

---

---

# A BILL FOR AN ACT

RELATING TO ENERGY AT THE UNIVERSITY OF HAWAII.

**BE IT ENACTED BY THE LEGISLATURE OF THE STATE OF HAWAII:**

1           SECTION 1. Act 99, Session Laws of Hawaii 2015,  
2     established a long-term goal for the University of Hawaii to  
3     reduce energy consumption and energy bills to net-zero, and  
4     encouraged "the use of innovative means of energy-savings  
5     financing to reduce taxpayer costs for . . . energy efficiency  
6     projects."

7           Green revolving funds are an innovative and proven  
8     mechanism for universities and other large institutions to  
9     reduce operating costs and environmental impact while promoting  
10    education and engaging stakeholders. A green revolving fund is  
11    an internal fund that provides a direct source of capital to all  
12    ten University of Hawaii campuses to implement energy  
13    efficiency, renewable energy, and other sustainability projects  
14    that generate cost savings. These savings are tracked and used  
15    to replenish the fund for the next round of green investments,  
16    thus establishing a sustainable funding cycle while reducing  
17    operating costs and environmental impact.



1           The legislature finds that the University of Hawaii needs a  
2 mechanism to track and reinvest savings realized from energy  
3 efficiency and renewable energy projects into additional cost-  
4 saving measures that reduce energy consumption to support this  
5 long term goal.

6           The purpose of this Act is to create a special fund to  
7 collect and expend revenues that will harness savings realized  
8 from energy efficiency investments and other sources of revenues  
9 to reinvest into further measures to reduce energy consumption  
10 and operating costs towards achieving the University of Hawaii's  
11 net-zero energy goal.

12           SECTION 2. Chapter 304A, Hawaii Revised Statutes, is  
13 amended by adding a new section to be appropriately designated  
14 and to read as follows:

15           "§304A-        University of Hawaii green special fund. (a)

16 There is established the University of Hawaii green special  
17 fund, into which may be deposited:

18           (1) Savings realized by the university from energy

19           conservation measures;

20           (2) Appropriations made by the legislature;



1        (3) Investment earnings, gifts, donations, or other income  
2                    received by the University of Hawaii; and

3        (4) Any rebates, grants or incentives associated with  
4                    energy conservation measures.

5        (b) Moneys in the University of Hawaii green special fund  
6 shall be used to support energy efficiency, renewable energy and  
7 sustainability projects & services including personnel,  
8 equipment costs, project costs, and other expenses, as well as  
9 planning, design and implementation of sustainability projects  
10 for the benefit of the university.

11        (c) The University of Hawaii may also transfer other funds  
12 into the University of Hawaii green special fund to offset the  
13 costs and expenses associated with sustainability initiatives at  
14 the University of Hawaii."

15        SECTION 3. New statutory material is underscored.

16        SECTION 4. This Act shall take effect upon its approval.

17

INTRODUCED BY: 

JAN 25 2016



# H.B. NO. 2240

**Report Title:**

UH; Green special fund

**Description:**

Establishes the University of Hawaii green special fund within UH to reduce energy consumption and costs.

*The summary description of legislation appearing on this page is for informational purposes only and is not legislation or evidence of legislative intent.*





# UNIVERSITY OF HAWAII SYSTEM

## Legislative Testimony

---

Testimony Presented Before the  
House Committee on Higher Education  
February 16, 2016 at 2:01 p.m.

By  
Jan Gouveia  
Vice President for Administration  
University of Hawai'i System

### HB 2240 – RELATING TO ENERGY AT THE UNIVERSITY OF HAWAII

Chair Choy, Vice Chair Ichiyama, and members of the Committee:

The University of Hawai'i ("University") supports HB2240, which establishes a green special fund, because it facilitates a sustainable means of financing energy efficient and other sustainability projects at the University that will ultimately improve energy performance, reduce operating costs, and modernize our facilities.

