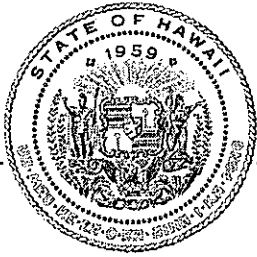


**SB 631**



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

NEIL ABERCROMBIE  
GOVERNOR

RICHARD C. LIM  
INTERIM DIRECTOR

No. 1 Capitol District Building, 250 South Hotel Street, 5th Floor, Honolulu, Hawaii 96813  
Mailing Address: P.O. Box 2359, Honolulu, Hawaii 96804  
Web site: [www.hawaii.gov/dbedt](http://www.hawaii.gov/dbedt)

Telephone: (808) 586-2355  
Fax: (808) 586-2377

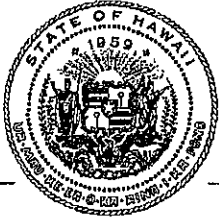
Statement of  
**RICHARD C. LIM**  
**Interim Director**  
Department of Business, Economic Development, and Tourism  
before the  
**SENATE COMMITTEES ON ENERGY AND ENVIRONMENT,  
AGRICULTURE, AND WATER, LAND, & HOUSING**  
Thursday, February 24, 2011  
3:20 PM  
State Capitol, Conference Room 225

in consideration of  
**SB 631**  
**RELATING TO RENEWABLE ENERGY.**

Chair Gabbard, Chair Nishihara, Chair Dela Cruz, Vice Chair English, Vice Chair Kahele, Vice Chair Solomon, and Members of the Committees.

The Department of Business, Economic Development, and Tourism (DBEDT) supports SB631. The bill expands the permitted use of renewable energy on agricultural land, which accounts for roughly 47 percent of the land in the state. Expanding the permitted use of renewable energy on agricultural land helps to ensure we will reach the renewable portfolio standard target of 40 percent renewable generation by 2030.

Thank you for the opportunity to provide these comments.



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

NEIL ABERCROMBIE  
GOVERNOR  
RICHARD C. LIM  
INTERIM DIRECTOR  
MARY LOU KOBAYASHI  
PLANNING PROGRAM ADMINISTRATOR  
OFFICE OF PLANNING

**OFFICE OF PLANNING**

235 South Beretania Street, 8th Floor, Honolulu, Hawaii 96813  
Mailing Address: P.O. Box 2359, Honolulu, Hawaii 96804

Telephone: (808) 587-2846  
Fax: (808) 587-2824

Statement of  
**MARY LOU KOBAYASHI**  
Planning Program Administrator, Office of Planning  
Department of Business, Economic Development, and Tourism  
before the  
**SENATE COMMITTEE ON ENERGY AND ENVIRONMENT,  
SENATE COMMITTEE ON AGRICULTURE,  
AND  
SENATE COMMITTEE ON WATER, LAND, AND HOUSING**  
Thursday, February 24, 2011  
3:20 PM  
State Capitol, Conference Room 225

in consideration of  
**SB 631  
RELATING TO RENEWABLE ENERGY.**

Chairs Gabbard, Nishihara and Dela Cruz, Vice Chairs English, Kahele and Solomon, and Members of the Senate Committees on Energy and Environment, Agriculture, and Water, Land, and Housing.

SB 631 proposes to remove the current limitations on location, size, and linkage with agricultural activities of solar energy facilities in the State Agricultural District by amending Chapter 205-2(d)(6), HRS and §205-4.5(16) HRS.

Wind machines and wind farms are already allowed as permitted uses in all productivity rating categories in the State Agricultural District without limitation. When wind energy machines were added as permitted uses, it was argued that wind machines have a small foot print which would not preclude high productivity land from being farmed.

The Office of Planning is opposed to expanding unlimited solar energy facilities to “B” and “C” rated lands because these quality agricultural lands are needed to improve food security and self-sufficiency for Hawaii. They may also be used for growing bio-fuel crops which contribute to renewable energy self-sufficiency, but don’t permanently prevent future food production. “D” and “E” rated lands comprise over 87% of lands in the State Agricultural District. The Office of Planning believes that the 3.3 million acres in “D” and “E”, out of the total 3.8 million acres in the State Agricultural District, offer sufficient lands for solar energy facilities. See attached table from the State GIS Program detailing the Land Study Bureau Rating Acreages by Island.

