DAVID Y. IGE GOVERNOR OF HAWAII





SUZANNE D. CASE CHAIRPERSON BOARD OF LAND AND NATURAL RESOURCES COMMISSION ON WATER RESOURCE MANAGEMENT

KEKOA KALUHIWA

JEFFREY T. PEARSON P.E. DEPUTY DIRECTOR - WATER

AQUATIC RESOURCES BOATING AND OCEAN RECREATION BUREAU OF CONVEY ANCES COMMISSION ON WATER RESOURCE MANAGEMENT CONSERVATION AND RESOURCES ENFORCEMENT ENGINEERING FORESTRY AND WILDLIFE HISTORIC PRESERVATION KAHOOLAWE ISLAND RESERVE COMMISSION LAND STATE PARKS

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

POST OFFICE BOX 621 HONOLULU, HAWAII 96809

Testimony of SUZANNE D. CASE Chairperson

Before the Senate Committee on WATER AND LAND

Friday, February 3, 2017 2:45 PM State Capitol, Conference Room 224

### In consideration of SENATE BILL 1150 RELATING TO PRESERVING CORAL REEFS

Senate Bill 1150 proposes to prohibit the use or application of sunscreen, sunblock, or cosmetic containing oxybenzone while on a beach or in the ocean. The Department of Land and Natural Resources (Department) appreciates the intent of this measure and offers the following comments.

The Department recognizes the concerns about the presence of oxybenzone in the water and its effects on corals. The Department has questions about how the provisions would be enforced. An enforcement officer would have to observe a person on the beach applying the product and then determine if the product contained oxybenzone.

An informational approach may be an alternative to a regulatory approach to help the public understand the issues of using oxybenzone. While the Department supports the use of sunscreens and similar products for protection from the harmful effects of the sun, the public needs to be better informed so they can make better choices regarding sun protection and reef conservation.

The Department's outreach efforts to the public have included organizing a session at the IUCN conference on the effects and use of oxybenzone, focused one-on-one outreach at the 'Āhihi-Kīna'u Natural Area Reserve, news releases, videos, information on the Department's Division of Aquatic Resources website, distribution of oxybenzone-free sunscreen samples at public events, interaction with partner organizations, and meetings with dermatologists, boat tour operators, and vendors who sell sunscreen to spread the word. These efforts are just the beginning, and we continue to explore other ways to inform the public on this issue.

DAVID Y. IGE GOVERNOR OF HAWAII



VIRGINIA PRESSLER, M.D. DIRECTOR OF HEALTH

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

### Testimony in SUPPORT of S.B. 1150

### **RELATING TO PRESERVING CORAL REEFS**

SENATOR KARL RHOADS, CHAIR SENATE COMMITTEE ON WATER AND LAND

Hearing Date: February 3, 2017 Time: 2:45 p.m. Room Number: 224

1 **Fiscal Implications:** No funding in provided to implement this measure.

2 Department Testimony: S.B. 1150 seeks to prohibit the use and application of products

3 containing oxybenzone while on a beach. We defer to the Department of Land and Natural

4 Resources about the feasibility of implementing a prohibition on the use and application of

5 sunscreen containing oxybenzone by the general public on beaches in Hawaii.

6 The Department of Health is concerned about the release of chemicals, including oxybenzone, 7 from personal care products into the marine environment. Research by local and national coral 8 experts have shown that levels of oxybenzone in the marine environment maybe high enough to 9 pose deleterious effects on coral, and may exacerbate coral bleaching. However, oxybenzone 10 plays an important role in reducing the risk of some forms of skin cancer, so balancing public health protection is a very important consideration. DOH believes more evaluation of the health 11 and environmental impacts of restricting the use of oxybenzone are warranted. In addition, we 12 are not aware of any impending federal or state regulations to remove this chemical from 13 sunscreens. A key concern to be resolved is the availability of safe and effective alternatives, 14 for example, sunscreens containing titanium dioxide and zinc oxide nanoparticles are 15 alternatives to oxybenzone. However, titanium dioxide has been classified as a possible 16 carcinogen when inhaled in high doses. Additionally, when zinc oxide and titanium dioxide 17 18 nanoparticles wash off skin, they enter the aquatic environment, with unknown effects on our 19 tropical marine ecosystems.

