

STATE OF HAWAII
DEPARTMENT OF HEALTH
P. O. Box 3378
Honolulu, HI 96801-3378
doh.testimony@doh.hawaii.gov

Testimony in SUPPORT of SB3099
RELATING TO CLIMATE CHANGE.

SENATOR MIKE GABBARD, CHAIR
SENATE COMMITTEE ON AGRICULTURE AND ENVIRONMENT

SENATOR KAIALI'I KAHELE, CHAIR
SENATE COMMITTEE ON WATER AND LAND

Hearing Date: February 7, 2020

Room Number: 224

1 **Fiscal Implications:** \$750,000 general fund appropriation for procurement of consultants.

2 **Department Testimony:** The Department of Health (DOH) acknowledges the seriousness of
3 the findings of Sea Level Rise Vulnerability and Adaptation Report, in particular the discussion
4 on managed retreat for major shoreline infrastructure. Given the years-long process for state and
5 federal permitting, implementation of the Hawai'i Climate Change Mitigation and Adaptation
6 Commission is prudent public policy.

7 Regarding Bill Sections 26 and 27, DOH will require additional resources to implement an
8 accelerated review initiative to identify sites or geographic areas with the highest probability of
9 large or catastrophic failures or releases associated with increased coastal flooding due to sea
10 level rise. This is because the current demands on program staff are high. In addition to day-to-
11 day regulatory activities, staff are engaged in major mitigation and sustainability initiatives such
12 as reducing plastic waste, cesspool conversion, and re-assessment of existing risk-based site
13 closures to determine where additional actions will be needed to prevent spread of contamination
14 with rising sea levels.

15 For onsite wastewater systems alone, there are at least 120,000 sites in scope, as well as
16 thousands of other underground storage tanks and hazardous materials storage sites, that makes
17 additional resources absolutely necessary.

1 In addition, the department requests more time to submit findings but is willing to produce
2 interim reports for the Legislature to monitor progress. Thank you for the opportunity to testify.

3 **Offered Amendments:**

4 Standard appropriations wording for the Department of Health for \$750,000 is respectfully
5 requested.

6 Page 61, From Line 8

7 "(c) The department of health shall submit interim
8 progress reports to the legislature no later than twenty days
9 prior to the convening of the regular sessions of 2021, 2022,
10 and 2023, and a final report of its findings and
11 recommendations, including any proposed legislation, to the
12 legislature no later than twenty days prior to the convening of
13 the regular session of [~~2022.~~] 2024."

14

OFFICE OF INFORMATION PRACTICES

STATE OF HAWAII
NO. 1 CAPITOL DISTRICT BUILDING
250 SOUTH HOTEL STREET, SUITE 107
HONOLULU, HAWAII 96813
TELEPHONE: 808-586-1400 FAX: 808-586-1412
EMAIL: oip@hawaii.gov

To: Senate Committees on Agriculture and Environment
and on Water and Land

From: Cheryl Kakazu Park, Director

Date: February 7, 2020, 1:30 p.m.
State Capitol, Conference Room 224

Re: Testimony on S.B. No. 3099
Relating to Climate Change

Thank you for the opportunity to submit testimony on this bill, which would implement various recommendations made by the Climate Change Mitigation and Adaptation Commission. The Office of Information Practices (OIP) takes no position on the substance of this bill, but offers a comment regarding the proposed Standing Committee on Sea Level Rise and Managed Retreat to be created under §225M-A(d) (at bill pages 19-20).

The Standing Committee as proposed appears to meet the definition of a “board” subject to the Sunshine Law, part I of chapter 92. However, OIP notes that its membership will consist entirely of “relevant state or county officials” and its work is likely to be largely technical in nature, as it is tasked with conducting “detailed risk analyses of urban areas vulnerable to sea level rise.” The Standing Committee thus appears intended to be an internal governmental working group crunching numbers to create data-driven findings and recommendations, rather than a board discussing and deciding on the “formation and conduct of public policy”

of the sort the Sunshine Law was intended to open to public participation and scrutiny. While OIP has no objection to the Sunshine Law's application to such a group, OIP recognizes that following the Sunshine Law's requirements may be problematic for a group of government employees engaged in creating a set of detailed and data-driven risk analyses. OIP is therefore testifying to ensure the Committees are aware that the Standing Committee as proposed is likely to be subject to the Sunshine Law's requirements. If the Committees did not intend the Standing Committee to be required to follow the Sunshine Law, OIP would recommend that they clarify its status by adding the following statement to proposed subsection (d): "The committee shall be exempt from part I of chapter 92."