Thank you for the opportunity to offer these comments.

Land Study Bureau Ratings  
Acreage By Island

LSB TYPE	Hawaii Acres	Kauai Acres	Lanai Acres	Maui Acres	Molokai Acres	Oahu Acres	Total Acres
A	0	9,577	0	32,190	703	16,031	58,500
B	46,430	27,135	0	18,670	0	25,854	118,089
C	214,395	26,229	4,471	36,629	3,930	14,958	300,612
D	570,834	29,220	20,532	95,543	42,036	10,561	768,726
E	<u>1,698,303</u>	<u>246,638</u>	<u>62,226</u>	<u>261,774</u>	<u>117,471</u>	<u>208,602</u>	<u>2,595,013</u>
	2,529,962	338,797	87,228	444,807	164,140	276,005	3,840,941

See also:

[http://hawaii.gov/dbedt/gis/lb\\_note.htm](http://hawaii.gov/dbedt/gis/lb_note.htm)

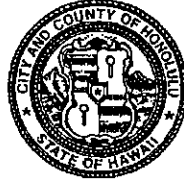
<http://hawaii.gov/dbedt/gis/data/lb.pdf>

Percentages	Hawaii	Kauai	Lanai	Maui	Molokai	Oahu	Statewide
% A & B of total	1.84	10.84	0.00	11.43	0.43	15.18	4.60
% A, B, C of total	10.31	18.58	5.13	19.67	2.82	20.59	12.42

DEPARTMENT OF PLANNING AND PERMITTING  
**CITY AND COUNTY OF HONOLULU**

650 SOUTH KING STREET, 7<sup>TH</sup> FLOOR • HONOLULU, HAWAII 96813  
PHONE: (808) 768-8000 • FAX: (808) 768-6041  
DEPT. WEB SITE: [www.honoluluodpp.org](http://www.honoluluodpp.org) • CITY WEB SITE: [www.honolulu.gov](http://www.honolulu.gov)

PETER B. CARLISLE  
MAYOR



DAVID K. TANOUE  
DIRECTOR

JIRO A. SUMADA  
DEPUTY DIRECTOR

February 24, 2011

The Honorable Senator Mike Gabbard, Chair  
and Members of the Committee on Energy and Environment  
The Honorable Senator Clarence K. Nishihara, Chair  
and Members of the Committee on Agriculture  
The Honorable Donovan M. Dela Cruz, Chair  
and Members of the Committee on Water, Land, and Housing  
State Senate  
State Capitol  
Honolulu, Hawaii 96813

Dear Chairs Gabbard, Nishihara, Dela Cruz, and Members:

**Subject: Senate Bill No. 631  
Relating to Renewable Energy**

The Department of Planning and Permitting (DPP) **supports with modifications** Senate Bill No. 631. This bill would allow renewable solar and agriculture energy facilities on state agricultural lands without restriction. We request that these facilities be limited to lands designated by the Land Study Bureau Master Productivity rating of "C", "D", "E", or "U", and any lands that are **not** designated as "Important Agricultural Lands" pursuant to Section 205, Part III, Hawaii Revised Statutes.

We are concerned that the availability of quality agricultural lands could be significantly reduced should successful renewable energy facilities proliferate on agricultural lands. Large-scale photovoltaic arrays (solar panels) have the potential to consume large areas of high quality agricultural lands and compete with the same lands needed for food production.

Please pass Senate Bill No. 631 with the above suggested modification. Thank you for the opportunity to testify.

Very truly yours,

  
David K. Tanoue, Director  
Department of Planning and Permitting

DKT: jmf  
sb631-RenewEne-ks.doc



**TESTIMONY OF  
THE DEPARTMENT OF THE ATTORNEY GENERAL  
TWENTY-SIXTH LEGISLATURE, 2011**

---

**ON THE FOLLOWING MEASURE:  
S.B. NO. 0631, RELATING TO RENEWABLE ENERGY.**

**BEFORE THE:**

SENATE COMMITTEES ON ENERGY AND ENVIRONMENT, AGRICULTURE, AND  
WATER, LAND, AND HOUSING

**DATE:** Thursday, February 24, 2011      **TIME:** 3:20 p.m.

**LOCATION:** State Capitol, Room 225

**TESTIFIER(S):** David M. Louie, Attorney General, or  
Bryan C. Yee, Deputy Attorney General

---

Chairs Gabbard, Nishihara, and Dela Cruz and Members of the  
Committees:

The Attorney General provides the following technical  
comments for your consideration.