20 We support development of effective public education and outreach efforts to inform Hawaii

- 21 beachgoers about steps that they can take to reduce the use of oxybenzone while enjoying our
- beaches in Hawaii. One strategy would be to seek partnerships to develop a pilot study on the
- effectiveness of a voluntary education program to reduce oxybenzone concentrations adjacent to

- 1 corals offshore of a heavily used public beach in Hawaii. In addition, DOH will evaluate the
- 2 emerging science on the toxicity of oxybenzone, including any federal and state efforts to replace
- 3 this chemical with an alternative sunscreen and report back to the legislature next session.
- 4 Thank you for the opportunity to testify on this important measure.
- 5 **Offered Amendments:** None.



# SB1150 RELATING TO PRESERVING CORAL REEFS

Senate Committee on Water and Land

February 3, 2017	2:45 p.m.	Room 224
1 Coldary 5, 2017	2.13 p.m.	

The Office of Hawaiian Affairs (OHA) Beneficiary Advocacy and Empowerment Committee will recommend that the Board of Trustees <u>SUPPORT</u> SB1150, which would mitigate the impacts of oxybenzone on our coral reefs.

Hawai'i's coral reefs and nearshore resources form the bedrock of our islands. Hawai'i's marine environment and natural resources serve as a cultural, socioeconomic, and scientific foundation for these islands. OHA notes that economic studies in 2002 and 2003 found an overall contribution of \$800 million in revenue generated from our coral reefs and coastal resources, with an added recreational, amenity, fishery, biodiversity and educational value of \$364 million per year. A more recent report released in 2011 utilizing "innovative economic survey techniques" found that across U.S. households, the economic value of protecting Hawai'i's nearshore environment could be estimated at <u>\$34</u> <u>billion a year</u>. While our ocean waters clearly hold cultural, spiritual, and biological significance beyond any monetary value, these economic analyses clearly reflect the critical nature of our marine environment to our islands.<sup>1</sup>

This measure represents a small step towards ensuring greater resilience in our coral reefs and nearshore waters. With the overarching threats of climate change and a growing population base, it is incumbent upon the state and its residents to ensure that our foundational nearshore resources are sufficiently resilient, to best withstand the inevitably increasing pressures that will be placed upon them. While oxybenzone is just one of

<sup>&</sup>lt;sup>1</sup> See Carlie S. Weiner, Mark D. Needham, & Paul Wilkinson, <u>Hawaii's real marine life park: interpretation</u> and impacts of commercial marine tourism in the Hawaiian Islands, 12 CURRENT ISSUES IN TOURISM 489, 489-90 (2009) <u>citing</u> P.J. van Beukering & H.S. Cesar, <u>Ecological economic modeling of coral reefs: Evaluating</u> tourist overuse at Hanauma Bay and algae blooms at the Kihei Coast, <u>Hawai'i</u> 58 PAC. SCIENCE 243 (2007); A.M. Friedlander et. al., <u>The state of coral reef ecosystems of the main Hawaiian Islands</u> in THE STATE OF CORAL REEF ECOSYSTEMS IN THE UNITED STATES AND PACIFIC FREELY ASSOCIATED STATES 222-269 (2005), K. DAVIDSON, M. HAMNET, & C. MINATO, ECONOMIC VALUE OF HAWAII'S NEARSHORE REEFS (2003), <u>available at</u> <u>http://nature.forestry.oregonstate.edu/sites/default/files/2009-2%20CIT%20-</u>

<sup>&</sup>lt;u>%20Wiener%20Needham%20Wilkinson%20(2009).pdf</u>; HERMAN CESAR ET. AL, ECONOMIC VALUATION OF THE CORAL REEFS OF HAWAII FINAL REPORT 74 (2002), available at

http://www.coralreef.gov/meeting18/evhcri\_samoa\_2007.pdf; RICHARD C. BISHOP ET. AL., TOTAL ECONOMIC VALUE FOR PROTECTING AND RESTORING HAWAIIAN CORAL REEF ECOSYSTEMS: EXECUTIVE SUMMARY (2011), available at

http://coralreef.noaa.gov/aboutcrcp/news/featuredstories/oct11/hi\_value/resources/protecting\_restoring\_hawa iian\_cre.pdf.

many stressors on our coral reefs, reducing the prevalence of this known chemical threat is a small yet positive step towards ensuring such greater resilience. Notably, this measure may not only directly reduce the impacts of oxybenzone on our most popular nearshore areas, but its passage may also promote greater public awareness of the need to better protect the resources we so substantially rely upon.