Thank you for considering OIP's comments.



STATE OF HAWAII
HAWAII CLIMATE CHANGE MITIGATION & ADAPTATION
COMMISSION
POST OFFICE BOX 621
HONOLULU, HAWAII 96809

Testimony of
Anukriti Hittle
Coordinator, Hawaii Climate Change Mitigation and Adaptation Commission

Before the Senate Committees on
AGRICULTURE and ENVIRONMENT
and
WATER and LAND

Friday, February 7, 2020
1:30 PM
State Capitol, Conference Room 224

In support of
SENATE BILL 3099
RELATING TO CLIMATE CHANGE

Senate Bill 3099 proposes to implement the recommendations of the Hawaii Sea Level Rise Vulnerability and Adaptation Report issued by the Hawaii Climate Change Mitigation and Adaptation Commission. **On behalf of the Hawaii Climate Change Mitigation and Adaptation Commission (Commission) I offer the following comments in support of this measure.**

The Hawaii Climate Change Mitigation and Adaptation Commission “recognizes the urgency of climate threats and the need to act quickly. It promotes ambitious, climate-neutral, culturally responsible strategies for climate change adaptation and mitigation in a manner that is clean, equitable and resilient.” The Commission, established by Act 32 SLH 2017 to uphold the United States’ pledges under the Paris Agreement, is the coordinating body for policies on climate change mitigation and adaptation for the state. It is a high-level multi-jurisdictional body that guides the priorities of the state’s climate response. Co-chaired by DLNR and Office of Planning, it consists of 20 members—chairs of four legislative committees, and executive department heads at the county and state levels.

The Commission has established dealing with sea level rise and its impacts as one of its two focuses, and issued a statement on priority issues. This measure acts on the Commission’s priority recommendations, and is a crucial component of Hawaii’s adaptation to the impacts of sea level rise.

Co-Chairs:
Chair, DLNR
Director, Office of Planning

Commissioners:
Chair, Senate AEN
Chair, Senate WTL
Chair, House EEP
Chair, House WTH
Chairperson, HTA
Chairperson, DOA
CEO, OHA
Chairperson, DHHL
Director, DBEDT
Director, DOT
Director, DOH
Chairperson, DOE
Director, C+C DPP
Director, Maui DP
Director, Hawai'i DP
Director, Kaua'i DP
The Adjutant General
Manager, CZM

One of the main purposes of establishing the Commission was to help align legislative and executive actions to facilitate implementation of sea level rise adaptation strategies at the state and county levels. On behalf of the Commission, I greatly appreciate the Legislature's eagerness to implement the Sea Level Rise Report's recommendations through new legislation such as in SB3099.

Thank you for the opportunity to comment in support of this measure.

BOARD OF WATER SUPPLY

CITY AND COUNTY OF HONOLULU
630 SOUTH BERETANIA STREET
HONOLULU, HI 96843
www.boardofwatersupply.com



February 7, 2020

KIRK CALDWELL, MAYOR

BRYAN P. ANDAYA, Chair
KAPUA SPROAT, Vice Chair
KAY C. MATSUI
RAY C. SOON
MAX J. SWORD

ROSS S. SASAMURA, Ex-Officio
JADE T. BUTAY, Ex-Officio

ERNEST Y. W. LAU, P.E.
Manager and Chief Engineer

ELLEN E. KITAMURA, P.E.
Deputy Manager and Chief Engineer 

The Honorable Mike Gabbard, Chair
and Members
Committee on Agriculture and Environment
State Senate
State Capitol, Room 224
Honolulu, Hawaii 96813

The Honorable Kaiali'i Kahele, Chair
and Members
Committee on Water and Land
State Senate
State Capitol, Room 224
Honolulu, Hawaii 96813

Dear Chairs Gabbard, Kahele and Members:

Subject: Senate Bill No. 3099, Relating to Climate Change

The Honolulu Board of Water Supply (BWS) supports the intent of Senate Bill (SB) 3099. This bill requires the applicable state and county agencies to implement recommendations of the Hawai'i Sea Level Rise Vulnerability and Adaptation Report (Report). The BWS appreciates the State Legislature's leadership in climate change and sea level rise mitigation and adaptation. BWS is actively working with the City's Office of Climate Change, Sustainability and Resiliency (OCCSR) and the Honolulu Climate Change Commission on the implementation of various components of the Report.

Based on the recommendations of OCCSR and the Honolulu Climate Change Commission, the Mayor of the City and County of Honolulu executed the Honolulu Climate Change and Sea Level Rise Directive 18-02 on July 16, 2018, which directs all City agencies to incorporate the findings of the Report into their long-range plans and Capital Improvement Programs (CIP).

