Senate Committee on Higher Education and

Senate Committee on Agriculture and Environment Tuesday, February 11, 2020 at 3:00 p.m.

By

Nicholas Comerford

Dean, College of Tropical Agriculture and Human Resources

And

Michael Bruno

Provost

University of Hawai'i at Mānoa

Testimony Presented Before the

SB 2784 – RELATING TO AGRICULTURE

Chairs Kim and Gabbard, Vice Chairs Kidani and Ruderman, and members of the Senate Committee on Higher Education and Senate Committee on Agriculture and Environment:

Thank you for the opportunity to testify in <u>support</u> of SB 2784 relating to agriculture and ornamental ginger which appropriates funding to the University of Hawai'i College of Tropical Agriculture and Human Resources (CTAHR) for statewide research and prevention of the spread of ornamental ginger pathogens. CTAHR respectfully provides the following information to substantiate our position.

This bill is one of three (3) addressing biosecurity in the ornamental/landscape industry and is an example of the biosecurity issues facing agriculture in Hawai'i. Ornamental ginger is a valued plant that can be used as a shrub or as a cut flower. CTAHR scientists have been able to identify three different viruses and one fungal pathogen that are infecting ornamental ginger. In addition, the Hawai'i Department of Agriculture scientists have identified the presence of fourteen additional pathogens. At this time, it is not known which agent(s) is/are the primary cause of the decline, and which are secondary pathogens infecting a weakened plant.

Research on the disease and survey of its extent continue to be needed. Biosecurity issues like this constantly occur. We never know when they will occur, what will be the scope of the problem, what may be the cause of the problem, and what will be the resulting solution. CTAHR's budget within UHM is not equipped to consistently address such issues. While we have the expertise in both research and extension, the funding is often unavailable.

Thank you for the opportunity to submit testimony in <u>support</u> this bill provided that its passage is in addition to and does not replace or adversely impact priorities in the University of Hawai'i as indicated in our BOR Approved Budget.

DAVID Y. IGE Governor

JOSH GREEN Lt. Governor



PHYLLIS SHIMABUKURO-GEISER Chairperson, Board of Agriculture

MORRIS M. ATTA
Deputy to the Chairperson

State of Hawaii **DEPARTMENT OF AGRICULTURE**

1428 South King Street Honolulu, Hawaii 96814-2512 Phone: (808) 973-9600 FAX: (808) 973-9613

TESTIMONY OF PHYLLIS SHIMABUKURO-GEISER CHAIRPERSON, BOARD OF AGRICULTURE

BEFORE THE SENATE COMMITTEES ON HIGHER EDUCATION AND ON AGRICULTURE AND ENVIRONMENT

FEBRUARY 11, 2020 3:00 P.M. CONFERENCE ROOM 229

SENATE BILL NO. 2784 RELATING TO AGRICULTURE

Chairperson Kim, Chairperson Gabbard, and Members of the Committees:

Thank you for the opportunity to testify on Senate Bill 2784, relating to agriculture. The bill appropriates funds from the general fund for fiscal year 2020-2021 to be expended by the University of Hawai'i College of Tropical Agriculture and Human Resources for statewide research and prevention of the spread of ornamental ginger pathogens. The Department supports the intent of this measure.

Invasive species are a primary threat to Hawai'i's agriculture, environment, and economy. Funding for research on invasive species, such as ornamental ginger pathogens, is critical to ensure that appropriate responses can be developed which mitigate the negative impacts on the State's agriculture, environment, and economy.

Thank you for the opportunity to testify on this measure.



Board of Directors 2018 - 2020

TESTIMONY FROM THE HAWAII CROP IMPROVEMENT ASSOCIATION

President Joshua Uyehara

In Support of SB2784 RELATING TO AGRICULTURE

Vice-President Warren Mayberry Senate Committee on Higher Education Senate Committee on Agriculture and Environment

Tuesday, 02-11-20 at 3:00PM Senate conference room 229

Secretary Dawn Bicoy

Chair Kim, Chair Gabbard, Vice-Chair Kidani, Vice-Chair Ruderman, and members of the committee:

Treasurer Laurie Yoshida

The Hawaii Crop Improvement Association (HCIA) is in support of SB2784, which makes an appropriation to the University of Hawaii College of Tropical Agriculture and Human Resources for research and prevention of the spread of ornamental ginger pathogens.