Accordingly, OHA urges the Committee to <u>**PASS**</u> SB1150. Thank you for the opportunity to testify on this measure.



TIM VANDEVEER Chair MARIE STRAZAR Vice Chair

MARGARET WILLE SEAN SMITH Legislation Committee Co-Chairs

February 2, 2017

Senator Karl Rhoads, Chair Senator Mike Gabbard, Vice Chair <u>COMMITTEE ON WATER AND LAND</u> February 3, 2017 2:45 p.m. State Capitol Conference Room 224 SB1150 "RELATING TO PRESERVING CORAL REEFS"

### Submitted on Behalf of the Democratic Party of Hawai'i

The Democratic Party of Hawai'i supports SB1150 "RELATING TO PRESERVING CORAL REEFS" which would ban the use of sunscreen and other personal care products containing oxybenzone. The health of our coral reefs is of critical importance to the economic, cultural, and environmental wellbeing of our State. Oxybenzone has a detrimental impact on coral and other aquatic life even in minute amounts, including by lowering the temperature at which coral bleaches. The DPH understands this chemical is not the only threat to our aquatic life, HOWEVER it has a significant harmful impact. We do not have the luxury of ignoring this impact because it may be less convenient. We need to act to protect our marine resources NOW.

Passage of a ban on products containing oxybenzone is one of the Democratic Party of Hawai'i's legislative priorities for the 2017.

Respectfully submitted,

/s/ Tim Vandeveer (tim@hawaiidemocrats.org) Chair of the Democratic Party of Hawai'i /s/ Marie (Dolly) Strazar (hilomds@gmail.com) Vice Chair of the Democratic Party of Hawai'i

/s/ Margaret Wille (margaretwille@mac.com) /s/ Sean Smith (simashang@yahoo.com) Legislative Committee Co-Chairs

From:	mailinglist@capitol.hawaii.gov
Sent:	Tuesday, January 31, 2017 3:46 PM
То:	WTL Testimony
Cc:	rgaffney@pacificboatsales.com
Subject:	Submitted testimony for SB1150 on Feb 3, 2017 14:45PM

Submitted on: 1/31/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	Testifier Position	Present at Hearing
Rick Gaffney	Hawaii Fishing & Boating Association	Support	No

Comments: There is a growing body of peer-reviewed science that confirms that sunscreens containing oxybenzone and several other chemicals have an immensely negative impact on coral. Products containing these deleterious chemicals should not be allowed in Hawaii's near shore waters, especially as they are already suffering from the impacts of global warming, run-off and over-fishing. A bill of this nature is essential to better protecting the reefs of Hawaii so that they in return can protect and feed us, and continue to serve as one of the primary attractions for our tourist industry.

Please note that testimony submitted <u>less than 24 hours prior to the hearing</u>, 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.

From:	mailinglist@capitol.hawaii.gov
Sent:	Wednesday, February 1, 2017 10:52 AM
То:	WTL Testimony
Cc:	cathyg@animalrightshawaii.org
Subject:	Submitted testimony for SB1150 on Feb 3, 2017 14:45PM

Submitted on: 2/1/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	<b>Testifier Position</b>	Present at Hearing
Cathy Goeggel	Animal Rights Hawai'i	Support	Yes

Comments: This is so important and such a simple act that can protect our precious marine resources.

Please note that testimony submitted <u>less than 24 hours prior to the hearing</u>, 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.

From:	mailinglist@capitol.hawaii.gov
Sent:	Wednesday, February 1, 2017 11:01 AM
То:	WTL Testimony
Cc:	hoonanea@aol.com
Subject:	*Submitted testimony for SB1150 on Feb 3, 2017 14:45PM*

Submitted on: 2/1/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	Testifier Position	Present at Hearing
Regina Gregory	EcoTipping Points Project	Support	No

Comments:

Please note that testimony submitted <u>less than 24 hours prior to the hearing</u>, 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.



