



STATE OF HAWAII  
BOARD OF LAND AND NATURAL RESOURCES

**PETITION FOR A CONTESTED CASE HEARING**

OFFICIAL USE ONLY	
Case No.	Date Received
Board Action Date / Item No.	Division/Office

**INSTRUCTIONS:**

- File (deliver, mail or fax) this form within ten (10) days of the Board Action Date to:  
 Department of Land and Natural Resources  
 Administrative Proceedings Office  
 1151 Punchbowl Street, Room 130  
 Honolulu, Hawaii 96813  
 Phone: (808) 587-1496, Fax: (808) 587-0390
- DLNR's contested case hearing rules are listed under Chapter 13-1, HAR, and can be obtained from the DLNR Administrative Proceedings Office or at its website (<http://dlnr.hawaii.gov/forms/contested-case-form/>). Please review these rules before filing a petition.
- If you use the electronic version of this form, note that the boxes are expandable to fit in your statements. If you use the hardcopy form and need more space, you may attach additional sheets.
- Pursuant to §13-1-30, HAR, a petition that involves a Conservation District Use Permit must be accompanied with a \$100.00 non-refundable filing fee (payable to "DLNR") or a request for waiver of this fee. A waiver may be granted by the Chairperson based on a petitioner's financial hardship.
- All materials, including this form, shall be submitted in **three (3)** photocopies.

RECEIVED  
 2023 OCT 23 AM 9:10  
 DEPT. OF LAND & NATURAL RESOURCES  
 STATE OF HAWAII

A. PETITIONER		
(If there are multiple petitioners, use one form for each.)		
1. Name Hawaii Unites	2. Contact Person Tina Lia	
3. Address P.O. Box 1773	4. City Kihei	5. State and ZIP HI 96753
6. Email tinalia@live.com	7. Phone (808) 298-6335	8. Fax

B. ATTORNEY (if represented)		
9. Attorney Name	10. Firm Name	
11. Address	12. City	13. State and ZIP
14. Email	15. Phone	16. Fax

**C. SUBJECT MATTER**

**17. Board Action Being Contested**

**18. Board Action Date**

**19. Item No.**

**20. Any Specific Statute or Rule That Entitles Petitioner to a Contested Case**

**21. Any Specific Property Interest of Petitioner That Is Entitled to Due Process Protection**

**22. Any Disagreement Petitioner May Have with an Application before the Board**

**23. Any Relief Petitioner Seeks or Deems Itself Entitled to**

**24. How Petitioner's Participation in the Proceeding Would Serve the Public Interest**

**25. Any Other Information That May Assist the Board in Determining Whether Petitioner Meets the Criteria to Be a Party under Section 13-1-31, HAR**

Check this box if Petitioner is submitting supporting documents with this form.

Check this box if Petitioner will submit additional supporting documents after filing this form.

Tina Lia  
Petitioner or Representative (Print Name)

  
Signature

10/16/23  
Date

**PETITION FOR A CONTESTED CASE HEARING**  
**C. SUBJECT MATTER (Supporting Documents)**

**17. Board Action Being Contested**

We are contesting the Board of Land and Natural Resources' approval of Agenda Item C-1, DIVISION OF FORESTRY AND WILDLIFE: Request approval of Final Environmental Assessment (FEA) and Authorization for the Chairperson to issue a Finding of No Significant Impact for the "Use of *Wolbachia*-Based Incompatible Insect technique for the suppression of non-native southern house mosquito populations on Kauai."

**18. Board Action Date**

October 13, 2023

**19. Item No.**

C-1

**20. Any Specific Statute or Rule That Entitles Petitioner to a Contested Case**

Relevant statutes and constitutional provisions covered in this request are: HRS 343; Hawai'i Constitution Article XI, section 1, 2, 7, and 9; HAR 13-1-29

**21. Any Specific Property Interest of Petitioner That Is Entitled to Due Process Protection**

Hawaii Unites is a 501(c)(3) nonprofit organization dedicated to the conservation and protection of our environment and natural resources. Our mission is honoring and protecting our sacred connection to the natural world. Formed in 2023, Hawaii Unites launched a petition through Change.org to "Demand an Environmental Impact Statement for the Experimental Mosquito Release on Maui" which has received more than 6,800 signatures. We have also connected with the Kaua'i community through multi-island outreach and are representing the people on Kaua'i who are opposed to the release of mosquitoes on their island. Our nonprofit officers, all petition signatories residing in Hawai'i – particularly those on Kaua'i, and our supporters on Kaua'i are directly affected by the actions of the Board on item C-1, which seeks to approve a landscape-scale biopesticide experiment with a project area covering 59,204 acres of natural forest and reserve areas on Kaua'i. The Kaua'i mosquito release area encompasses almost 17% of the entire island, and this would be the second largest *Wolbachia* mosquito release of any kind globally to date (Maui would be the largest at 64,666 acres).