Green Revolving Funds (GRFs) are prominent across many colleges and universities dedicated to addressing sustainable facilities, operations and behaviors. These funds are typically managed by the university through the issuance of "loans" to internal departments or campus groups to fund energy-efficient projects, reduce resource use, and other sustainable efforts. The departments or campus groups repays the "loan" either through savings realized by the project or other sources of income.

GRFs have gained momentum across the nation. According to the Association for the Advancement of Sustainability in Higher Education, there are at least 85 universities that use GRFs as part of their sustainability programs, like Boston University, George Washington University, Stanford University and University of Notre Dame.

Last year, the University of Hawai'i formally established the Office of Sustainability. In addition to supporting smaller campus initiatives, the Office of Sustainability has taken on a larger effort to holistically tackle the high energy consumption across all ten campuses. To assist in this effort, a green special fund is necessary to support multiple methods of financing (including internal loans, other special funds, and private donations) and the repayment of debt service from special funds, private donations, and energy rebates. Establishment of a green special fund at the University will also ensure that funding dedicated to sustainability initiatives are used for that particular purpose and, more importantly, ensure that any savings from the investment be reinvested toward other sustainable projects.

There is strong student support for this initiative as well. In August 2015, the Associated Students of the University of Hawai'i passed a resolution in support of a Green Revolving Fund, saying that *"ASUH acknowledges the growing concern our university's infrastructure faces and believes that sustainability projects that reduce operational costs is integral in improving both the fiscal nature of this university along with its environment"*.

The student resolution further states that *“ASUH hopes the GRF would serve as an example for organizations and departments on this campus to lead best business practices to not only save money, but to also further promote sustainability in a fiscally responsible manner”*.

The green special fund advanced by HB 2240 will improve fiscal management, increase transparency, and support the University’s progress towards its Net Zero Energy mandate (Act 99, Session Laws of Hawai’i 2015). We respectfully request passage of this measure.

Thank you for the opportunity to testify in support of HB 2240.



# ASUH

Associated Students of the University of Hawai'i

YOUR STUDENT GOVERNMENT

To: House Committee on Higher Education  
Representative Isaac Choy, Chair  
Representative Linda Ichiyama, Vice Chair

Date: Tuesday, February 16, 2016  
Time: 2:01 PM  
Place: Conference Room 309

**Re: Support of HB 2240 Relating to Energy at the University of Hawai'i**

My name is Kelly Zakimi and I serve as the President of the Associated Students of the University of Hawai'i at Mānoa (ASUH), the undergraduate student government representing over 14,000 full-time, classified undergraduates at UH's flagship campus. I am writing on behalf of the ASUH in strong support of HB 2240, which establishes a green special fund within UH to reduce energy consumption and costs.

HB 2240 is in line with ASUH Senate Resolution 04-16: *In Support of a Green Revolving Fund at the University of Hawai'i at Mānoa*, which the ASUH approved unanimously on August 5, 2015. Through its establishment on multiple U.S. college campuses such as Harvard, the Green Revolving Fund has proven to reduce operating costs and environmental impact. At Harvard, the Green Revolving Fund financed projects to improve lighting, ventilation, and renewable energy. If approved, the UH-specific Green Revolving Fund will allow the University to tackle similar projects, thereby improving the learning environment for both undergraduate and graduate students while simultaneously reinforcing the University's commitment to sustainability.

Thank you for your time and I humbly ask for your support in passing HB 2240.