February 2, 2017

The Honorable Karl Rhoads Chairman, Senate Committee on Water and Land Hawaii State Capitol, Room 204 415 South Beretania Street Honolulu, HI 96813

### **RE:** Opposition to SB 1150 – relating to preserving coral reefs

Dear Chairman Rhoads:

On behalf of the Consumer Healthcare Products Association (CHPA), I am writing to express opposition to SB 1150 under consideration by the Senate Committee on Water and Land on Friday, February 3rd. This legislation bans the use or application of sunscreen, sunblock, or other cosmetics containing the Food and Drug Administration (FDA) approved ingredient – oxybenzone – while on the beach or in the ocean. While we applaud attempts to limit coral decline in Hawaii, we have strong reservations of doing so by limiting access to an ingredient which has proven benefits against deadly skin cancers.

CHPA is the 135-year-old national trade association representing the leading manufacturers and marketers of overthe-counter (OTC) medicines and dietary supplements. Every dollar spent by consumers on OTC medicines saves the U.S. healthcare system \$6-\$7, contributing a total of \$102 billion in savings each year. CHPA is committed to empowering consumer self-care by preserving and expanding choice and availability of consumer healthcare products.

Oxybenzone is a safe, and effective ingredient approved by the FDA in 1978 and found in nearly 2000 personal care products on the market today including some of the most popular sunscreens, lip balms, and lotions designed to guard against sun damage. In fact, oxybenzone offers broad spectrum protection against both ultraviolet A (UVA) and ultraviolet B (UVB) rays that often contribute to skin cancer. Some popular sunscreen products containing oxybenzone include Coppertone, ChapStick, Blistex, Hawaiian Tropic Lotion Sunscreen, Aveeno Moisturizing Lotion, SoftLips Cube, Neutrogena lotions and countless other shampoos, conditioners, lipsticks, body washes, hairsprays, aftershaves, and more.

#### **Importance of Protection Against Skin Cancer**

The most common form of cancer is skin cancer. Every year there are more cases of skin cancer in the United States than the combined incidents of breast cancer, prostate cancer, lung cancer, and colon cancer combined. In fact, over the last 30 years, more people have experienced skin cancer than all other cancers combined. One out of five Americans will develop skin cancer in their lifetime, and one person dies of melanoma (the deadliest form of skin cancer) every hour. The vast majority of melanomas are caused by the sun, and a person's risk of melanoma doubles if he or she has had more than five sunburns. When used as directed, sunscreens containing oxybenzone on the market today have proven to be very effective in protecting skin against the sun's harmful rays. The FDA has acknowledged research that shows sunscreens aid in decreasing the risk of developing skin cancers and early skin aging. The FDA recommends use of a broad spectrum sunscreen with sun protection factor (SPF) values of 15 or higher regularly and as directed to protect against ultraviolet A sun rays as provided by oxybenzone sunscreen products. In order to get ultra-high SPF, oxybenzone is required to serve as a stabilizer for other sunscreen ingredients in sunscreen. Without it, high SPF may not be achieved.

#### **Oxybenzone and the Environment**

Despite recent headlines highlighting coral decline and the impacts of oxybenzone on that deterioration, there is disagreement within the scientific community on the linear relationship between the two. A number of studies have examined coral reef bleaching and have concluded a number of factors at fault for global coral reef decline. Some of the primary reasons include climate change (ocean temperature)<sup>1</sup>, and pollution runoff.<sup>2</sup> Even Craig Downs of

<sup>&</sup>lt;sup>1</sup> Mydlarz et. al., 2010; Aeby et al., 2016.

Consumer Healthcare Products Association Opposition to SB 1150 February 2, 2017 - Page 2 of 2

the Haereticus Environmental Laboratory in Virginia and primary author of a study on coral reef decline presented at the World Conservation Congress of the International Union for Conservation of Nature admitted in an interview that "agriculture run-off and sewage are probably responsible for the historical collapse of coral reefs for the past 40 years."<sup>3</sup> Ultimately, global climate change presents the greatest stress to the world's coral reef. Other factors like over-fishing, agricultural practices, and sewage are also to blame. Terry Hughes, director of the Australian Research Council Centre of Excellence for Coral Reef Studies at James Cook University suggests that extrapolations asserting sunscreen is damaging the world's coral "are a bit of a stretch.<sup>4</sup>" He continues, "the conclusion from the media is sunscreen is killing the world's coral, and that's laughable."<sup>5</sup>

There is no scientific evidence that under naturally-occurring environmental conditions, sunscreen ingredients are contributing to coral degradation. According to the U.S. National Oceanic and Atmospheric Administration's (NOAA) Coral Reef Conservation Program, coral reefs are threatened by an increasing array of impacts – primarily from global climate change, unsustainable fishing and other factors. Increasing ocean temperatures, acidification, overfishing, coastal development and pollution are well known primary stressors of coral reef.