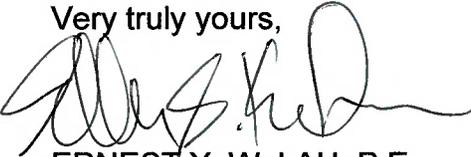
The BWS recognizes that climate change and sea level rise will impact the sustainability of Oahu's water resources and coastal water infrastructure. As such, vulnerability assessments and adaptation measures needed to be prioritized and implemented. BWS recently completed its vulnerability assessment entitled Impacts of Climate Change on Honolulu Water Supplies & Planning Strategies for Mitigation (2019) and have

The Honorable Mike Gabbard, Chair
and Members
The Honorable Kaiali`i Kahele, Chair
and Members
February 7, 2020
Page 2

incorporated the findings into our long-range CIP. The expansion of the Honouliuli Water Recycling Facility (completed in December 2019) and the proposed Kalaeloa Seawater Desalination Project are among other BWS infrastructure resilience projects. Climate change and sea level rise adaptation is currently being incorporated in our regional watershed management plans for South Oahu (Ewa, Central Oahu, Primary Urban Center and East Honolulu).

<https://www.boardofwatersupply.com/bws/media/files/water-research-foundation-4637-climate-change-impacts-on-honolulu-water-supplies-2019.pdf>

Thank you for your consideration of our testimony in support of SB 3099.

Very truly yours,

for ERNEST Y. W. LAU, P.E.
Manager and Chief Engineer



**OFFICE OF PLANNING
STATE OF HAWAII**

235 South Beretania Street, 6th Floor, Honolulu, Hawaii 96813
Mailing Address: P.O. Box 2359, Honolulu, Hawaii 96804

Telephone: (808) 587-2846
Fax: (808) 587-2824
Web: <http://planning.hawaii.gov/>

DAVID Y. IGE
GOVERNOR

MARY ALICE EVANS
DIRECTOR
OFFICE OF PLANNING

Statement of
MARY ALICE EVANS
Director, Office of Planning
before the
SENATE COMMITTEE ON AGRICULTURE AND THE ENVIRONMENT

SENATE COMMITTEE ON WATER AND LAND

Friday, February 7, 2020

1:30 PM

State Capitol, Conference Room 224

in consideration of
SB 3099
RELATING TO CLIMATE CHANGE.

Chair Gabbard, Chair Kahele, Vice Chair Ruderman, Vice Chair Keith-Agaran, and Members of the Senate Committees.

The Office of Planning (OP) supports SB3099, with comments, which implements the recommendations of the Hawaii Sea Level Rise Vulnerability and Adaptation Report. OP offers comments on the sections of the bill that pertain specifically to the Office of Planning which start on page 16 through line 17, page 23.

Section 10, which amends Chapter 225M, page 17, lines 14 – 17, is a county function which should read, “ (1) Request the counties to...”.

Page 19, lines 15 -21 and page 20, lines 1 through 10, quantifying potential losses for identified urban areas and conducting a cost benefit analysis of mitigating the impacts of sea level rise versus taking no action, requires skills and staffing that are beyond OP’s current capacity.

Page 20, lines 20, 21, and page 21, lines 1 -14, creating a Willing Seller Program, is also beyond OP’s skills and capacity.

Section 11, page 21 – 23, directing OP to develop a financing strategy to address any costs anticipated due to sea level rise will require additional resources.

Thank you for the opportunity to testify on this measure.

SB-3099

Submitted on: 2/4/2020 1:52:51 PM

Testimony for AEN on 2/7/2020 1:30:00 PM

Submitted By	Organization	Testifier Position	Present at Hearing
Dyson Chee	Testifying for Hawaii Youth Climate Coalition	Support	No

Comments:

February 7, 2020

The Honorable Mike Gabbard, Chair
Senate Committee on Agriculture and Environment

The Honorable Kaiuli'i Kahele, Chair
Senate Committee on Water and Land
State Capitol, Room 224
Honolulu, HI 96813

RE: S.B. 3099, Relating to Climate Change

HEARING: Friday, February 7, 2020, at 1:30 p.m.

Aloha Chair Gabard, Chair Kahele and Members of the Joint Committees,

I am Ken Hiraki, Director of Government Affairs, testifying on behalf of the Hawai'i Association of REALTORS® ("HAR"), the voice of real estate in Hawai'i, and its over 10,000 members. HAR **provides comments** on S.B. 3099 which implements the recommendations of the Hawai'i Sea Level Rise Vulnerability and Adaptation Report issued by the Hawai'i Climate Change Mitigation and Adaptation Commission. This measure provides for disclosure for properties within a sea level rise exposure area as officially designated by the Hawaii Climate Change Mitigation and Adaptation Commission.

