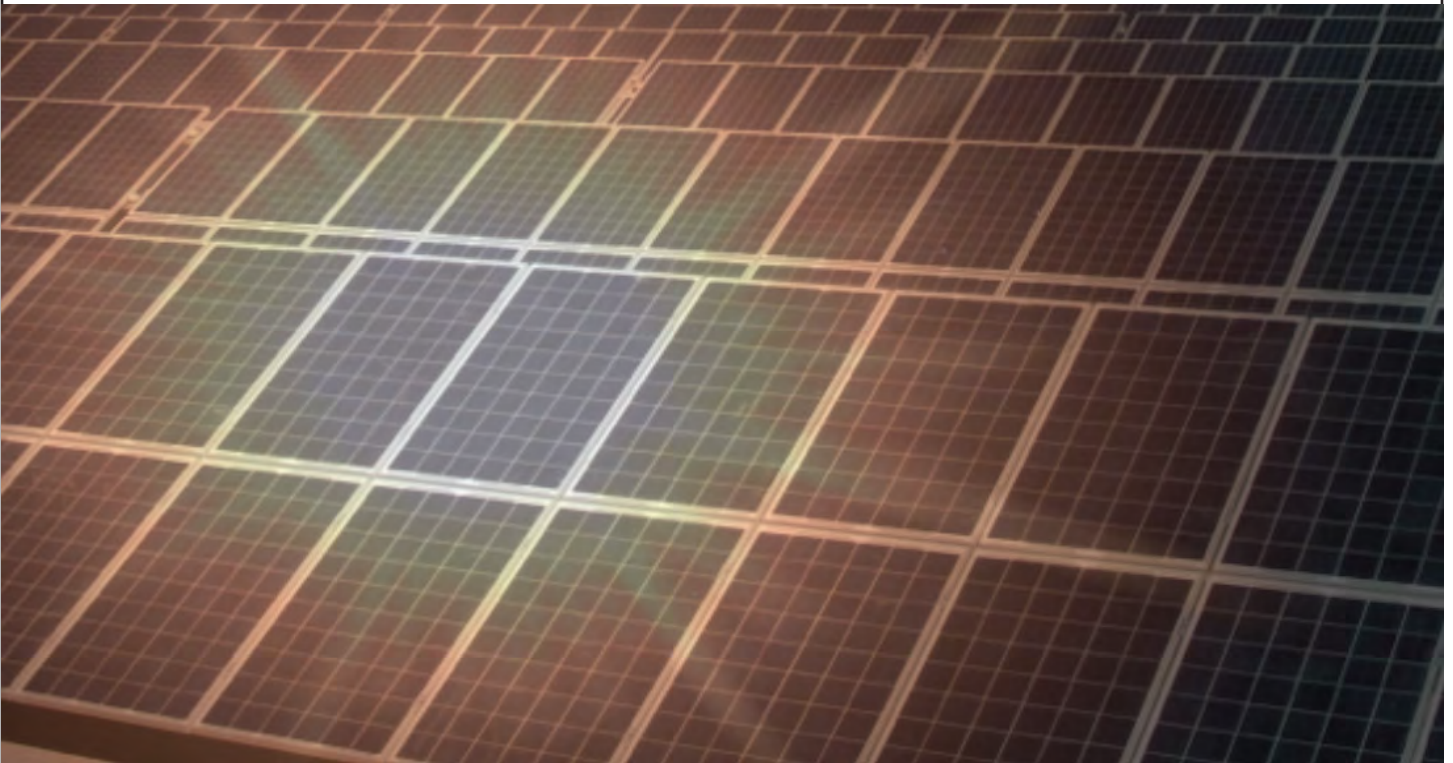
A: Yes, as of November 2010, utilities, public utility commissions, and communities in California, Florida, Arizona, Utah, Colorado, Washington, Vermont, Massachusetts, Maryland, and Maine had all taken steps to adopt innovative community based renewable energy programs. According to a report by the U.S. Dep't of Energy National Renewable Energy Laboratory (NREL), the Interstate Renewable Energy Council (IREC) examined "the various community solar approaches that have been implemented thus far," to develop "model" rules for community based renewable energy programs. These model rules could be used to develop a program for Hawaii.

### ***Q: Aren't there other approaches to solve the same problem of lack of access to renewable energy?***

A: Yes, there are, such as a utility-sponsored "green pricing" program. But this is not available in Hawaii and there are no current plans to make such a program available. Moreover, a community-based renewable energy program would empower residents to take control of their energy situation with their own resources, leveraging the efficiency of efficiency of the market.

