

**MAUI INVASIVE SPECIES COMMITTEE**  
**Thursday, March 8, 2018**  
**Meeting Minutes**

**Attendance:** Fern Duvall, Kerri Fay, Chuck Chimera, Randy Bartlett, Forest Starr, Kim Starr, Marshal Loope, Chris Brosius, Jeremy Gooding, Woody Mallinson, Kai'ena Bishaw, Keoki Kanakaokai, Lissa Strohecker, Mike Ade, Adam Knox, Adam Radford, Teya Penniman, Brooke Mahnken, Abe Vandenberg, Elizabeth Anderson, Monte Tudor-Long, Kayani Singh

**Remote Attendance:** Hanna Mounce

- The meeting was called to order at 9:05am by Fern Duval, Chair
- Introductions were made around the table
- Minutes from the December 8' 2017 meeting were reviewed and approved. They will be posted on the website

**FOLLOW-UP ITEMS**

- Fern: we should start identifying and pulling out action items from the meetings. There were quite a few items that needed follow-up from the last meeting. We should start pulling them out into a list. There were action items for little fire ants (LFA) regarding emergency declarations and legislative authority for Maui quarantine. Was there any follow through? Nobody was identified as responsible.
- Adam R.: Dan and I have been following up with CTAHR. We haven't heard anything more about the plan to move cattle onto the property. We did an annual update for CTHAR in January as part of our lease. I have a call in to the lead for the ungulate program. The relationship is not straight forward.
- Adam R.: we got a label for Altosid approved on March 1. It can be applied near water and was approved as a special use label for LFA. We will need another permit for aerial application. Cas is optimistic that we can move it. We had an LFA update meeting in Hana on Jan 20. Michelle from HAL came over and there was a good turn-out. Councilmember Carroll's aid attended and she motivated the council members to help move things along. Kalani English also got involved. The label is for use only under HAL supervision and is just for Nahiku, Maui. It is only for that specific geographic area. This highlights the fact that we will be continuing to do more work with no further resources if we take on all of Nahiku. We need a tangible recommendation from the committee to help us identify areas where we might have room to adjust.

**ANNOUNCEMENTS**

- Chris: Kai'ena is in a new position with WMMWP as a Weed Management Specialist. We need to diversify in order to grow. We are doing well with ungulate control and fencing, but weeds need more attention. Kai'ena moved from the Big Island to join us on February 1<sup>st</sup>. He has a horticultural background.

- Randy: we lost our planner at HISC. He accepted a position with the Koolau Mountains Watershed Partnership. Josh and I are splitting up most of what he was doing. He finished the *Albizia* plan just before he left. We won't replace him until we see what the Legislature does with the budget for the coming year. If they fund the Hawaii Invasive Species Authority, HISC would become that authority and we would need to reestablish those positions. We don't know if it will be funded. This is the third year we have tried to get it through. The ask is for \$10 million and in the past we have been funded at \$5 million. We would like to have dedicated funding.
- Chuck: The next Maui Nui ROD Working Group meeting will be on April 2 from 2-4pm. There will be remote attendance options. I will be moving to the Big Island in July, but will be continuing on in the Weed Risk Assessment position. There should be a ROD call the third Thursday of every month.
- Marshal: we have hired five new inspectors in the last eight months. They are in training now and will all be good new employees. We have one more position to fill because Kathy Davenport just retired. Forest: we are really impressed with your staff and what you are intercepting. Morale is good! Marshal: we are still looking to replace Bob Yonahara. It is a high level, key position.
- Fern: Patrick Barnhart will be coordinating Guam brown tree snake refreshers. Adam Knox has been in touch with him and MISC will likely send several people.
- Woody: the park will be holding a Heli Manager course April 2-6. The last day will include sling load training. The course will be at Keokea. Timmy is doing some of the training and Chad from Region will be coming over.
- Adam R.: there was a great pine control reunion this week, Mike: it was super exciting. There were a lot of folks participating and a lot of enthusiasm. The terrain was rough. There were over 50 people working the first day. Woody: we staged out of Polipoli just before you hit the ballpark junction. We hiked south and started on state and Ulupalakua property. Most of the work was on the ranch. We did standing kill with frilling - mostly *Pinus radiata*. Adam R.: the idea is to create a protective buffer around the upper elevation park lands. Woody: yes, we are trying to keep the line back. We are working between 5-6,500 feet elevation off the eastern edge. We are doing peripheral control toward the core. Fern: pines aren't incipient but they have a lot of qualities that are like incipients. There is not a viable pine industry in the state.
- Adam R.: we have been going over to Kahoolawe to help with fountain grass. Mike: we went three months ago and then again last week. The first trip we found 160 mature plants and this last time we only found immature plants. The plants were all in the same spot.
- Adam R.: we met with the Pulama Lanai folks and talked with them regarding helping more with training their staff. Marshal: we just had contact with their botanist. They are importing quite a lot of plants from Florida. We are trying to get them to do treatments prior to shipment. Adam: they have had LFA and coqui interceptions on Lanai.
- Adam R.: DLNR Maui staff have been helping with coqui work. Scott has committed staff time for habitat work and funds (up to \$24,000) for coqui barrier development and installation. He is continuing to entertain the idea of controlled burns. Fern: for the isolated islands we are planning on