Section 205-4.5(a), Hawaii Revised Statutes (HRS), sets  
forth the permissible uses of agricultural lands with an overall  
productivity rating class of A or B. Section 3 of this bill  
proposes to amend section 205-4.5(a), HRS, to expand the term  
"agricultural-energy facilities" to include any facility that  
"generates, stores, or distributes renewable energy as defined  
in section 269-91 or renewable fuel including electrical or  
thermal energy or liquid or gaseous fuels." Section 269-91,  
HRS, defines "renewable energy" as energy generated or produced  
using various sources, including, among other things, wind and  
biofuels. So, an "agricultural-energy facility" includes wind  
and biofuel facilities.

Wind and biofuel facilities are already among the  
permissible uses in section 205-4.5(a), HRS. In expanding the  
definition of "agricultural-energy facilities," therefore, this  
bill creates an ambiguity with respect to these two categories

of permissible uses. Section 205-4.5(14) and (15), HRS, imposes conditions on wind and biofuel facilities. The proposed bill sets forth no restrictions on agricultural-energy facilities which include wind and biofuel facilities. The bill is ambiguous, therefore, as to whether the restrictions on wind and biofuel facilities will continue to apply if this measure is signed into law.

If the Legislature intends to remove the restrictions currently imposed for wind and biofuel facilities, then it should delete section 205-4.5(a)(14) (wind energy) and section 205-4.5(a)(15) (biofuel). If the legislature intends to maintain these restrictions, then it should change the definition of "agricultural-energy facility." In either case, however, the Legislature should take some action to avoid the ambiguity.

We respectfully submit this information to the committees for their consideration.





**SB631**  
**RELATING TO RENEWABLE ENERGY**  
Senate Committee on Energy and Environment  
Senate Committee on Agriculture  
Senate Committee on Water, Land, and Housing

February 24, 2011

3:20 p.m.

Room 225

The Office of Hawaiian Affairs (OHA) offers the following **COMMENTS** on SB 631. This bill has the potential to dramatically alter the use of agricultural lands in Hawai'i by allowing for solar energy facilities on lands with high capacity for intensive cultivation (lands with overall productivity rating of B or C) and agricultural-energy facilities which are not required to have a connection to agriculture.

OHA appreciates and understands the need for increased access to renewable energy infrastructure and particularly the need for sustainable access to energy for farmers participating in authentic agricultural activities. OHA notes however, in establishing agricultural districts, HRS § 205-2 provides that "the greatest possible protection shall be given to those lands with a high capacity for intensive cultivation." Permitting solar energy facilities on lands with overall productivity rating of B or C may remove lands with high capacity for intensive cultivation from future agricultural activities.

Additionally, as of 2008, HRS § 205-4.5 allows for agricultural-energy facilities on agricultural lands where the primary activity is related to cultivation of crops (including bioenergy, flowers, vegetables, foliage, fruits, forage, and timber crops) or raising of livestock (including poultry, bees, fish, or other animal or aquatic life). Only two years ago, this amendment considerably broadened permissible uses within agricultural districts. SB 631 would further expand permissible uses within agricultural districts by allowing energy facilities on agricultural lands without a connection to agriculture. This could have significant implications for lands with a high capacity for intensive cultivation and adjacent landowners and residents.

Mahalo nui loa for allowing us to provide testimony.



100 Kalia Avenue  
Milwaukee, Hawaii 96760-2997  
Phone: (808) 434-4444  
Milwaukee, Hawaii 96760-2997  
Chicago: (808) 434-4444 • Honolulu: (808) 535-1000  
London: (808) 535-1000 • Fax: (808) 765-1112

Harry A. Saunders  
President

Fax Submittal: 586-6659  
Email Submittal: [ENETestimony@Capitol.hawaii.gov](mailto:ENETestimony@Capitol.hawaii.gov)

Testimony by Harry Saunders  
President, Castle & Cooke Hawai'i  
February 23, 2011

Before the Senate Committees on  
ENERGY AND ENVIRONMENT  
Senator Mike Gabbard, Chair  
Senator J. Kalani English, Vice chair

AGRICULTURE  
Senator Clarence K. Nishihara, Chair  
Senator Gilbert Kahele, Vice Chair

WATER, LAND AND HOUSING  
Senator Donovan M. Dela Cruz, Chair  
Senator Mālama Solomon, Vice Chair

February 24, 2011  
3:20 p.m.  
Room 225

**In Support of SB 631**  
RELATING TO RENEWABLE ENERGY

Chairs Gabbard, Nishihara, Dela Cruz; Vice Chairs English, Kahele and Solomon and Members of the ENERGY & ENVIRONMENT, AGRICULTURE and WATER, LAND AND HOUSING Committees.