### **Opportunity Cost**

Over-the-counter sunscreen containing oxybenzone is an affordable, accessible first line of defense for individuals seeking protection from the sun's cancer causing UV rays. Banning the use of oxybenzone, an important UV filter ingredient, in Hawaii will drastically reduce the selection of sunscreen products available to residents and tourists. The combination of reduced choice and less effective products could have the dangerous consequence of individuals using less protective sunscreens or worse –not using sunscreen at all – thereby, causing more skin damage and potentially increasing skin cancer rates.

#### Conclusion

No state has taken the drastic action of banning the use or application of oxybenzone in oceans or at the beach. Since there have been no studies published to date that scientifically prove any sunscreen active ingredient is a primary reason for coral reef decline, CHPA respectfully requests the Hawaii legislature oppose SB 1150. A greater standard of evidence must be considered before such a valuable product to people's health be banned from use.

Should you have any questions for CHPA, please contact me directly or our local counsel, Ms. Lauren Zirbel at 808-294-9968 or laurenzirbel@gmail.com.

Respectfully submitted,

Carlos I. Gutiérrez Vice President, State & Local Government Affairs Consumer Healthcare Products Association (202) 429-3521 cgutierrez@chpa.org

cc: Members, Senate Committee on Water and Land

<sup>&</sup>lt;sup>2</sup> Fabricius, 2005; Messina and Biggs, 2016.

<sup>&</sup>lt;sup>3</sup> No, your sunscreen isn't killing the world's coral reefs. http://mashable.com/2015/11/10/sunscreen-killing-coral-

reefs/.

<sup>&</sup>lt;sup>4</sup> Ibid.

<sup>&</sup>lt;sup>5</sup> Ibid.



Testimony Submitted to the Senate Committee on Water and Land By the Conservation Council for Hawai'i Hearing: Wednesday, February 3, 2017 2:45 pm Room 224

# Support for SB 1150 Relating to Preserving Coral Reefs

Chair Rhoads, Vice Chair Gabbard, and Members of the Committee,

Aloha. The Conservation Council for Hawai'i supports SB 1150, which prohibits the use or application of sunscreen, sunblock, or cosmetic containing oxybenzone while on a beach or in the ocean.

Our reefs are already stressed. Additional coral bleaching by oxybenzone can be avoided. There are alternative products.

Please help save our coral reef ecosystems. Pass SB 1150. Mahalo nui loa for the opportunity to testify.

Mayrie Zuzla

Marjorie Ziegler







Telephone/Fax: 808.593.0255 | email: info@conservehi.org | web: www@conservehi.org P.O. Box 2923 | Honolulu, HI 96802 | Office: 250 Ward Ave., Suite 215 | Honolulu, HI 96814 President: Wayne Tanaka | Vice President: Koalani Kaulukukui | Secretary: Rachel Sprague Treasurer: Les Welsh | Director: Anne Walton Executive Director: Marjorie Ziegler | Administrator: Jonnetta Peters



February 2, 2017

The Honorable Karl Rhoads Chairman, Senate Committee on Water and Land Hawaii State Capitol, Room 224 415 South Beretania Street Honolulu, HI 96813

### **RE: Opposition to SB 1150**

Chairman Rhoads:

On behalf of the Personal Care Products Council (the Council), I am writing to state our opposition to Senate Bill 1150 which would prohibit the use or application of sunscreen, sunblock, or cosmetics containing oxybenzone while on a beach or in the ocean. SB 1150 is under consideration by the Committee on Water and Land on February 3, 2017.

The Council is the leading national trade association representing the cosmetic and personal care products industry. The Council's approximately 600 member companies manufacture and distribute the vast majority of products marketed in the US. As the makers of a diverse range of products that consumers rely on daily, from sunscreen, shampoo, and toothpaste to antiperspirant, moisturizer and lipstick, personal care product companies are global leaders committed to safety, quality and innovation.