burns in March/April as part of training exercises. The islands in the old HCS and A&B lands are appropriate for burning. Adam R.: a huge thanks to Fern for helping to support these efforts. Our next step is to connect with West Maui Land, they are developing Haiku Hill, and that borders the gulch for over a mile. We are discussing putting a barrier there as well. It would encompass a huge strategic portion of the border of the gulch.

- Adam R: we have been asked to make a presentation to the Water Resources Board on March 20. They have posed several questions. What is the return on the investment in miconia control? What is the effect of Triclopyr in the watershed and drinking water? How does the overlap between our DWS and OED grants work? Teya: they want all the watershed partnerships and MISC to present. Chris: seven of the nine Council members are on the committee. Teya: the Mayor is about to present his 2019 budget and these questions came up as part of that process. Fern: you should be prepared to show where miconia would be if you hadn't been working on it.

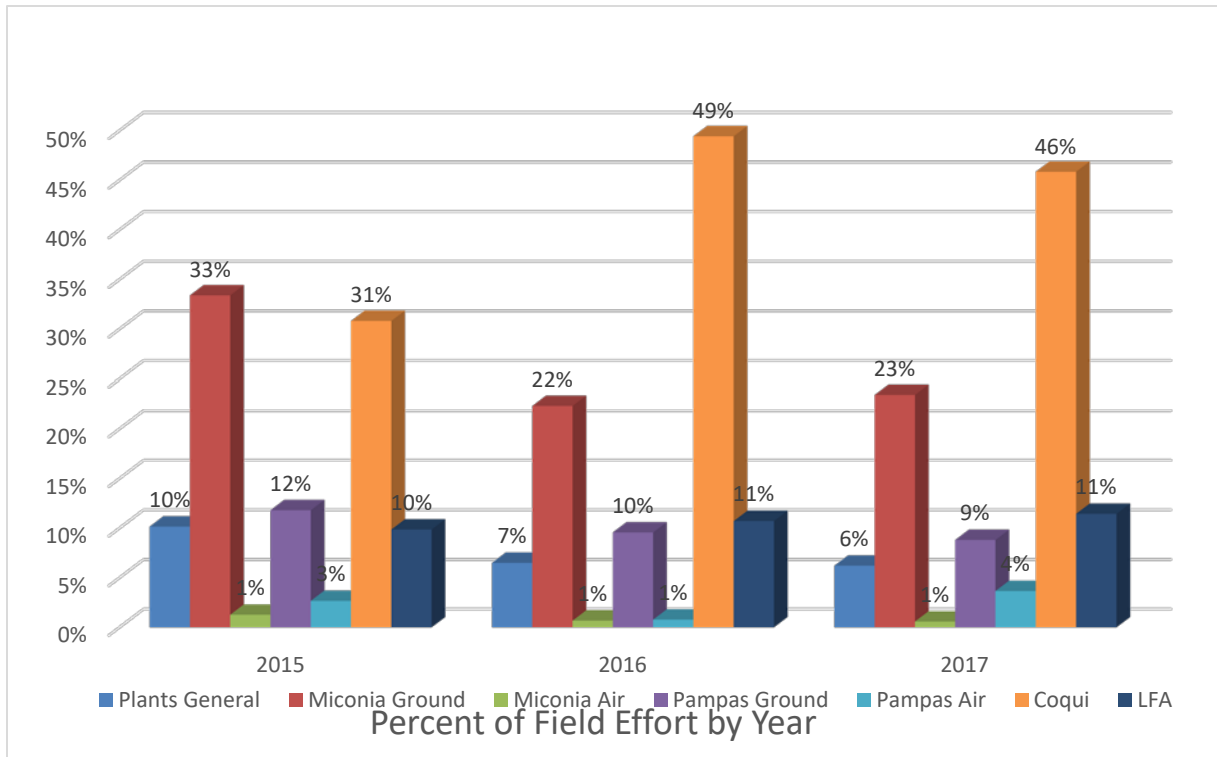
## **BACKGROUND**

### *Previous Planning Efforts / Processes Used*

- Adam R.: today is part two of our prioritization meeting. I am not planning to go back through previous planning efforts. I want to focus on the conversation regarding where there could be wiggle room. If we adjust, what would the impact be? If we are faced with a hard decision, what are we willing to give up? This is better as a more qualitative conversation rather than quantitative. In the past, we have used a buffer strategy for our plant species that dictates how often we go back, how long we go without finding a mature plant, etc. Way back we went through a process of scoring species to decide what we should work on. Another effort that Brooke put a lot of time into was an interactive workbook where we could adjust different parameters.
- Adam R.: our funding peak was in FY 16 at \$3.2 million. We are down this year and have less available resources. Where does our effort go? Coqui is almost 50% of our field effort. We are looking at the coming year and how our grants are obligated. HISC and OED general are the only non-specific grants we have. If we apply the current percentage of time by species to our upcoming budget, we only have 11% flexibility. Something will have to give if we take on something new.
- Adam R.: I don't think we will get to a place today where we say we are going to make major changes, but I would at least like to look at the areas where we think we could adjust. A ballot was given to each person attending and they were asked to rank species in terms of where they think we should be spending the most time.

### RESULTS in priority order:

1. Little fire ant
2. Coqui
3. Miconia air
4. Pampas air
5. Pampas ground
6. Miconia ground
7. Ivy gourd



- Adam R.: when you look at the time that goes in to a lot of our targets the eradicable species are a super small percentage of our time despite the fact that rapid response / early detection is really why MISC exists. An example of where we are already shifting resources is from miconia ground work to LFA in Hana. We are making resource allocation changes. In the face of treating Nahiku completely, should we continue to draw on the Hana crew or from somewhere else? Fern: animals are different in the sense that the expansion rate is higher. LFA and coqui are hard to detect at low density. Forest: LFA and coqui impact human health, agriculture and the environment so there is a broader base of support. The human aspect leads to a broad base. Teya with animals, in theory, when you kill them they are gone. There is no seedbank.