Directors-at-Large Alan Takemoto Leslie Campaniano Michelle Starke Joshua Uyehara Warren Mayberry

The decline of ornamental ginger on Oahu for the past 10-plus years due to viruses, bacteria or fungi is extremely concerning and detrimental to agriculture in Hawaii. The disease is causing wilting and stunting of the plants. Ginger producers have not only had to excavate their lands but there is concern among neighboring farmers and off-island clientele about the spread of the unknown pathogens.

President Emeritus Alan Takemoto

> Research is needed to identify the cause of the disease and to devise strategies to mitigate the potential spread of ornamental ginger pathogens and to ensure the long-term sustainability of local ornamental and landscape production industries.

Please vote in support of SB2784 to fund this important statewide research. Mahalo for your time and consideration.

Respectfully,

Emmanuel Zibakalam

Program Director, Hawaii Crop Improvement Association

The Hawaii Crop Improvement Association is a Hawaii-based non-profit organization that promotes modern agriculture to help farmers and communities succeed. Through education, collaboration, and advocacy, we work to ensure a safe and sustainable food supply, support responsible farming practices, and build a healthy economy.



February 3, 2020

Senator Donna Mercado Kim, Chair Senator Michelle N. Kidani, Vice Chair Senate Committee on Higher Education

Senator Mike Gabbard, Chair Senator Russell E. Ruderman, Vice Chair Senate Committee on Agriculture and Environment

Testimony in Support of SB 2784, Relating to the University of Hawaii College of Tropical Agriculture and Human Resources (UHCTAHR) (Appropriates funds to UHCTAHR for research and prevention of the spread of ornamental ginger pathogens.)

Tuesday, February 11, 2020, 3:00 p.m., in Conference Room 229

The Land Use Research Foundation of Hawaii (LURF) is a private, non-profit research and trade association whose members include major Hawaii landowners, developers and utility companies. LURF's mission is to advocate for reasonable, rational and equitable land use planning, legislation and regulations that encourage well-planned economic growth and development, while safeguarding Hawaii's significant natural and cultural resources, and public health and safety.

LURF appreciates the opportunity to express its **support of SB 2784.**

SB 2784. This bill proposes to make an appropriation to the UHCTAHR for statewide research of pathogens affecting ornamental ginger and prevention of pathogen spread.

LURF's Position. Invasive species such as insects, disease-bearing organisms, snakes, weeds, and other pests pose the greatest threat to Hawaii's economy, tourism, agriculture, the natural environment, native species and to the health and lifestyle of Hawaii's people.

Invasive species already cause millions of dollars in crop losses, the extinction of native species, the destruction of native wet, moist and dry land forests, and the spread of disease, but even more harmful viral, fungal and unidentified bacterial pathogens such as the unknown pathogen causing devastating crop decline in ornamental ginger in

Senate Committee on Higher Education Senate Committee on Agriculture and Environment February 3, 2020 Page 2

windward Oahu, now threaten to invade all of the Hawaiian Islands and wreak further damage.

Despite efforts by the UHCTAHR and the Department of Agriculture to address this critical situation, more research and a multi-agency outreach approach is necessary to avoid further damage to the profitability and long-term sustainability of local ornamental flora and landscape production industries.

For the above reasons, LURF **supports SB 2784** and respectfully urges your favorable consideration.

Thank you for the opportunity to present testimony regarding this matter.



P.O. Box 253, Kunia, Hawai'i 96759 Phone: (808) 848-2074; Fax: (808) 848-1921 e-mail info@hfbf.org; www.hfbf.org

February 11, 2020

HEARING BEFORE THE SENATE COMMITTEE ON HIGHER EDUCATION SENATE COMMITTEE ON AGRICULTURE AND ENVIRONMENT

TESTIMONY ON SB 2784 RELATING TO AGRICULTURE

Room 229 3:00 PM

Aloha Chairs Kim and Gabbard, Vice Chairs Kidani and Ruderman, and Members of the Committees:

I am Brian Miyamoto, Executive Director of the Hawaii Farm Bureau (HFB). Organized since 1948, the HFB is comprised of 1,800 farm family members statewide, and serves as Hawaii's voice of agriculture to protect, advocate and advance the social, economic and educational interests of our diverse agricultural community.