I am Harry Saunders, President of Castle & Cooke Hawai'i. We support SB 631 that authorizes renewable energy production as a permitted use on agricultural lands, regardless of whether or not agricultural activity is the primary activity of the renewable energy enterprise.

Allowing renewable energy facilities on agricultural lands is a sustainable use and can help reduce Hawai'i's dependency on fossil fuels. Especially if there are

sustained wind and solar resources on agricultural land, capturing these resources can provide a reliable alternate energy source and clean energy for our future.

Lā Ola solar farm (1.2 MW peak) on Lānaʻi is a good example of using fallow agriculture lands to capture the sun's resources to provide an alternate energy source to the Lānaʻi electrical grid. We are exploring other wind and solar resources, many of which are on our agricultural lands, to help reduce Hawaiʻi's dependency on fossil fuels.

On behalf of Castle & Cooke, I respectfully request your support for SB 631. Mahalo for your consideration of our testimony. If you have questions, please feel free to contact us:

Harry Saunders, President  
Castle & Cooke Hawaiʻi  
[aksukamoto@castlecooke.com](mailto:aksukamoto@castlecooke.com)  
548-4884

Richard Mirikitani, Senior Vice President and Counsel  
Castle & Cooke Hawaiʻi  
[rmirikitani@castlecooke.com](mailto:rmirikitani@castlecooke.com)  
548-4890

Carleton Ching, Vice President – Community and Government Relations  
Castle & Cooke Hawaiʻi  
[cching@castlecooke.com](mailto:cching@castlecooke.com)  
548-3793



**Hawaii Farm Bureau**  
F E D E R A T I O N

2343 Rose Street, Honolulu, HI 96819  
Phone: (808) 848-2074; Neighbor Islands: 1-800-482-1272  
Fax: (808) 848-1921; e-mail: info@hfbf.org

**TESTIMONY**

**RE: SB 631 RELATING TO RENEWABLE ENERGY**

Chair Gabbard, Chair Nishihara, Chair DelaCruz and Members of the Committees:

Hawaii Farm Bureau Federation, on behalf of our commercial farm and ranch families and organizations is in **Strong Opposition** of SB631, Relating To Renewable Energy.

HFBF agrees that renewable energy is important to Hawaii. We also believe agriculture is not only important but critical to Hawaii's increased self sufficiency. This measure does not balance but rather prioritizes the need for renewable energy over agriculture. Existing law, recognized the land classification history in Hawaii and provided certain classes of lands for use in renewable energy production. At the same time it preserved certain lands for use for agricultural production. There are several reasons why this measure does not balance Hawaii's needs.

- 1. Renewable energy's cost structure is not similar to agriculture;** Solar and wind operations, after initial capital investments are not subject to swings in global swings in energy costs. Agriculture is extremely sensitive. Crop inputs and supplies along with transportation costs are subject to global energy pricing significantly affecting their profitability.
- 2. Renewable energy companies will be able to pay more for agricultural lands.** The willingness and ability to pay more for land will put our farmers and ranchers at risk.
- 3. Renewable energy companies will compete for the best lands.** Good terrain and access to existing infrastructure are key components to reducing costs for farmers and ranchers. They are the same needs for solar and wind companies. Again, farmers and ranchers are put in risk.

4. **Renewable energy companies have greater access to capital.** Federal and State incentives along with angel investors are readily available to renewable energy companies. Such financing is only a dream for farmers and ranchers.
5. **Lands that go out of farming will rarely be put back into agricultural production.**
6. **Existing law allows for rezoning to allow renewable energy operations.** Currently the state and counties are in need of funds. Putting a use such as renewable energy, which is an INDUSTRIAL use, on low priced agricultural lands literally gives away tax resources. If agricultural lands are desired for this use, lands should be REZONED for this use. This mechanism already exists and Counties have the ability to exercise this practice if there is a strong desire that a renewable energy venture is in the public interest. This bill literally gives away this case by case consideration and puts Hawaii's agriculture at risk.