Under Hawai'i Revised Statutes §508-D, the law imposes a broad obligation upon sellers of residential property to disclose all material facts that are within the knowledge or control of the seller.

HAR would note that the county maps, including identifying the properties by tax map key, should be created first prior to changing the disclosure law. Without maps issued by a government entity, it would place an unreasonable burden upon sellers because the typical seller would not have the capacity or ability to know whether their property is within a "sea level rise exposure area."

Additionally, the Hawaii Climate Change Mitigation and Adaptation Commission is not a government entity. Once the maps are created, the disclosure should be to the maps as provided by said government entity.

Mahalo for the opportunity to testify.

SB-3099

Submitted on: 2/4/2020 10:29:11 PM

Testimony for AEN on 2/7/2020 1:30:00 PM

Submitted By	Organization	Testifier Position	Present at Hearing
Alexandra Kahn	Testifying for Surfrider Oahu	Support	No

Comments:



SB 3099, RELATING TO CLIMATE CHANGE

FEBRUARY 7, 2020 · SENATE AGRICULTURE AND ENVIRONMENT COMMITTEE AND SENATE WATER AND LAND COMMITTEE · CHAIRS SEN. MIKE GABBARD AND SEN. KAIALI'I KAHELE

POSITION: Support.

RATIONALE: IMUAlliance supports SB 3099, relating to climate change, which implements the recommendations of the Hawai'i Sea Level Rise Vulnerability and Adaptation Report issued by the Hawai'i Climate Change Mitigation and Adaptation Commission.

According to a report produced by the Hawai'i Climate Change Mitigation and Adaptation Commission, global sea levels could rise more than three feet by 2100, with more recent projections showing this occurring as early as 2060. In turn, over the next 30 to 70 years, approximately 6,500 structures and 19,800 people statewide will be exposed to chronic flooding.

Additionally, an estimated \$19 billion in economic loss would result from chronic flooding of land and structures located in exposure areas. Finally, approximately 38 miles of coastal roads and 550 cultural sites would be chronically flooded, on top of the 13 miles of beaches that have already been lost on Kaua'i, O'ahu, and Maui to erosion fronting shoreline armoring, like seawalls.

Furthermore, according to research conducted by Michael B. Gerrard from Columbia Law School, modern-day slavery tends to increase after natural disasters or conflicts where large numbers of people are displaced from their homes. In the decades to come, says Gerrard, **climate change will very likely lead to a significant increase in the number of people who are displaced**

and, thus vulnerable, to human trafficking. While the Paris Climate Agreement of 2015 established objectives to limit global temperature increases and several international agreements are aimed at combating modern-day slavery, it is highly uncertain whether they will be adequate to cope with the scale of the problem that is likely to occur as a result of climate change.

As we work to reduce carbon emissions and stave off the worst consequences of climate change, we must begin preparing for the adverse impact of sea level rise on our shores. We are now quantifying the speed at which we must act. We cannot continue to develop the 25,800-acre statewide sea level rise exposure area—one-third of which is designated for urban use—without risking massive structural damage and, potentially, great loss of life.

Therefore, our state should take steps to protect Hawai'i's coastal areas, including by identifying vulnerable public infrastructure and creating plans for mitigating and adapting to the imminent and existential threat of sea level rise. For the sake of our keiki, we cannot afford to wait to solidify strategies to preserve our island home for generations to come.

From: [Ocean Reseach](#)
To: [AEN Testimony](#); [WTL Testimony](#)
Subject: OPPOSITION SB3052
Date: Thursday, February 6, 2020 1:30:14 PM

Aloha Senators,

We oppose SB3052 because it will stop over six years of research that is unique to helping people avoid shark bites. We have studied how the biology, physiology, social behavior, and body language of sharks can be factored in to shark bites. We specifically teach people how this information can be used to avoid a shark bite and we have been successful at helping people to better understand and respond to a shark approach, which has helped to save lives.

We have a collaborative data set of over 62 data variables which we collect and share with international university scholars for unique studies on environmental factors affecting shark behavior and abundance and conservation efforts.

We also have an accredited internship program for students in marine science to earn three units of college credit towards their degree and unique experience working in-water with sharks in a research and ecotourism setting. The program runs year round.

We employ mostly women in marine science and this bill would put them and numerous other biologists, divemasters, and Captains out of a job.