The rights of our officers and signatories relevant to these natural areas are protected by the Hawai'i State Constitution and state law. Hawaii Unites' officers, signatories, and supporters have rights to a clean and healthful environment under article XI, section 9 of the Constitution, which mandates a contested case hearing whenever the State makes binding decisions under "laws relating to environmental quality, including control of pollution and conservation, protection and enhancement of natural resources."

## **22. Any Disagreement Petitioner May Have with an Application before the Board**

Hawaii Unites opposes the approval of the Final Environmental Assessment and the authorization for the Chairperson to issue a Finding of No Significant Impact for the “Use of *Wolbachia*-Based Incompatible Insect technique for the suppression of non-native southern house mosquito populations on Kauai” because:

- (a) The Final Environmental Assessment lacks adequate detail as required by HEPA.
- (b) The Final Environmental Assessment fails to disclose the complete manufacturing process for the DQB Males biopesticide bacteria-infected mosquito product
- (c) The Final Environmental Assessment fails to identify and describe the mark release recapture study as a proposed action, and this project may have been improperly segmented.
- (d) The Final Environmental Assessment fails to adequately identify the mosquito packages planned for release into the environment, and the effects on the environment from the release of biodegradable packages with an unknown decay rate are not adequately addressed.
- (e) The Final Environmental Assessment fails to identify biosecurity protocols
- (f) No mitigation plan has been presented for the unintended consequences of the bacteria-infected mosquito releases.
- (g) The Final Environmental Assessment does not address the concern of accidental pathogen introduction and does not specify required permits for interstate transport of pathogens
- (h) Viewscape impacts, noise disturbances to forest bird breeding and nesting, and significant environmental consequences, including impacts to the untrammelled, natural qualities of the wilderness character, have not been adequately addressed.
- (i) The potential negative impacts of introducing an invasive species to the islands have not been adequately addressed.
- (j) Biopesticide mosquitoes for this project originate from Palmyra Atoll. *Wolbachia* bacteria for the project originates from Kuala Lumpur in Malaysia. At least one strain of *Wolbachia* planned for import in connection with the project does not exist on these islands.
- (k) Landscape level control of *Culex quinquefasciatus* mosquitoes using the Incompatible Insect Technique (IIT) has never been done before.
- (l) There is no documented prior use of the *Culex quinquefasciatus* mosquito species for a stand-alone IIT field release.

- (m) Southern house mosquitoes transmit human diseases, including West Nile virus, elephantiasis, and encephalitis; and they're a potential vector of Zika virus. Male mosquitoes transmit pathogens to females. Pathogen screenings for the imported mosquitoes are not being disclosed and are being withheld as confidential.
- (n) Peer-reviewed studies confirm that *Wolbachia* bacteria can cause mosquitoes to become more capable of spreading diseases like avian malaria and West Nile virus (bird and human). The Final Environmental Assessment fails to adequately address these risks.
- (o) Tropical disease expert Dr. Lorrin Pang (private citizen) has expressed several concerns, including horizontal transmission of the lab bacteria to wild mosquitoes and other insect vectors of disease, math models, wind drift, superinfection, increased pathogen infection and disease-spreading capability, the experimental nature of the project, and the need to study these interacting mechanisms both separately and in combination. The Final Environmental Assessment fails to adequately address these concerns.
- (p) Dr. Lorrin Pang's alternative approaches to mitigating avian malaria have not been considered.
- (q) Scientific studies document the risks of horizontal transmission, increased pathogen infection, irreversible evolutionary events, population replacement, accidental release of females (who bite, breed, and spread disease), creation of lab-strain females in the wild, and horizontal gene transfer. The Final Environmental Assessment fails to adequately address these risks.
- (r) Female mosquitoes will be released. EPA guidelines allow for the release of one female for every 250,000 males. The Final Environmental Assessment fails to adequately address the risks of female release.
- (s) This project has the potential to cause the extinction of endangered native birds, and it could impact human health.
- (t) The FEA states that "monitoring the response of forests [*sic*] bird [*sic*] to mosquito suppression via the Incompatible Insect Technique (IIT) mosquito control is outside the scope of the proposed action of this EA." There is no intention by the proposing agency/agencies of taking responsibility for the outcome of this mosquito release plan on the endangered native birds that are the focus of this project.
- (u) There has been no stated intention by the proposing agency/agencies of taking responsibility for the outcome of this mosquito release plan on the people who may be impacted.
- (v) Southern house mosquitoes transmit diseases to birds and other animals, including avian malaria, avian pox, heartworm, West Nile virus, and Western equine encephalitis. The Final Environmental Assessment does not adequately address the risks of transmission of animal diseases.