We respectfully request your **support in OPPOSING** this legislation. **By opposing this bill, it does not mean that renewable energy development is opposed but rather that agriculture is supported.** This is an important message to support Hawaii's desire for increased self sufficiency.

We appreciate this opportunity to provide our opinion on this matter. If there are any questions, please contact Warren Watanabe at 2819718.



# Sierra Club Hawai'i Chapter

PO Box 2577, Honolulu, HI 96803  
808.538.6616 hawaii.chapter@sierraclub.org

## SENATE COMMITTEE ON ENERGY & ENVIRONMENT SENATE COMMITTEE ON AGRICULTURE SENATE COMMITTEE ON WATER, LAND, AND HOUSING

February 24, 2011, 2:45 P.M.  
(Testimony is 3 pages long)

### TESTIMONY IN OPPOSITION TO SB 631

Aloha Chair Gabbard, Chair Nishihara, Chair Dela Cruz, and Members of the Committees:

The Hawai'i Chapter of the Sierra Club, with 8,000 dues-paying members and supporters, **opposes** SB 631. This measure would allow renewable energy production as a permitted use on all agricultural lands.<sup>1</sup> While this measure appears appropriately geared towards advancing Hawai'i's clean energy goals, it could also have a significant detrimental effect on Hawai'i's efforts to increase food self-sufficiency.

#### I. *Hawai'i's Imported Food Crisis.*

Hawai'i is tragically reliant upon imported food. We import approximately eighty-five percent of our food. Currently, Hawaii has a fresh supply of produce for no more than ten days. Ninety percent of the beef, sixty-seven percent of fresh vegetables, sixty-five percent of fresh fruits, and seventy percent of all milk consumed in the state are imported.

Further, over the past 50 years, approximately 53% of Class A and B lands have been reclassified to urban use. On Oahu alone, almost 4,000 acres of prime farmland have been reclassified in the past 20 years.

#### II. *Local Food Production and Consumption.*

While the picture is currently bleak, there are some glimmers of hope. Between 1990 and 2004 there was a 475% increase in the land acreage planted to vegetable crops in Oahu (from about

---

<sup>1</sup> It also appears that this measure would restrict agricultural lands with soil productivity rating class C, D, E, or U to **only** the development of agricultural-energy facilities. See subsection (c) (limiting uses to what is set forth in subsection (a)(16)). Either this is an incorrect interpretation or a critical mistake in drafting.

800 acres planted in 1990, to 3,800 acres in 2004, according to DOA annual reports). This sudden shift of statewide vegetable production to Oahu showed that when the proper opportunities exist, growers prefer to grow diversified crops in Oahu, to minimize inter-island transportation costs.

Over the past few years, there has been an increasing focus on buying and eating local. Because of health and environmental concerns, consumers are increasingly demanding, and willing to pay premiums for locally grown produce, as compared to imported produce (for example, see: Ray Cross, Buy Local: Your Health Will Thank You, Madison County Courier Newspaper, NY, Jan. 19, 2010; and Cynthia Oi, The demand is there for locally grown food, Op-ed, Honolulu Star Bulletin, Jan. 2, 2010).

### III. *The Need for Agricultural Land.*

Hawai'i has failed to do adequate land use planning to identify the land and resources necessary to become more self-sufficient.<sup>2</sup> There is a desperate need for planning models to be developed based on different social/economic, or environmental contingencies. For instance, prohibitive prices for energy in the future may mean that production lands should be in close proximity to consumers, i.e. each community or county may try to reach a certain level of self-sufficiency.<sup>3</sup>

Regardless, even assuming that we can rely on the same level of inputs that we use today, an analysis of self-sufficiency by *two College of Tropical Agriculture and Human Resources professors, investigated whether Hawaii could become self-sufficient in food production, based on the current available land. And they answered "The answer, simply, is no"* (C.N. Lee and H.C. Bittenbender, Agriculture, CTAHR Internal document). In this analysis the authors report that Hawaii has about 249,000 acres of "good farmland." To reach near self-sufficiency in

---

<sup>2</sup> Admittedly, it is difficult to predict accurately the total amount of land that may be needed to obtain a certain volume of production, because productivity may be affected by soil type, soil quality, elevation, rainfall patterns, incidence of pests, seed quality, production technology, availability of key resources such as nutrients, energy, and water, farmer management skills, and several other factors. To maintain a similar level of productivity (pounds of produce per acre) models often assume that we will be able to rely on the same levels of inputs (fertilizers, pesticides, machinery, energy), as we have in the past.

