

DAVID Y. IGE
GOVERNOR OF
HAWAII



**STATE OF HAWAII
DEPARTMENT OF LAND AND NATURAL RESOURCES**

POST OFFICE BOX 621
HONOLULU, HAWAII 96809

**Testimony of
SUZANNE D. CASE
Chairperson**

**Before the House Committee on
HEALTH**

**Thursday, February 7, 2019
8:30 AM
State Capitol, Conference Room 329**

**In consideration of
HOUSE BILL 1546
RELATING TO ENVIRONMENTAL PROTECTION**

House Bill 1546 proposes to provide funds to the University of Hawaii (UH) to scale up research, coordinate with appropriate state agencies, and develop a plan to be implemented for the eradication of mosquitoes in the State. **The Department of Land and Natural Resources (Department) supports this measure, provided that its passage does not replace or adversely impact priorities indicated in the Executive Budget request, and offers the following comments.**

Mosquitoes are non-native to Hawaii, and vector diseases, which threaten public health as well as native wildlife. In particular, the Southern house mosquito (*Culex quinquefasciatus*) is widespread across the State and is a vector for avian malaria. Hawaii's native birds are particularly susceptible to this disease and have seen precipitous declines in population size since the introduction of mosquitoes. There are several additional mosquito species in Hawaii in the *Aedes* genus, which are vectors of human diseases, including dengue, Zika, and chikungunya.

The Department supports the overall concept of landscape-scale mosquito control in Hawaii and is currently working with partners on a non-genetic tool that uses a bacteria called *Wolbachia* to induce a "birth control" effect in populations of *Culex* mosquitoes. Such technology is already being applied elsewhere in the US and internationally to suppress populations of mosquitoes that vector diseases. This tool is not likely to lead to eradication of mosquitoes from the State, but would provide a safe and effective tool for localized population suppression.

The Department also supports UH conducting research into genetic tools that may be used for landscape-scale mosquito control. There are a variety of genetic tools being researched and

SUZANNE D. CASE
CHAIRPERSON
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DEPUTY DIRECTOR - WATER

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BOATING AND OCEAN RECREATION
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CONSERVATION AND COASTAL LANDS
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KAHOOLAWE ISLAND RESERVE COMMISSION
LAND
STATE PARKS

developed, and several approaches may be necessary to achieve localized suppression or, potentially, eradication of mosquitoes from the State. The following addition is suggested to Section 2 (a).

“The University of Hawaii shall scale up research, coordinate with appropriate state agencies, and develop a plan that assesses the variety of genetic tools available and identifies options to be implemented for the eradication of mosquitoes in the State.”

The Department notes that because mosquitoes are not native to Hawaii, there are no anticipated negative impacts from the eradication of mosquitoes within the State.

Thank you for the opportunity to comment on this measure.



UNIVERSITY OF HAWAII SYSTEM

Legislative Testimony

Testimony Presented Before the
House Committee on Health
February 7, 2019 at 8:30 a.m.

By

Kenneth Kaneshiro

Program Director, Center for Conservation Research & Training
Pacific Biosciences Research Center
School of Ocean, Earth Sciences & Technology

And

Michael Bruno

Interim Vice Chancellor for Academic Affairs
Vice Chancellor for Research
University of Hawai'i at Mānoa

HB 1546 – RELATING TO ENVIRONMENTAL PROTECTION

Chair Mizuno, Vice Chair Kobayashi and Members of the Committee:

Thank you for the opportunity to provide testimony in support of HB 1546 which requires the University of Hawai'i to develop a plan to be implemented for the state wide eradication of mosquitos.

To provide you some background, during the 2016 IUCN World Conservation Congress held in Honolulu, the University of Hawai'i convened a "To Restore a Mosquito-Free Hawai'i Workshop" attended by some of the top mosquito researchers worldwide to discuss the feasibility of eradicating three mosquito species from the state. It was determined that by taking a systems thinking approach and addressing all aspects of the biology, ecology, behavior, genetics, etc. of the three mosquito species in question, *Aedes aegypti*, *Aedes albopictus*, and *Culex quinquefasciatus*, eradication of these mosquito species is certainly feasible. It would be possible to bring a few of the Workshop participants back to Hawai'i to assist in developing a strategic plan for implementing a mosquito eradication program in Hawai'i.

UH supports HB 1546 as long as it is in addition to the University's Biennium Budget request.

Thank you for the opportunity to testify on this measure.

HB-1546

Submitted on: 2/6/2019 8:13:09 AM

Testimony for HLT on 2/7/2019 8:30:00 AM

Submitted By	Organization	Testifier Position	Present at Hearing
Melodie Aduja	O`ahu County Committee on Legislative Priorities of the Democratic Party of Hawai`i	Support	No

Comments:

LATE

HB-1546

Submitted on: 2/6/2019 5:28:41 PM

Testimony for HLT on 2/7/2019 8:30:00 AM

Submitted By	Organization	Testifier Position	Present at Hearing
Andrea Quinn	Individual	Oppose	No

Comments:

Dear Honorable Committee Members:

Please oppose HB1546.

Mosquitos are important to the ecosystem in that they feed birds and bats, many of which are pollinators.

Thank you for the opportunity to present my testimony.

Sincerely,

Andrea Quinn

HB-1546

Submitted on: 2/4/2019 6:52:26 PM

Testimony for HLT on 2/7/2019 8:30:00 AM

Submitted By	Organization	Testifier Position	Present at Hearing
Brian Santiago	Individual	Support	No

Comments:

About time. Kill 'em all, they spread disease.