With appreciation,

Kelly Zakimi  
ASUH President  
[zakimik@hawaii.edu](mailto:zakimik@hawaii.edu)

**ichiyama2-Brandon**

---

**From:** mailinglist@capitol.hawaii.gov  
**Sent:** Sunday, February 14, 2016 9:24 PM  
**To:** HEDtestimony  
**Cc:** mryan603@hawaii.edu  
**Subject:** Submitted testimony for HB2240 on Feb 16, 2016 14:01PM

**HB2240**

Submitted on: 2/14/2016

Testimony for HED on Feb 16, 2016 14:01PM in Conference Room 309

<b>Submitted By</b>	<b>Organization</b>	<b>Testifier Position</b>	<b>Present at Hearing</b>
Mark Ryan	SustainableUH	Support	No

Comments: Please support HB2240. A Revolving Green Fund is a great way to encourage the university to meet its sustainability goals, as well as address deferred maintenance on the UH Manoa campus and simultaneously save costs. Additionally, a Revolving Green Fund for the UH System will serve to increase student engagement in fields of research related to sustainability, an emerging discipline that is desperately needed in a world of rapid change and environmental degradation.

Please note that testimony submitted less than 24 hours prior to the hearing, improperly identified, or directed to the incorrect office, may not be posted online or distributed to the committee prior to the convening of the public hearing.

Do not reply to this email. This inbox is not monitored. For assistance please email [webmaster@capitol.hawaii.gov](mailto:webmaster@capitol.hawaii.gov)



My name is Kelsey Barrow and I am an undergraduate student at the University of Hawai'i at Manoa. I am writing in strong support of HB 2240, which establishes a green special fund within UH to reduce energy consumption and costs. I believe it will improve the University tremendously.

Respectfully submitted,  
Kelsey Barrow  
[barrowk@hawaii.edu](mailto:barrowk@hawaii.edu)  
8082656630

**ichiyama2-Brandon**

---

**From:** mailinglist@capitol.hawaii.gov  
**Sent:** Sunday, February 14, 2016 9:45 PM  
**To:** HEDtestimony  
**Cc:** elia94eb@gmail.com  
**Subject:** \*Submitted testimony for HB2240 on Feb 16, 2016 14:01PM\*

**HB2240**

Submitted on: 2/14/2016

Testimony for HED on Feb 16, 2016 14:01PM in Conference Room 309

<b>Submitted By</b>	<b>Organization</b>	<b>Testifier Position</b>	<b>Present at Hearing</b>
ELIA BRUNO	Individual	Support	No

Comments:

Please note that testimony submitted less than 24 hours prior to the hearing, improperly identified, or directed to the incorrect office, may not be posted online or distributed to the committee prior to the convening of the public hearing.

Do not reply to this email. This inbox is not monitored. For assistance please email [webmaster@capitol.hawaii.gov](mailto:webmaster@capitol.hawaii.gov)

**ichiyama2-Brandon**

---

**From:** mailinglist@capitol.hawaii.gov  
**Sent:** Monday, February 15, 2016 12:54 PM  
**To:** HEDtestimony  
**Cc:** jerrinl@hawaii.edu  
**Subject:** \*Submitted testimony for HB2240 on Feb 16, 2016 14:01PM\*

**HB2240**

Submitted on: 2/15/2016

Testimony for HED on Feb 16, 2016 14:01PM in Conference Room 309

<b>Submitted By</b>	<b>Organization</b>	<b>Testifier Position</b>	<b>Present at Hearing</b>
Jerrin Lawi-an	Individual	Support	No

Comments:

Please note that testimony submitted less than 24 hours prior to the hearing, improperly identified, or directed to the incorrect office, may not be posted online or distributed to the committee prior to the convening of the public hearing.

Do not reply to this email. This inbox is not monitored. For assistance please email [webmaster@capitol.hawaii.gov](mailto:webmaster@capitol.hawaii.gov)

To: House Committee on Higher Education  
Representative Isaac Choy, Chair  
Representative Linda Ichiyama, Vice Chair

Date: Tuesday, February 16, 2016

Time: 2:01 PM

Place: Conference Room 309

Re: Support of HB 2240 Relating to Energy at the University of Hawai'i

My name is Sean Mitsui and I am an undergraduate student at the University of Hawai'i at Manoa. I am writing in strong support of HB 2240, which establishes a green special fund within UH to reduce energy consumption and costs.