Sunscreen is vital to human health. A state specific ban on certain sunscreen products would put the citizens of Hawaii and tourists visiting the state at great risk. The U.S. Food and Drug Administration (FDA), the Centers for Disease Control and Prevention (CDC), the U.S. Surgeon General, the American Academy of Dermatology (AAD), the Skin Cancer Foundation and health care professionals worldwide emphasize that using sunscreens is a critical part of a safe sun regimen. The dangers of sun exposure are clear and universally recognized by public health professionals and dermatologists. The National Institutes of Health Report on Carcinogens identifies solar UV radiation as a 'known human carcinogen.' A single bad burn in childhood doubles the risk of developing skin cancer later in life.

Furthermore, oxybenzone is a safe and effective active ingredient in over-the-counter sunscreens approved by the FDA and is designed to protect skin against the damaging effects of ultraviolet light. It is an important ingredient that provides broad-spectrum protection from both UVA and UVB rays. In addition to the FDA, Health Canada, the Australian Government (TGA), and the European Union have approved the use of oxybenzone as a safe and effective sunscreen ingredient. According to the AAD, oxybenzone is one of the few available sunscreen ingredients that effectively protect skin from both UVA and UVB rays that contribute to skin cancer and premature skin aging.

The legislation being introduced lacks sufficient scientific evidence connecting a sunscreen ingredient to coral bleaching. Regulations and legislation should be based on validated, reproducible studies, done by more than one independent lab. The experiment's conclusions are based on preliminary research conducted under exaggerated laboratory conditions, which do not accurately reflect the complexity of the natural marine environment. According to noted scientists, coral requires an elaborate ecosystem to survive. Transporting it to an artificial setting, such as a laboratory, makes it less viable and likely to die in the face of any disturbance.

In a recent news article, Terry Hughes, Director of the Australian Research Council Centre of Excellence for Coral Reef Studies at James Cook University, suggests that extrapolations asserting sunscreen is damaging the world's coral "are a bit of a stretch." He continues, "the conclusion from the media is sunscreen is killing the world's coral, and that's laughable." Another study involving 5 weeks of chronic exposure to UV filters at concentrations above those reported in natural sea waters reported that sunscreens did not induce coral bleaching nor reduce the photosynthetic efficiency of the symbiotic micro-algae.

The threat to the world's coral reefs is a very serious concern. According to the U.S. National Oceanic and Atmospheric Administration's (NOAA) Coral Reef Conservation Program, coral reefs are impacted by an increasing array of hazards – primarily from global climate change, ocean acidification, and unsustainable fishing practices. Climate change and ocean warming are the most notable culprits for reef bleaching. According to NOAA, coral bleaching events have occurred as the world's oceans temperatures have increased to the warmest levels recorded since measuring began in the late 19th century.

SB 1150, although well intended, lacks the necessary scientific evidence to demonstrate that sunscreen ingredients are in any way responsible for coral bleaching. Skin cancer is the most commonly diagnosed cancer in the United States. This legislation will create confusion, put consumers' health at risk and potentially discourage the use of sunscreens. Since this legislation is based on one, selectively chosen, laboratory experiment, it would seem appropriate to support further research, and not rush to judgement.

Please oppose SB 1150.

Thank you for your consideration.

Sincerely,

Michael F Thompson

Michael F. Thompson Senior Vice President, Government Affairs Personal Care Products Council

Cc: Members, Senate Committee on Water and Land



P.O. Box 92 Clifford, Virginia 24533 U.S.A. Email: haereticus1@hughes.net Phone/Fax: 434-263-5740 www.haereticus-lab.org

February 2, 2017

Senators Rhoads and Gabbard Chair and Vice-Chair on the Committee on Water and Land

This letter is testimony for our support of Senate Bill 1150, "Relating to Preserving Coral Reefs."

Dear Honorable Senators on the Committee on Water and Land,

I was the lead scientist who co-authored the scientific paper in Archives of Environmental Contamination and Toxicology regarding the impact of oxybenzone on coral planula and oxybenzone contamination along the coasts of Hawai'i and the U.S. Virgin Islands. I am also a graduate of the John A. Burns School of Medicine at the University of Hawai'i at Mānoa.

Oxybenzone in the marine environment can have detrimental effects to all marine life, including changes in fish behavior, pathological changes to fish sexual identity, damage to genomic and DNA integrity, and may suppress restoration of coral reefs by preventing juvenile corals to recruit into an area that is polluted by oxybenzone.

Passage of a prohibition us using products containing oxybenzone (unless it is a medical prescription by a medically licensed physician) when entering marine waters can be a VERY effective means in mitigating oxybenzone pollution of coastal waters. I do urge the committee to consider amending this current bill to allow for consideration a medical prescription by a medically licensed physician of medication containing oxybenzone.