- (w) Impacts to other endangered native species in the project area have not been adequately studied or addressed in the Final Environmental Assessment.
- (x) Biopesticide wind drift has not been studied and is not addressed in the Final Environmental Assessment.
- (y) This project poses a risk of wildland fires caused by aircraft and drones.
- (z) Environmental Justice is not adequately addressed in the Final Environmental Assessment. Human health impacts of this project have not been adequately studied, and the proposed action would impact ethnographic resources and traditional cultural practices.
- (aa) The Final Environmental Assessment's assertion of released mosquitoes posing no risk to human health is based on unsound science. The 2010 article by Popovici et al. cited in the Final Environmental Assessment has been discredited by the EPA.
- (bb) The EPA has not conducted an Environmental Risk Assessment for this mosquito biopesticide to determine the environmental, ecological, and human health risks.
- (cc) The Hawai'i Department of Agriculture applied for an EPA Emergency Exemption for use of the mosquitoes without going through regulatory safety processes.
- (dd) A feasibility study has not been conducted to provide a detailed analysis that considers all of the critical aspects of the proposed project in order to determine the likelihood of it succeeding.
- (ee) The U.S. Department of the Interior states that "although used world-wide for human health, *Wolbachia* IIT is a novel tool for conservation purposes and its degree of efficacy in remote forest landscapes is unknown."
- (ff) Under the precautionary principle, it is the responsibility of the proponents of this project to establish that the proposed activity will not result in significant harm.
- (gg) The subject action will have a significant effect and, therefore, requires the preparation of an Environmental Impact Statement.
- (hh) Conflicts of interest have not been disclosed or addressed.
- (ii) The DLNR has been funded to build out an insectary in Hawai'i where they intend to mass produce lab-altered mosquitoes for release on the islands into perpetuity. The FEA proposing agency's own board voted to approve a project that benefits the proposing agency through funding and future production in their Hawai'i mosquito lab.
- (jj) The DLNR and its Board have prioritized corporate interests and biotech industry experimentation above the health and safety of Hawai'i's people, wildlife, and environment.

### **23. Any Relief Petitioner Seeks or Deems Itself Entitled to**

Hawaii Unites requests that the approval of the Final Environmental Assessment and the authorization for the Chairperson to issue a Finding of No Significant Impact for the “Use of *Wolbachia*-Based Incompatible Insect technique for the suppression of non-native southern house mosquito populations on Kauai” be denied. The subject action will have a significant effect and, therefore, requires the preparation of an Environmental Impact Statement.

Hawaii Unites also requests that State of Hawai‘i Board of Land and Natural Resources Chairperson Dawn N.S. Chang and Board Member Vernon Char recuse themselves from participating in any discussion or voting in this matter, given that they have conflicts of interest per HRS §171-4 (d).

Hawaii Unites further requests that the State of Hawai‘i Board of Land and Natural Resources disclose that the Board in its entirety has a conflict of interest as defined by the National Institutes of Health’s *Principles for Identifying and Assessing Conflicts of Interest*.

### **24. How Petitioner’s Participation in the Proceeding Would Serve the Public Interest**

Hawaii Unites has provided peer-reviewed studies documenting the serious risks of the proposed project. We have described the concerns of tropical disease and vector expert Dr. Lorrin Pang. In a contested case hearing, we will provide the Board with additional peer-reviewed studies. We will give a detailed description of Dr. Pang’s concerns regarding horizontal transmission of the introduced bacteria strain and will describe additional concerns in detail. We will provide a statement by a retired scientist from the EPA Office of Pesticide Programs strongly advising that a full Environmental Impact Statement be conducted. We will provide documentation of petition signatories and public testimony. Our evidence will demonstrate that the project risks and the concerns of the public in opposition to this proposed experiment have not been adequately studied or addressed. Our participation in a contested case hearing will help to ensure that this Board has all the information it needs to make a decision that fully protects the public’s interests and satisfies the Board’s public trust obligations per the Hawai‘i State Constitution.

### **25. Any Other Information That May Assist the Board in Determining Whether Petitioner Meets the Criteria to Be a Party under Section 13-1-31, HAR**

Per HAR §13-1-31 (b) (2), Hawaii Unites represents all petition signatories who have some property interest in the land, who lawfully reside on the land, who are adjacent property owners, or who otherwise can demonstrate that they will be so directly and immediately affected by the requested action that their interest in the proceeding is clearly distinguishable from that of the general public.

Per HAR §13-1-31 (c), as a 501(c)(3) nonprofit organization dedicated to the conservation and protection of our environment and natural resources, Hawaii Unites can show a substantial interest in the matter.