The university today faces many challenges that pertain to the economic costs associated with attending the university. What this bill would do is that it would help address this problem by creating the basic foundation for a green revolving fund at the university of Hawaii to promote fiscal efficiency while helping meet the university's sustainability goals.

I am usually an individual who is very skeptical with all the environmental activism that students carry out nowadays since they often end up increasing costs and are sometimes even more detrimental to the environment. However, I see much potential with the green revolving fund because it encourages departments on campus to be save money and reinvest those funds for future capital improvement projects all while being more environmentally sustainable.

I believe this program is the first step in addressing many of the university's problems, which is why I firmly support the passage of HB 2240.

Respectfully submitted,

Sean Mitsui  
[ymitsui@hawaii.edu](mailto:ymitsui@hawaii.edu)  
(808) 255-9289

Dear Legislators,

I'm writing to you regarding the establishment of a green revolving fund at the UH System. I'm a PhD student in Economics (fisheries and oceanic economics) at UH Manoa, previously an MSc student in Natural Resources and Environmental Management at UH Manoa. I work in the area of applied environmental economics, with previous work in coastal recreation on Oahu, Maui, and Guam, funded as part of USGS and NOAA projects.

Last year, I had the chance to work with UH Systems Sustainability Coordinator Matt Lynch on financial projections for a green revolving fund. Our findings were that such a fund would be tremendously beneficial for the UH system as a means of improving efficiencies in operating costs, with a side benefit of energy conservation.

Many large organizations such as universities have management authority delegated to a diverse group of administrators, and as a result the organization structure is such that each unit is only concerned with meeting their own budgetary requirements: efficiencies that could be had across the system are often missed as a result.

As you may already be aware, our high cost of energy in the islands contribute to a high operating cost at the UH System, and opportunities for cost efficiencies are readily available across campus facilities. Unfortunately, as administrators are not incentivized to make system-wide efficiencies (only being concerned with their compartmentalized responsibilities), these cost savings are never realized.

Take for example the simple case of lights in older buildings. If these lights were replaced with modern, much more efficient lights, the energy cost savings would repay the cost of the project in as few as 1-2 years, and the original capital is ready to redeploy on implementing additional cost-saving projects. An added bonus would be energy efficiency rebates from Hawaii Energy under PUC energy efficiency mandates.

A green revolving fund would provide facilities management with the liquidity to conduct such work, reduce operations & maintenance costs spent on repairing / replacing old equipment, and reallocate valuable man-hours to other areas of need (such as reducing campus deferred maintenance)

Such initiatives have been taking place at many public and private research and teaching institutions across the mainland, with many successful examples in both Canada and the United States. Even a simple financial analysis and forecast can reveal the significance of the operating cost savings the UH System stands to gain, all at very little to no cost to the state. In an ideal world, such decisions would be rational and made by administrators themselves with no outside input required. But given the size of the bureaucracy and inefficiencies of an organization like the UH System, a mechanism like a green revolving fund is necessary to facilitate rational decisions across the institution. Regardless of if one is concerned with environmental impact, "sustainability" or other more nebulous ideals, a green revolving fund stands on its own as an

operating cost reduction mechanism. Energy efficiency is just a nice side benefit that happens to take place.

I would urge you to bring the bill before your committee on the adoption of such a green revolving fund at the UH System to consideration, for all of the aforementioned reasons above. It would support energy efficiency, reduce operating expenses, and most importantly be a fundamentally sound financial decision with immediate returns regardless of if one is to be concerned with environmental impact or not.

Please do not hesitate to contact me with any questions or comments, and I would be happy to lend any expertise I may have in this matter.