Haereticus Environmental Laboratory and I support Senate Bill 1150 as being an effective means in reducing oxybenzone pollution.

Respectfully submitted,

Craig A. Downs, Ph.D. Executive Director

From:	mailinglist@capitol.hawaii.gov
Sent:	Thursday, February 2, 2017 1:45 PM
То:	WTL Testimony
Cc:	sarahssweetscrubs@gmail.com
Subject:	*Submitted testimony for SB1150 on Feb 3, 2017 14:45PM*

Submitted on: 2/2/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	<b>Testifier Position</b>	Present at Hearing
Sarah A Schroeder	Sarah's Sweet Scrubs	Support	No

Comments:

Please note that testimony submitted <u>less than 24 hours prior to the hearing</u>, 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.

From:	mailinglist@capitol.hawaii.gov
Sent:	Thursday, February 2, 2017 10:52 AM
То:	WTL Testimony
Cc:	hodge808@hawaii.edu
Subject:	Submitted testimony for SB1150 on Feb 3, 2017 14:45PM

Submitted on: 2/2/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	<b>Testifier Position</b>	Present at Hearing
jessica Hodge	Individual	Support	No

Comments: I support this bill because I want my children to experience what a healthy coral reef looks like. As well as keeping corals healthy for tourists to see for many years to come.

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From:	mailinglist@capitol.hawaii.gov
Sent:	Wednesday, February 1, 2017 9:23 PM
То:	WTL Testimony
Cc:	mjellings@hawaii.rr.com
Subject:	*Submitted testimony for SB1150 on Feb 3, 2017 14:45PM*

Submitted on: 2/1/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	<b>Testifier Position</b>	Present at Hearing
Carl M Jellings Sr	Individual	Support	No

Comments:

Please note that testimony submitted <u>less than 24 hours prior to the hearing</u>, 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.

From:	mailinglist@capitol.hawaii.gov
Sent:	Tuesday, January 31, 2017 8:37 PM
То:	WTL Testimony
Cc:	mele@pamelapolland.com
Subject:	Submitted testimony for SB1150 on Feb 3, 2017 14:45PM

Submitted on: 1/31/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	<b>Testifier Position</b>	Present at Hearing
Pamela Polland	Individual	Support	No

Comments: As a Hawai'i resident for the last forty years, and avid ocean swimmer, I have watched our reefs weaken, and fish populations decrease - most especially in the last 20 years. As sad as this is for our island environment overall, it's also VERY BAD for tourism which is the life's blood of these islands. Our paying visitors come here to snorkel, whale watch, kayak, boat and enjoy all the ocean activities, and the beauty of our waters and reefs. There is irrefutable scientific evidence that the chemical compounds mentioned in SB1150 are largely damaging to our marine environment. Please make it illegal to use products with these damaging compounds on our beaches and in our ocean. Let's keep the marine conditions healthy and beautiful in Hawai'i nei. Thank you for caring about this important issue.

Please note that testimony submitted <u>less than 24 hours prior to the hearing</u>, 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.

From:	mailinglist@capitol.hawaii.gov
Sent:	Thursday, February 2, 2017 2:31 PM
То:	WTL Testimony
Cc:	leahlaramee@gmail.com
Subject:	Submitted testimony for SB1150 on Feb 3, 2017 14:45PM

Submitted on: 2/2/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	<b>Testifier Position</b>	Present at Hearing
Leah Laramee	Individual	Support	No

Comments: There are a number of other products out there that are safe for our oceans and provide protection. This rule will promote healthier reefs with minimal inconvenience to the consumer.

Please note that testimony submitted <u>less than 24 hours prior to the hearing</u>, 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.

From:	mailinglist@capitol.hawaii.gov
Sent:	Thursday, February 2, 2017 11:37 AM
То:	WTL Testimony
Cc:	alexismpeters@gmail.com
Subject:	*Submitted testimony for SB1150 on Feb 3, 2017 14:45PM*

Submitted on: 2/2/2017 Testimony for WTL on Feb 3, 2017 14:45PM in Conference Room 224

Submitted By	Organization	<b>Testifier Position</b>	Present at Hearing
Alexis Thomas	Individual	Support	No

Comments:

Please note that testimony submitted <u>less than 24 hours prior to the hearing</u>, 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.