The Hawaii Farm Bureau strongly supports SB 2784, which makes an appropriation to the University of Hawaii College of Tropical Agriculture and Human Resources for research and prevention of the spread of ornamental ginger pathogens.

Commercial production of ornamental ginger has been on the decline for the past 10 years on Oahu. Red ginger growers in Windward Oahu have recently experienced a further decline in the growth of their ornamental red ginger plant production due to a variety of unknown viruses and fungi. CTAHR discovered that there are 3 plant viruses affecting ginger production (banana bract mosaic virus (BBrMV), canna yellow mottle virus (CaYMV), and banana streak virus (BSV) and at least one fungal pathogen (*marasmus*) that attributes to crop decline and death. At this time, CTAHR does not know which pathogen is the causal agent of the new and devastating crop decline on ornamental ginger in Windward Oahu.

Producers in the affected areas are excavating their lands as they can no longer economically produce ornamental ginger in these areas. Neighboring farmers and off-island customers are concerned about the spread of the pathogens (viral, fungal and unidentified bacterial). Reports of crop decline which originally started in the Kahaluu area of Oahu has spread to surrounding areas such as Waihole and Waikane Valley.

Research funding is necessary for growers and researchers to continue their efforts in finding a solution and the cause of the decline in red ornamental ginger. Funding is also needed for a statewide awareness and outreach effort to prevent further spread of the virus problem.

Thank you for the opportunity to testify on this important subject.



EAST OAHU COUNTY FARM BUREAU

910 CALIFORNIA AVE., WAHIAWA, HI 96786

February 8, 2020

Senator Donna Mercado Kim, Chair, and Senator Michelle N. Kidani, Vice Chair Senate Committee on Higher Education
Senator Mike Gabbard, Chair, and Senator Russell E. Ruderman, Vice Chair Senate Committee on Agriculture and Environment
State Capitol, 415 S. Beretania St.
Honolulu, Hawai'i 96813

Dear Chairs Kim and Gabbard, Vice Chairs Kidani and Ruderman, and Members of the Committees,

The East O'ahu County Farm Bureau, which represents approximately 420 farmers and supporters of agriculture from Waimanalo to Kahuku, **strongly supports SB 2784**, "Relating to Agriculture," which would provide funding for CTAHR for research and prevention of the spread of ornamental ginger pathogens.

During the last few years, an emerging disease of red ginger has devastated fields of this valuable ornamental plant in Windward Oʻahu. The disease causes wilting and stunting of the affected plants. Observations by CTAHR extension personnel suggest that the disease is caused by some combination of pathogens, possibly including viruses, bacteria, and/or fungi. CTAHR has used inhouse funds to begin preliminary studies, primarily identifying the viruses present in affected plants, in an effort to determine the cause and prevent the spread of the disease. More funding is needed to extend and complete these studies. In the meantime, ornamental growers elsewhere on Oʻahu and on the other Hawaiian islands are concerned that, like many other plant diseases and pests, the new disease will spread to their farms.

We therefore respectfully request that your committee approve the appropriation proposed by SB 2784. Thank you for the opportunity to testify on this important matter.

Sincerely,

Frederick M. Mencher for Grant Hamachi, President

East O'ahu County Farm Bureau

Arederick M. Mencher

<u>SB-2784</u> Submitted on: 2/8/2020 5:22:57 AM

Testimony for HRE on 2/11/2020 3:00:00 PM

Submitted By	Organization	Testifier Position	Present at Hearing
Nicole K Galase	Testifying for Hawaii Cattlemen's Council	Support	No

<u>SB-2784</u> Submitted on: 2/10/2020 11:57:23 AM

Testimony for HRE on 2/11/2020 3:00:00 PM

Submitted By	Organization	Testifier Position	Present at Hearing
Warren Watanabe	Testifying for Maui County Farm Bureau	Support	No