Sincerely,

Marcus Peng

PhD student, Economics  
University of Hawaii at Manoa



735 Bishop Street, Suite 424  
Honolulu, Hawai'i 96813  
(808) 800-7500  
hawaiigreengrowth.org

*Hawai'i Green Growth is a public-private partnership platform of leaders from government, non-governmental and cultural organizations, business, academia and philanthropy committed to achieving the six Aloha+ Challenge 2030 sustainability goals and modeling an integrated green economy.*

#### Steering Committee Members

Deanna Spooner  
Pacific Island Climate Change Cooperative

June Matsumoto  
World Conservation Congress

Matt Lynch  
University of Hawai'i

Mark Fox  
The Nature Conservancy

Mike Hamnett  
Hawai'i Energy Policy Forum

Piia Aarma  
Pineapple Tweed PR & Marketing

Pono Shim  
O'ahu Economic Development Board

Scott Enright  
Department of Agriculture

Scott Seu  
Hawaiian Electric Company

Ulalia Woodside  
The Nature Conservancy

William J. Aila Jr.  
Department of Hawaiian Homelands

#### Previous Committee Members

Audrey Newman

'Aulani Wilhelm

Jackie Kozak Thiel

Josh Atwood

Kirsten Baumgart Turner

Russell Kokubun

Sharon Moriwaki

### Testimony of Hawai'i Green Growth In Support of HB2240 Relating to Energy at the University of Hawai'i House Committee on Higher Education 16 February 2016, 2:01pm, Room 309

Aloha Chair Choy, Vice Chair Ichiyama, and Members of the Committee:

**Hawai'i Green Growth (HGG) supports HB2240** to establish the University of Hawai'i green special fund within the University of Hawai'i to reduce energy consumption and costs. HB2240 will establish a long-term goal for the University of Hawai'i to reduce energy consumption and energy bills to net-zero, and encouraged the use of innovative means of energy-savings financing to reduce taxpayer costs for energy efficiency projects.

As the largest higher education institution in the state, the University of Hawai'i is an important leader in helping to achieve the state's clean energy goal, and also key to *Aloha+ Challenge* green workforce and education goal. The *Aloha+ Challenge* is a statewide commitment by the State Legislature (SCR 69), Governor, Mayors and Office of Hawaiian Affairs launched in 2014 that outlines six ambitious, yet achievable sustainability goals for 2030 in the areas of clean energy, local food production, natural resource management, solid waste reduction, smart growth and climate resilience, green jobs and education. The *Aloha+ Challenge* was internationally recognized by the US State Department and Global Island Partnership at the UN Conference on Small Island Developing States in Samoa, and positions Hawai'i as a model of local implementation of the recently adopted UN Sustainable Development Goals. As the host of the upcoming 2016 IUCN World Conservation Congress in September 2016, Hawai'i will have the opportunity further showcase the Hawai'i's leadership on sustainable development.

Innovative financing is critical to meeting and exceeding all six of the *Aloha+ Challenge* goals. Green revolving funds are an innovative and proven mechanism for universities and other large institutions to reduce operating costs and environmental impact while promoting education and engaging stakeholders.

Reducing energy consumption is one of the most important ways any large institution can lower their carbon footprint and add to sustainable development. By creating a special fund to collect and expend revenues that will harness savings realized from energy efficiency investments and other sources of revenues, the University of Hawai'i can reinvest into further measures to reduce energy consumption and operating costs towards achieving the net-zero energy goal.

As a public-private partnership, Hawai'i Green Growth supports HB2240 to help advance action on the *Aloha+ Challenge* clean energy and green workforce and education goals, and demonstrate Hawai'i's leadership at the World Conservation Congress and beyond.

ichiyama2-Brandon

**LATE**

**From:** mailinglist@capitol.hawaii.gov  
**Sent:** Monday, February 15, 2016 10:55 PM  
**To:** HEDtestimony  
**Cc:** maggieh@hawaii.edu  
**Subject:** \*Submitted testimony for HB2240 on Feb 16, 2016 14:01PM\*

**HB2240**

Submitted on: 2/15/2016

Testimony for HED on Feb 16, 2016 14:01PM in Conference Room 309

<b>Submitted By</b>	<b>Organization</b>	<b>Testifier Position</b>	<b>Present at Hearing</b>
Maggie Hinshaw	Individual	Support	No

Comments:

Please note that testimony submitted less than 24 hours prior to the hearing, improperly identified, or directed to the incorrect office, may not be posted online or distributed to the committee prior to the convening of the public hearing.