# **COMMUNITY-SHARED SOLAR**

## **DIVERSE APPROACHES FOR A COMMON GOAL**



Community-shared solar gives energy consumers who may not be able to or want to install on-site renewable generation the opportunity to enjoy the benefits of solar generation. These three short case studies are intended to offer a glimpse at three different utilities' approaches to offering community solar to their customers. We look at an investor-owned utility, a municipal utility and a cooperative utility to get a sense of the variety of ways to provide energy consumers the chance to participate in solar generation.

**December 2012**

## Tucson Electric Power: Bright Tucson Community Solar Program



One of Bright Tucson's community solar arrays. Photo courtesy of TEP.

### Program Summary

<b>Program Type</b>	Investor-owned utility
<b>Program Location</b>	Tucson, AZ
<b>Program Size</b>	Currently 4.13 MW
<b>Participation</b>	777 customers (as of July 2012)
<b>Generation ownership</b>	TEP and third-party developers
<b>Eligible Participants</b>	All customers except those currently enrolled in net metering
<b>Participant Buy-in</b>	Purchase 150-kWh monthly blocks for a surcharge of \$3/block/month
<b>Participation Term</b>	20 years, though customers may choose to drop out earlier
<b>Web Site</b>	<a href="https://www.tep.com/Renewable/Home/Bright">https://www.tep.com/Renewable/Home/Bright</a>
<b>Contact</b>	Marc Romito, <a href="mailto:mromito@tep.com">mromito@tep.com</a>




Tucson Electric Power (TEP), an investor-owned utility in Arizona, offers community-shared solar power to their customers. Through TEP's Bright Tucson Community Solar program, customers can purchase output from a TEP- or third-party-owned solar facility in 150-kilowatt-hour (kWh) monthly blocks, each for a fixed \$3 per month. In other words, each block purchased by a customer will add \$3 to their monthly electric bill. However, program blocks are exempt from future rate increases on the energy portion of the bill and two surcharges applied to other electric usage, the Renewable Energy Standard Tariff (REST) and the Purchased Power and Fuel Adjustment Clause (PPFAC), so the actual cost impact on the customer may be lower.

Blocks of solar energy purchased through the program are associated with a specific TEP service address and cannot be transferred if the customer moves. If program blocks are still available, however, the customer can subscribe to the program again at their new TEP service address. Customers may stop participating at any time and not incur a penalty.

The TEP program was launched in March of 2011, with an initial goal to develop 1.6 megawatts (MW) of new TEP-owned solar generating capacity over the following three years. The program has been much more successful than originally planned. As of July 2012, the TEP Bright Tucson program included 777 customers, which were subscribed to a total of 4.13 MW in TEP- or third-party-owned solar installations. These Bright Tucson blocks produce a total of 619,950 kWh per month.

# Colorado Springs Utilities: Community Solar Gardens Program

## Program Summary

<b>Program Type</b>	Municipal utility	
<b>Program Location</b>	Colorado Springs, CO	
<b>Program Size</b>	2 MW (for pilot)	
<b>Participation</b>	289 participants (as of October 2012)	
<b>Generation ownership</b>	Third-party developers	
<b>Eligible Participants</b>	All residential customers and educational facilities	
<b>Participant Buy-in</b>	Panels may be leased or purchased at varying rates, depending on the project	
<b>Participation Term</b>	20 years	
<b>Allocation of Benefits</b>	By bill credit, fixed at \$0.09/kWh	
<b>Web Site</b>	<a href="http://www.csu.org/residential/customer/Pages/Community-Solar-Gardens.aspx">www.csu.org/residential/customer/Pages/Community-Solar-Gardens.aspx</a>	
<b>Contact</b>	Rich Swope, 719-668-5760, <a href="mailto:rswope@csu.org">rswope@csu.org</a>	

In 2010, the Colorado Springs, Colorado City Council voted to allow its municipal utility, Colorado Springs Utilities (Springs Utilities), to offer community solar gardens to utility customers. Currently, through the solar garden projects, Springs Utilities customers may lease panels from one of two community solar project developers, Sunshare (<http://mysunshare.com>) or Clean Energy Collective ([www.easycleanenergy.com](http://www.easycleanenergy.com)). A customer must have a minimum solar garden interest of 0.4 kW. Subscribing customers receive a fixed credit of \$0.09/kWh on their electric bill for their share of the power generated by the panels they lease. In 2012, Springs Utilities is providing subscribers a one-time, \$1.80 per watt incentive up to 30 percent of their solar garden investment. Incentives are paid on a first-come, first-served basis and subject to availability of funding.

As of October 2012, Springs Utilities had 288 residential customers and one educational customer already participating in its program (with 538 panels purchased). In addition, Springs Utilities has a number of applicants to the program awaiting review and approval, including 51 residential customers and three educational customers (one with 250 panels and two with 925 panels).