<sup>3</sup> Many communities in our state are already discussing issues of community self-sufficiency. As an example the Hamakua agricultural draft plan (<http://ruralhamakua.org/>) makes mention of the type of agricultural systems that are needed to promote self-sufficiency and sustainability. More recently a Food Summit held in the Kohala Coast held a discussion about target goals for self-sufficiency i.e. how much of the food consumed by the community should be grown locally (<http://www.slideshare.net/andreadean/north-kohala-food-forum-presentation-august-22-09>). It is not unreasonable that in the future, other communities would want to establish similar goals of self-sufficiency.

agricultural production they calculated that the state would need 260,800 Acres, or 12,000 Acres more than what we currently have available, and these estimates were made without considering for population increases.

#### **IV. *Competing Uses for Agricultural Land.***

Increasing the number of permissible uses on agricultural land potentially increases the cost for current agricultural operations. Lessees, for example, may have to pay more as new and more expensive "highest and best uses" (the normal phrase used to determine lease rents) are established on agricultural land. Farmers may have to stop producing food and switch to renewable energy simply to stay in business. Longterm leasing may also become more difficult to obtain as more agricultural land is taken out of existing inventory.

Competing uses also takes valuable and finite farmland out of food production. Early estimations for the amount of land needed for biofuels, for example, indicate tens of thousands of acres could be required. This puts Hawai'i further down the hole in establishing a reasonable level of food self-sufficiency.

#### **V. *Conclusion.***

This is not a zero-sum question. Let's set policies that advance both food and energy security goals instead of pitting these competing demands against one another. Renewable energy is already allowed on agricultural land with a special permit. It's unclear whether we need to rush into allowing renewable energy on all agricultural land as a matter of right before doing a more detailed and specific analysis on the possible impacts.

Thank you for the opportunity to testify.



Aloha Chair Gabbard, Chair Nishihara, Chair Dela Cruz, and Members of the Committees:

My name is Anthony Aalto and as a concerned citizen I wish to oppose SB 631.

I believe this bill is premature and that a headlong rush to pass it may provoke unforeseen consequences.

By allowing installation of huge photovoltaic arrays on our best farmland, the bill seeks to promote greater energy self-sufficiency at the expense of greater food self-sufficiency.

But we are as equally and dangerously dependent on imports from overseas for our food as for our energy. We barely produce 15% of what we consume. Though local food farming is rapidly expanding, it is in a constant race with rising land prices as developers hoard land for suburbanization schemes..

Permitting large scale renewable energy arrays on our best farmland would simply add another If we allow this bill to go through how much of our best food growing farmland will we lose?

Unless and until we can answer that question, we should not allow this bill to advance.

With respect I ask you to press the state to study how much farmland might be lost to this measure and to defer the bill in the meantime until the next legislative session.

I thank you for this opportunity to testify.

Anthony Aalto

SENATE COMMITTEE ON ENERGY & ENVIRONMENT  
SENATE COMMITTEE ON AGRICULTURE  
SENATE COMMITTEE ON WATER, LAND, AND HOUSING  
February 24, 2011, 2:45 P.M.

TESTIMONY IN OPPOSITION TO SB 631

Aloha Chair Gabbard, Chair Nishihara, Chair Dela Cruz, and Members of the Committees:

Hawai'i is tragically reliant upon imported food. We import approximately eighty-five percent of our food. Currently, Hawaii has a fresh supply of produce for no more than ten days. Ninety percent of the beef, sixty-seven percent of fresh vegetables, sixty-five percent of fresh fruits, and seventy percent of all milk consumed in the state are imported.

Further, over the past 50 years, approximately 53% of Class A and B lands have been reclassified to urban use. On Oahu alone, almost 4,000 acres of prime farmland have been reclassified in the past 20 years.