<u>SB-2784</u> Submitted on: 2/4/2020 12:32:42 AM

Testimony for HRE on 2/11/2020 3:00:00 PM

Submitted By	Organization	Testifier Position	Present at Hearing
Jennifer Azuma Chrupalyk	Individual	Support	No

<u>SB-2784</u> Submitted on: 2/6/2020 2:58:11 PM

Testimony for HRE on 2/11/2020 3:00:00 PM

Submitted By	Organization	Testifier Position	Present at Hearing
J Ashman	Individual	Support	No

<u>SB-2784</u>

Submitted on: 2/9/2020 4:28:55 PM

Testimony for HRE on 2/11/2020 3:00:00 PM

Submitted By	Submitted By	Organization	Testifier Position	
	Kelvin Sewake	Individual	Support	No

Comments:

Dear Committee Members:

Aloha! I strongly support SB 2784 to address ornamental ginger diseases. As a former Extension Agent with UH Manoa's CTAHR, I was responsible for assisting the floriculture industry. In working with that industry for 26 years, ornamental ginger diseases were a big concern to farmers causing much damage to crops, and without having adequate control measures to mitigate it. This bill will definitely assist the ornamental ginger farmers. Please consider supporting it! Mahalo!

From: AEN Testimony
To: Nancy Bernal

Subject: FW: I support SB2784

Date: Tuesday, February 11, 2020 10:29:26 AM

----Original Message----

From: Russell Galanti < rcgalanti@gmail.com> Sent: Monday, February 10, 2020 11:24 AM

To: AEN Testimony <AENTestimony@capitol.hawaii.gov>

Subject: I support SB2784

Dear Chairman Gabbard,

Aloha Chair Kim and Gabbard, Vice-Chair Kidani and Ruderman, and members of the committee,

I support SB2784, which makes an appropriation to the University of Hawaii College of Tropical Agriculture and Human Resources for research and prevention of the spread of ornamental ginger pathogens.

I have been statewide surveying for the ginger disease and assessing the impact. EVERY ginger we have samples has at least one of the pathogens related to the disease, from Kauai to Big Island. This is a serious issue, more than 1/3 of the ginger farmers in the state are no longer producing ginger since the first reports of the disease. No national grant agency will fund a research project for a flower that cannot be grown outside of the tropics. Ginger is an iconic flower for Hawaii and has more economic and cultural value than agricultural reports tend to show. Of all of the ginger farms on Oahu that I have visited, only one is still producing ginger at a commercial scale.

This money is necessary to fund a researcher to finish pathogenicity studies and determine which of the many pathogens that have been found are the causal agent. The money will also be used to produce pathogen free gingers for reintroduction, to get farmers started clean again.

If no money is allotted for this issue, the future of the ginger industry is most likely going to be a slow decline and eventual loss of the industry entirely. Even gingers in downtown Honolulu have the disease and eventually red ginger will be a rare site indeed.

Sincerely,

Russell Galanti PO Box 253 Kunia, HI 96759 rcgalanti@gmail.com

SB 2784 – form letter in support

- 1. Kevin Mulkern
- 2. Glenn Toyama
- 3. Ann Fontes
- 4. Christine Brammer
- 5. Randy Cabral
- 6. Sani Kato-Klutke
- 7. Robert Paull

Dear Chairman Gabbard,

Aloha Chair Kim and Gabbard, Vice-Chair Kidani and Ruderman, and members of the committee,

I support SB2784, which makes an appropriation to the University of Hawaii College of Tropical Agriculture and Human Resources for research and prevention of the spread of ornamental ginger pathogens.

In recent years, the production of ornamental red ginger on Oahu has been hit hard by a new disease that causes wilting and stunting of the plants. If the cause of the disease is not identified, the disease will continue to devastate red ginger production on Oahu and may spread to other islands. CTAHR has funded preliminary studies, but more funding is needed to identify the cause of the disease, which may involve viruses, bacteria, and/or fungi, and to devise mitigation strategies.

Thank you for the opportunity to submit testimony.

Mahalo!