Existing Solar Garden Participation – Residential (October 2012)						
	Number of Panels					
	2 to 10	11 to 20	21 to 30	31 to 40	41 to 50	51 to 60
Number of Customers	237	32	16	2	1	0
Weighted Average Number of Panels	4.1	15.6	24.4	35	48	0
Number of Customers (proposed)	41	7	1	1	0	1
Weighted Average Number of Panels (proposed)	4.2	17.1	28	32	0	55



# Florida Keys Electric Cooperative: Simple Solar Program

## Program Summary

<b>Program Type</b>	Cooperative utility
<b>Program Location</b>	Upper and Middle Florida Keys, FL
<b>Program Size</b>	117.6 kW (2 arrays)
<b>Participation</b>	10 members (as of November 2012)
<b>Generation ownership</b>	FKEC
<b>Eligible Participants</b>	All members
<b>Participant Buy-in</b>	Lease panels at \$999/panel
<b>Participation Term</b>	25 years
<b>Allocation of Benefits</b>	By bill credit at full retail rate
<b>Web Site</b>	<a href="http://www.fkec.com/Green/simplesolar.cfm">http://www.fkec.com/Green/simplesolar.cfm</a>
<b>Contact</b>	TJ Patterson, 800-858-8845 x 127, <a href="mailto:tj.patterson@fkec.com">tj.patterson@fkec.com</a>



In 2008, the Florida Keys Electric Cooperative (FKEC) opened the Simple Solar community solar program to its members in the middle keys. The Simple Solar Program was designed for FKEC members who support alternative energy but do not want to undertake designing, permitting, building, maintaining and insuring their own residential solar arrays. FKEC members can lease panels in one of two FKEC PV community solar arrays—the 96.6-kW Marathon Array (552 panels) and the 21-kW Crawl Key Array (120 panels). In return for leasing one or more panels for \$999 each, members receive monthly bill credits for the full retail value of the electricity generated by their leased panel(s) for 25 years. FKEC estimated that each 175-watt panel would generate approximately \$36 in bill credits in the initial year. Assuming a three-percent annual increase in the retail price of electricity, the \$999 investment per panel would return an estimated \$1,280 in total credits.

FKEC currently has 10 participants leasing 11 panels through the Simple Solar program. The remaining electricity generated by the arrays is fed into the grid and supplements energy FKEC provides for its members. The two arrays jointly provide enough generation to power about 20-25 houses per year. FKEC retains ownership of the Renewable Energy Credits (RECs) produced by the system.

An interesting outcome of the program has been FKEC's rebate program that resulted from its Simple Solar program. In return for installing its community solar arrays, FKEC received a rebate from the state of Florida in the amount of \$43,000. FKEC then turned around and used the entire state rebate to create an incentive program that is designed to spur residential energy improvements for its members. As of May 2012, FKEC members can receive a maximum rebate of \$1,000 for energy improvements to their homes. The co-op has given out 162 energy improvement rebates as of November 2012.



FKEC's Marathon Array (left) and Crawl Key Array (above).  
Photos courtesy of FKEC.



# Sierra Club Hawai'i Chapter

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## HOUSE COMMITTEE ON ENERGY & ENVIRONMENTAL PROTECTION

February 7, 2013, 9:00 A.M.  
(Testimony is 1 page long)

### TESTIMONY IN SUPPORT OF HB 1363

Aloha Chair Lee and Members of the Committee:

The Sierra Club, Hawaii Chapter, with over 10,000 dues paying members and supporters statewide, respectfully *supports* HB 1363. This measure creates a community solar program.

Programs similar to what is proposed have been very successful in encouraging the adoption of PV and hastening the transition to non-fossil sources. This measure potentially allows a *hui* of people to invest in renewable energy and take advantage of the benefits, even if they do not own a home.

This measure would provide a strong incentive for individuals and businesses to invest in the powerplants of tomorrow (today).

Mahalo for the opportunity to testify.

**thielen3 - Charles**

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**From:** mailinglist@capitol.hawaii.gov  
**Sent:** Tuesday, February 05, 2013 9:27 AM  
**To:** EEPtestimony  
**Cc:** mendezj@hawaii.edu  
**Subject:** \*Submitted testimony for HB1363 on Feb 7, 2013 09:00AM\*

**HB1363**

Submitted on: 2/5/2013

Testimony for EEP on Feb 7, 2013 09:00AM in Conference Room 325

<b>Submitted By</b>	<b>Organization</b>	<b>Testifier Position</b>	<b>Present at Hearing</b>
Javier Mendez-Alvarez	Individual	Support	No

Comments:

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