- Teya: Randy do you have a statewide perspective from other ISCs? Randy: LFA is on the top of most people's list especially if you are not on the Big Island. It has the most impact economically, environmentally, and socially. Most people get accustomed to coqui and don't even hear them anymore. Having coqui doesn't make life miserable the way LFA does. LFA has to be #1 with most people.
- Fern: feasibility was one of our old qualifications for species selection. With ants we haven't had the tools we need. We have always figured that coqui was doable on Maui. Brooke: the goal for different species is different as well. The goal for miconia isn't eradication. Fern: the first two on the list are still in the incipient or containment realm. We talk about coqui and LFA in terms of getting rid of them. That is not the case with some other things. Forest: we are at the jumping off point between containment and eradication. Marshal: we get an equal amount of plants from Oahu and the Big Island. There has been a decrease in plants with ROD.

- Adam R.: what are the ways things might be adjusted? Where can we shift resources? For miconia, we can't meet our goal of getting through all the areas on a three year cycle if we are doing LFA instead. Fern: there needs to be a paradigm shift. It sounds like we need to convene an incident command (IC) system for coqui and LFA. What are the resources that can be mobilized? For instance, the state folks control blackberry in Polipoli. Maybe those resources should be rerouted. Coqui and LFA are the fires. What can be brought to bear on these issues? MISC can shift resources, but what other resources are out there? I would agree that we get rid of LFA and coqui on Maui. We are different than the Big Island. Adam R: we may decide to keep miconia out of areas where there is vectoring and/or out of higher elevations. Woody: we have refocused aerial resources for miconia, but not really the ground component. Forest: listing all potential cooperators would be helpful.
- Randy: what is current strategy for coqui? Adam R.: containment with eradication if there were adequate resources. Abe: we would be attacking it the same way regardless. If we had more funds we would do what we are doing but bigger and more frequently. Randy: I could see in the long term looking at biocontrol for the frogs. Chris: shifting capacity and using an incident command is a problem with our grants. What kind of language can we put in our grants that would allow us to repurpose if needed? Can we put a clause in our contracts to allow rapid response to a common threat? Randy: if you put the language in your proposal in the first place regarding flexibility within the budget to respond to emergencies, it makes it easy. Fern: if you had an incident command system in place, you would have a finance section looking at the big picture including outreach needs, operational needs, etc. At some point we need to review the big picture and determine what the hold ups are and what needs to be done.
- Teya: does the statewide *Albizia* plan have an IC approach? Randy: no. Forest: when ROD does get here there will be a massive need for resources. Chuck: the IC system the BI used for ROD is in the process of being revised and updated. Christy has funding to hire an IC person to help the different islands develop the IC system for their islands. The person will be hired for about nine months to do IC work exclusively. It will be good to have someone to guide and direct the process. The main thing is good communication. Fern: I would propose an IC plan for the top species. I am hearing that we need to shift resources and we need to continue to spend time and money on our highest priorities. Adam R.: we should consider adding that element into all of our plans. I did a HISC pre-proposal for a comprehensive LFA aerial treatment.
- Adam: ivy gourd is small in terms of time commitment. Mike: we were close to successful until there were these new finds. It had to be a reintroduction. We were just monitoring for seedbank germination and now we have new large populations.