While the picture is currently bleak, there are some glimmers of hope. Between 1990 and 2004 there was a 475% increase in the land acreage planted to vegetable crops in Oahu (from about 800 acres planted in 1990, to 3,800 acres in 2004, according to DOA annual reports). This sudden shift of statewide vegetable production to Oahu showed that when the proper opportunities exists, growers prefer to grow diversified crops in Oahu, to minimize inter-island transportation costs.

Over the past few years, there has been an increasing focus on buying and eating local. Because of health and environmental concerns, consumers are increasingly demanding, and willing to pay premiums for locally grown produce, as compared to imported produce (for example, see: Ray Cross, Buy Local: Your Health Will Thank You, Madison County Courier Newspaper, NY, Jan. 19, 2010; and Cynthia Oi, The demand is there for locally grown food, Op-ed, Honolulu Star Bulletin, Jan. 2, 2010).

Hawai'i has failed to do adequate land use planning to identify the land and resources necessary to become more self-sufficient.<sup>2</sup> There is a desperate need for planning models to be developed based on different social/economic, or environmental contingencies. For instance, prohibitive prices for energy in the future may mean that production lands should be in close proximity to consumers, i.e. each community or county may try to reach a certain level of self-sufficiency.<sup>3</sup> Regardless, even assuming that we can rely on the same level of inputs that we use today, an analysis of self-sufficiency by two College of Tropical Agriculture and Human Resources professors, investigated whether Hawaii could become self-sufficient in food production, based on the current available land. And they answered "The answer, simply, is no" (C.N. Lee and H.C. Bittenbender, Agriculture, CTAHR Internal document). In this analysis the authors report that Hawaii has about 249,000 acres of "good farmland." To reach near self-sufficiency in agricultural production they calculated that the state would need 260,800 Acres, or 12,000 Acres more than what we currently have available, and these estimates were made without considering for population increases.

Increasing the number of permissible uses on agricultural land potentially increases the cost for current agricultural operations. Lessees, for example, may have to pay more as new and more expensive "highest and best uses" (the normal phrase used to determine lease rents) are established on agricultural land. Farmers may have to stop producing food and switch to renewable energy simply to stay in business. Longterm leasing may also become more difficult to obtain as more agricultural land is taken out of existing inventory. Competing uses also takes valuable and finite farmland out of food production. Early estimations for the amount of land needed for biofuels, for example, indicate tens of thousands of acres could be required. This puts Hawai'i further down the hole in establishing a reasonable level of food self-sufficiency.

This is not a zero-sum question. Let's set policies that advance both food and energy security goals instead of pitting these competing demands against one another. Renewable energy is already allowed on agricultural land with a special permit. It's unclear whether we need to rush into allowing renewable energy on all agricultural land as a matter of right before doing a more detailed and specific analysis on the possible impacts.

Thank you for the opportunity to testify.

Brian Bell

4626 Sierra Dr

Honolulu, HI 96816

808-227-7087

SB 631

Please OPPOSE this bill. This is one of the most short-sighted bills I have read. Yes we need to stop the importation of dirty oil. But, we cannot forget we import food too. We need our lands for food. There are MANY other ways to generate renewable energy. To grow fuel is so 20<sup>th</sup> century! We need to stop thinking in the form of liquid fuel. No matter how we obtain it, it will NEVER be sustainable or "green". Hawaii has an abundance of sun, wind, and ocean currents to help us with our energy needs. Please do NOT pass this bill!

Thank you for your time,

Bobby McClintock, Honolulu, HI

Testimony for ENE/AGL/WLH 2/24/2011 3:20:00 PM SB631

Conference room: 225

Testifier position: oppose

Testifier will be present: No

Submitted by: Jane Yamashiro

Organization: Individual

Submitted on: 2/24/2011

Comments:

I oppose this measure as it is one that could have many unintended consequences. While energy is important, equally important is the agricultural lands. Without careful consideration of the type or the appropriate alternative energy production that will take place on the ag lands, blanket approval of use of ag lands is not a responsible solution.