Do not reply to this email. This inbox is not monitored. For assistance please email [webmaster@capitol.hawaii.gov](mailto:webmaster@capitol.hawaii.gov)



ichiyama2-Brandon

**LATE**

**From:** mailinglist@capitol.hawaii.gov  
**Sent:** Tuesday, February 16, 2016 10:44 AM  
**To:** HEDtestimony  
**Cc:** doorae@hawaii.edu  
**Subject:** \*Submitted testimony for HB2240 on Feb 16, 2016 14:01PM\*

**Follow Up Flag:** Follow up  
**Flag Status:** Flagged

**HB2240**

Submitted on: 2/16/2016

Testimony for HED on Feb 16, 2016 14:01PM in Conference Room 309

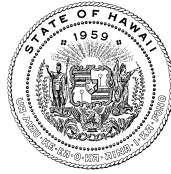
Submitted By	Organization	Testifier Position	Present at Hearing
doorae shin	Kōkua Hawai'i Foundation	Support	No

Comments:

Please note that testimony submitted less than 24 hours prior to the hearing, improperly identified, or directed to the incorrect office, may not be posted online or distributed to the committee prior to the convening of the public hearing.

Do not reply to this email. This inbox is not monitored. For assistance please email [webmaster@capitol.hawaii.gov](mailto:webmaster@capitol.hawaii.gov)

DAVID Y. IGE  
GOVERNOR



WRITTEN ONLY

WESLEY K. MACHIDA  
DIRECTOR

RODERICK K. BECKER  
DEPUTY DIRECTOR

EMPLOYEES' RETIREMENT SYSTEM  
HAWAII EMPLOYER-UNION HEALTH BENEFITS TRUST FUND  
OFFICE OF THE PUBLIC DEFENDER

**STATE OF HAWAII  
DEPARTMENT OF BUDGET AND FINANCE**

P.O. BOX 150  
HONOLULU, HAWAII 96810-0150

ADMINISTRATIVE AND RESEARCH OFFICE  
BUDGET, PROGRAM PLANNING AND  
MANAGEMENT DIVISION  
FINANCIAL ADMINISTRATION DIVISION  
OFFICE OF FEDERAL AWARDS MANAGEMENT (OFAM)

**TESTIMONY BY WESLEY K. MACHIDA  
DIRECTOR, DEPARTMENT OF BUDGET AND FINANCE  
TO THE HOUSE COMMITTEE ON HIGHER EDUCATION  
ON  
HOUSE BILL NO. 2240**

February 16, 2016  
2:01 p.m.

**RELATING TO ENERGY AT THE UNIVERSITY OF HAWAII**

House Bill No. 2240 establishes the University of Hawaii Green Special Fund to help the University of Hawaii (UH) reduce energy consumption and costs. The special fund would generate revenues through savings from energy conservation measures, legislative appropriations, rebates, private contributions, and investment earnings. The bill does not contain an appropriation for the new fund that would be used to support energy efficiency and sustainability projects and services.

The Department of Budget and Finance takes no position on energy efficiency and renewable energy projects at UH. As a matter of general policy, the department does not support the creation of special funds which do not meet the requirements of Section 37-52.3, HRS. Special funds should: 1) serve a need as demonstrated by the purpose, scope of work and an explanation why the program cannot be implemented successfully under the general fund appropriation process; 2) reflect a clear nexus between the benefits sought and charges made upon the users or beneficiaries or a clear link between the program and the sources of revenue; 3) provide an appropriate means of financing for the program or activity; and 4) demonstrate the capacity to be financially self-sustaining. In regards to this bill, it is difficult to determine whether the special fund meets the criteria to establish a special fund.