### **GENERAL UPDATES**

- Marshal: we have an inspector that has been working with the Department of Health (DOH). They found a semi-slug in Waianapapapa by the cabins. They are also working with a lot of the farmers out there. John from our staff is working with DOH. Fern: there was another case of rat lungworm out in Hana recently and another one on the Big Island. They took out over 1,000 rat traps to the

farmers out there. Adam R.: MISC's role is outreach and education. We are hoping to try to get more funding for Bishop Museum. Fern: I think people think it has gone away. There was a semi-slug found in Kula and a couple of other places recently. Marshal: DOH is the lead on rat lung worm.

- Adam K.: we captured a rabbit in Kula recently and took it to the Humane Society. We are still actively responding to rabbit reports. Most are in Kula.
- Abe: we have been spraying a lot and using some volunteers. We are repurposing reservoir tanks to finger gulches, which are the avenues where frogs are moving. We are trying to hit the outlying populations and continuing to loan sprayers to members of the community. We are still fine-tuning work flow and using apps to make the system scalable. Our data collection is online now. We can look at what happened yesterday. We have much better data collection and more real time access on the fly. Fern: do you continue to find new populations? Abe: there is a shift in numbers now that there are more inspections. We still have a lot of single frog reintroductions. HDOA is really helping us with the single frog reports. There are some other outlying frog issues that are super challenging. DLNR is helping us get rid of habitat so we can get to the frogs. We are also working with some new land developments and working with homeowners associations. Adam K.: we have had a good turnout of community members coming to get sprayers and citric. We are empowering people to do their own control work and getting data back from people.
- Mike: we finally got EMI access for frogs in December. Camping season starts April 9.
- Brooke: there were no LFA found during the last two surveys at Waihee. There has been a lot of tree work done on the site. The Kapalua site is greatly reduced. The treatments are quick and easy to do on two TMKs. The Haiku site is small and on one property. It is being diligently managed and is due for a resurvey. The Huelo site is diminished, but sections were delayed and those areas where we needed permission still need to be managed. There are a lot of large trees. We are still in the process of delimiting the Kaeleku site and filling in some of the gaps. There have been no LFA found downstream. The Hana Highway is serving as a barrier. There are no LFA across the highway except at the stream. Nahiku needs aerial treatment. Treatment is continuing in the areas where people live. Kihana Nursery is selling plants again. They did a Talstar treatment. There are LFA throughout the nursery. There are restrictions and what products can be used since it is a nursery. We need to get together with HDOA and agree on an action plan for going forward. This needs to happen ASAP.

### **PARTNER UPDATES**

- Chris: there is an ironwood wilt. It may be bacterial or fungal in nature. We are trying to find out more about it. We have no idea what the pathogen is. We are seeing it on the Waikapu slopes above the Kamehameha Golf Course. The dieback is patchy. A similar thing happened on Guam. I have contacted some folks on Guam for information. It spreads in a uniform way through large stands. It is becoming quite widespread. There are concerns about fuel loading, what will come in to replace it, erosion control, and wind breaks. We haven't seen it on coastal plants. Right now it is not within the partnership property area. On Guam, 80-90% of their ironwoods have been lost.

- Chuck: there is discussion of setting up spore samplers for ROD on Maui to see if we are getting wind spore inoculation. Even with the quarantine we could still get it here via vog, storm or wind. It may be premature to put the monitoring equipment on Maui given that long distance movement appears to be very rare. Detecting it on spore traps would probably not change what we are doing now, but it would raise awareness. ROD will get to Maui without any help eventually. Marshall: there have been interceptions in baggage for Hula Halau in leis and flowers.
- Forest: we are surveying the airport for LFA and coconut rhinoceros beetle.

**Next Meeting Date = July 12, 2018**