Testimony for ENE/AGL/WLH 2/24/2011 3:20:00 PM SB631

Conference room: 225  
Testifier position: oppose  
Testifier will be present: No  
Submitted by: Scott Hamilton  
Organization: Individual  
Submitted on: 2/24/2011

Comments:

Aloha Senators:I am a strong supporter for alternate energy;but Hawaii also has a problem with importing food.To use any agriculture land for alternate energy needs some special investigation to determine if the said land would be better held in agriculture.It is a hard situation where need to choose between alternate energy or agriculture land.Also the cost of agi land would be greatly increased,which would be a hinderance to a goal to have more of our food grown here.Mahalo nui loa for your no vote;and hoping for a balance approach to agri land use and alternate energy.Sincerely Scott Hamilton

Testimony for ENE/AGL/WLH 2/24/2011 3:20:00 PM SB631

Conference room: 225  
Testifier position: oppose  
Testifier will be present: No  
Submitted by: Marjorie Erway  
Organization: Individual  
Submitted on: 2/23/2011

Comments:

While Hawaii definitely needs to accelerate clean energy development, caution is required before covering our ag land with biofuels instead of our own food. This could put farmers out of business, and more importantly, continue to make us non-sustainable for our food supply.

There is already an adequate process to obtain a variance to develop renewable energy projects on ag land. Importation of food is JUST as DETRIMENTAL to our longterm stability goals as is the importation of dirty oil. There are several other ways to generate renewable energy, like putting solar panels on top of roofs.

There needs to be a well-reasoned and appropriate balance between our food and energy goals.

I believe we need to know the potential impacts of this bill before passing it. Please require the Legislative Reference Bureau, or some other agency, take a look at this issue in more depth, and be ready for next year's session to adequately vote on some bill like this.

Sincerely,  
Marjorie Erway

## TESTIMONY OPPOSING SB 631

**KILL BILL SB631.** This is a terrible bill that would, among other things, allow waste-to-energy facilities on Ag land (see pg.9, lines 17-18), allow organic waste refineries and all their fuel tanks, pipelines and truck traffic on Ag land, and allow our best Ag lands to be used for such “energy” projects---all without regard to neighbors, EIS review or the closer scrutiny of zoning change reviews. This is really bad for neighbors, bad for agriculture, bad for Hawai'i.

The bill and other current proposals would encourage our precious Ag lands to be monopolized by “biofuel” crops instead of food crops, in the attempt to produce locally our fuels for HECO power plants and transportation, thus perpetuating the combustion-based technologies that desperately need to be converted to other, non-combustion renewable sources. Should much of the remaining sugar and pineapple lands, pasture lands and other Ag lands be used for “biofuel” production, then it will be (1) tying up much of the state’s best Ag land and sending its soil nutrients up in smoke, (2) causing intense competition with real food-growing agriculture, (3) allowing this competition to drive up the price and taxes on Ag lands so high that real food agriculture will be severely hindered or impossible for the smaller, non-corporate farmers, and (4) will drive us away from the state’s goals of increasing Hawaii diversified agriculture and food self-security. The fuels market is insatiable; its cost to consumer ever-elevating.

We have already experienced how elevated land values can inhibit agriculture when the plantations decided to exchange growing crops for growing houses, many of these houses for folks who had yet to arrive. This switch greatly elevated the cost and taxes of Ag land beyond the means of local people—look how much of the former cane and pine land wound up being sold to off-shore buyers. The profits from food-growing can never compete with those of fuels, so any competition for land will be one-sided.

This bill will drive us back into the era of plantation agriculture, especially odious now that so much of the former plantation lands are in off-shore ownership. Do we really want to consider going back to a small number of business people calling the shots for these islands?

**KILL BILL SB631.**

Mahalo for the chance to share my views on this bill.

Rick Warshauer, Volcano

Testimony for ENE/AGL/WLH 2/24/2011 3:20:00 PM SB631

Conference room: 225  
Testifier position: oppose  
Testifier will be present: No  
Submitted by: janice palma-glennie  
Organization: Individual  
Submitted on: 2/24/2011

Comments:

While I am a strong supporter of alternative energy and the use of agricultural lands in economically feasible ways, this bill has many shortcomings and ramifications, especially for the Big Island. I have many questions and reservations related to it, and living on ag land that isn't the right place for many heavier type ag endeavors.

I've long been a proponent of sub-classes of ag lands to include ag/industrial (i.e., macnut processing), ag tourism (where b & b's would be more suitable, "garden tours", etc), a designation for areas that should be more quiet, less intensive ag (including spraying toxic herbicides and pesticides from airplanes, etc), etc..

This bill lumps all ag endeavors and lifestyles into one which is not a realistic or workable way to treat the many variations and opportunities which ag lands present.

Mahalo for voting "NO" on this potentially dangerous bill.