

Community Engagement



Franny Brewer, BIISC Public Outreach Coordinator, received the 2018 Hawaii Invasive Species Awareness Month Island MVP Award. Brewer was nominated by Councilwoman Eileen O'hara for her work in raising the profile of invasive species issues and for organizing the community to take action against costly and harmful invasive pests like Albizia and LFA. (Photos on last page: Plant Pono Specialist Molly Murphy swarmed by students at a DOFAW Bio-Blitz; Outreach Assistant Kawehi's boots explain what we mean by OUT-reach at BIISC; and the newest member of the BIISC team, our LFA Mascot, spurs action island-wide.

At BIISC we believe success in community engagement is achieved when our community changes its behavior in a way that has a measureable positive impact toward reaching our invasive species management goals. This definition of success requires that more people make smart decisions about what they purchase and what they transport, take action on invasive species in their area, and speak out to demand better policies and stronger support for biosecurity from our political leaders. These are the very same behaviors that will help us achieve the vision of the Hawaii Interagency Biosecurity Plan.

Social science research helps us understand how to motivate people to action, design outreach strategies that meet our goals, and measure the positive impact and effectiveness of our programs. Community based social marketing (CBSM) provides a specific subset of tools used to change behavior at the community scale, by focusing on collective action. While individual action is important, making progress on a community-wide problem often requires that people work together toward a common goal, like ridding the neighborhood of albizia or little fire ants.

HISC funds awarded supported one-half the cost of BIISC's community engagement programs. Additional support was provided by the Hawaii Tourism Authority, Hawaii Department of Agriculture, Hawaii County Research & Development Department, and the Change Happens Foundation.



Expected Outcomes and Results:

- **Engage over 500 residents in hands-on workshops and training events for LFA, Albizia, Rat Lungworm Disease, and invasive plant control:**

BIISC engaged 299 residents in hands on workshops and training events, and laid the foundation to present Rat Lungworm Disease curriculum to 12 classrooms in 2019. Overall, 2018 was a very successful and impactful year for public outreach on invasive species topics, however, the Kilauea Eruption starting in May 2018 significantly disrupted planned workshops and events in East Hawaii. Ten of thirteen active LFA Neighborhood Control Teams, for example, were located in Lower Puna, and were either isolated or inundated by lava (though the Kalapana Team never missed a treatment!). At the very least, the attention and volunteer reserves of the community were necessarily focused on the eruption and needs of the evacuees for much of the year. Nevertheless, BIISC was able to meet most of our other targets for the year, and by necessity focused more effort on connecting with communities in West Hawaii, South Point, and Kohala, with positive results.

- **Control over 1,000 albizia trees and 200 acres of LFA with volunteers:**

BIISC volunteers helped treat 2,465 of the 28,000+ albizia controlled in 2018.

BIISC surveyed and controlled 199.5 acres for LFA with 143 hours of volunteer labor. Ant activity was measured as the percentage of ten baited chopsticks detecting ant presence, at any level. Neighborhood teams that completed their 1 year treatment schedule in 2018 had an average reduction in ant activity from 64% (range of 41% to 93%) to 26% (range 7% to 44%). Final counts include surveys on all parcels that started the program, even if the owner dropped out of the program causing ant numbers to increase. Final counts are also somewhat biased toward detecting ants, as they are conducted by volunteers who know where their lingering “hot spots” are in the yard, and cannot be persuaded to place them randomly! Sticks are considered positive whether there is one ant or dozens on the chopstick. Reportedly, the number of ants on each stick was also considerably reduced.

- **Have face to face interaction with over 3,000 residents.** BIISC had 11,384 in-person interactions, including the hands-on workshops and volunteer opportunities mentioned above, and 3,000 estimated attendees at the very interactive `Ohi`a Love Fest. The remaining ~8,000 interactions include public presentations, talks, and information booths at community events. An additional 120 interactions were logged in engaging permission to enter private property to control eradication target species.
- **Communicate weekly via social media with over 2,000 residents.** BIISC has 2,732 followers on Facebook and Instagram, and posted 95 messages to social media accounts, nearly two per week. We achieved an “outstanding” rate of engagement, meaning that a larger than expected proportion of people receiving these messages clicked, “liked,” or commented on the material. The www.BIISC.org website received an average of 3,242 views per month in 2018.



Final Report to the Hawaii Invasive Species Council

- **Ensure mention of invasive species at least once per month in local newspapers, publish one peer reviewed journal article and conduct one "in-reach" workshop advancing technical knowledge and skill in delivering effective public outreach in the invasive species field.**

There were 22 articles published in newspapers either contributed by BIISC via press release or mentioning BIISC's work with invasive species in 2018, including a few in the Honolulu Star Advertiser and San Francisco Chronicle.

The results of the Neighborhood LFA Team program was published in Conservation Biology by BIISC Public Outreach Coordinator, Frances Brewer and research partner Rebecca Niemiec, PhD. Open Source Link: <https://onlinelibrary.wiley.com/doi/epdf/10.1111/cobi.13294>

Brewer organized a workshop in conjunction with the annual Hawaii Conservation Conference, which brought in Nancy Lee, PhD, an expert in Community Based Social Marketing and author of Social Marketing to Protect the Environment: What Works (Sage Publishing), to train 45 members of the conservation and invasive species community.

- **Continue to update and add to our website, and staff the phones to provide ready information to daily callers.**

BIISC receives at least daily inquiries from the public via phone, and has finally, near the end of 2018, implemented a system to log these calls!

In addition to expanding and keeping the BIISC website up to date, after the PlantPono.org website was hacked and destroyed, BIISC led the effort to recreate and launch a new website. The new, improved PlantPono.org is more user-friendly and accessible to staff from all of the ISCs and CGAPS, to encourage our state's horticulture industry and residents to phase out the import, propagation, and sales of invasive plants.

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