Please defer this bill and please work with us on a different version that supports marine science, conservation, Hawaii residents, student programs, and Hawaii's economy.

From: [ocean designs](#)
To: [AEN Testimony](#); [WTL Testimony](#)
Subject: OPPOSITION to SB3052
Date: Thursday, February 6, 2020 1:19:58 PM

We oppose SB3052 because it threatens to shut down OneOceanDiving which would create a safety hazard because its been almost ten years that people have been going out with them and if they close down people will go out on their own and likely get bit. There is already a market for thousands of people, they run daily and they have a perfect safety record, and they have insurance that covers them for guiding people in open ocean.

We love one ocean diving and we know their team works very hard to make a difference for marine conservation. We feel very safe going out with them and they have taught us so much and helped our work for ocean conservation.

Please rewrite this bill so it doesn't favor cage tours. It seems like this bill was written by the cage tour company if its asking to feed sharks and for cage requirements? That doesn't seem fair.

Mahalo,

Mrs. Lelani Anderson
Designer, My Ocean Designs

From: [Ocean Ramsey](#)
To: [AEN Testimony](#); [WTL Testimony](#)
Subject: Opposition to SB3052 from Save The Sea Turtles International and 501c3 from Haleiwa Hawaii for 20+ years for marine conservation
Date: Thursday, February 6, 2020 1:09:56 PM

Save the sea turtles international is a 501c3 non profit from Haleiwa, Hawaii.

Most of our programs are supported by One Ocean which is threatened by this bill because it is unclear if it will ban their research and dive program.

We work with them for entanglement and educational programs and beach clean ups.

Please change the language of the bill otherwise we believe it will have unintended consequences for public safety and harm conservation efforts for marine life.

Thank you,

Marlu West

From: [Top Dive Hawaii](#)
To: [AEN Testimony](#); [WTL Testimony](#)
Subject: Scuba diving company in opposition of sb3052
Date: Thursday, February 6, 2020 1:56:26 PM

Dear Senators,

I run scuba and snorkeling charters, and I'm concerned that this bill might affect my business. I advertise that we see sharks during our dives and this is a huge attraction of our clientele. We see white tip reef sharks in caves along the shoreline. I also refer people that want to free dive in deep waters with sharks to One ocean diving. I can't support this bill or a band on cageless shark diving.

-Oahu Island Tours

SB-3099

Submitted on: 2/4/2020 6:43:24 PM

Testimony for AEN on 2/7/2020 1:30:00 PM

Submitted By	Organization	Testifier Position	Present at Hearing
Benton Kealii Pang, Ph.D.	Individual	Support	No

Comments:

COMMITTEE ON AGRICULTURE AND ENVIRONMENT, Senator Mike Gabbard, Chair
COMMITTEE ON WATER AND LAND, Senator Kaiali'i Kahele, Chair
HEARING Friday, February 7, 2020 re. **SB3099** (relating to Climate Change)
Testimony of Rick Warshauer, Volcano

Chairmen Gabbard and Kahele and Committee Members,

I appreciate the intent of this bill to refine studies that identify the areas of impact from rising sea level, to further define the areas of inundation and to design the mitigating measures for planned retreat from impacted areas. These need to be initiated soon. The cost will be substantial.

The source fund identified to pay the cost, the Land Conservation Fund (in Ch.171A), is far too small to begin to achieve the task, and its rate of growth is way too slow to sustain it. This fund is already challenged to continue its specified task of State acquisition of land and land rights in very special private lands that are important to residents of the State.

I urge the committees to delete all references to Ch. 171A and to define an alternative source of the considerable funding for the course of actions required in SB3099.

Instead, I urge the committees to establish a new fund, or otherwise earmark monies that are raised for the purposes of this bill. I suggest an amendment that the state assess annual fees on structural developments (greater than a half million dollars in value) that are built on all coastal lands that are projected to be affected by rising sea levels and related storm impacts. By starting soon, such funds could quickly pay for expanded studies and projections, and begin to pay for mitigating measures.

Mahalo for your consideration.

SB-3099

Submitted on: 2/6/2020 9:49:26 PM

Testimony for AEN on 2/7/2020 1:30:00 PM

Submitted By	Organization	Testifier Position	Present at Hearing
Kaitlyn P Jacobs	Individual	Support	No

Comments:

I believe that the climate change mitigation and adaptation committee's recommendations should be followed. The people that do the research day in and day out regarding these serious issues deserve to be listened to. I research marine biology and see every day the changes occurring to our oceans and beaches due to climate driven sea level rise. These changes can be slowed though! Hawaii can be a leader in taking these issues on!