



## Invasive Pest Conference, 2023: A glimpse

Roshan Manandhar

Department of Plant and Environmental Protection Sciences, University of Hawai'i at Mānoa

Corresponding Author: [roshanm@hawaii.edu](mailto:roshanm@hawaii.edu)

A two-day conference on invasive pests at the Blaisdell Center in Honolulu, Oahu (August 9 -10, 2023) was successfully concluded. This conference featured 27 talks on a diversity of invasive pests ranging from weeds, agricultural and landscape pests, and other topics including climate change, and biological control presented by CTAHR research, extension faculty, and other partner agencies. It was great having a keynote speaker, Phillip Andreozzi, USDA Invasive Species Coordinator, who spoke twice at this conference. Phillip first shared his experience and insights of invasive species relating to our life, planet, and everything, then second on coordination, collaboration, and opportunities in invasive species projects in the Pacific.



Photo: (A) Conference in Progress, and (B) Hawai'i Invasive Species Council's Invasive Species Coordinator speaking on a progress of Hawai'i Interagency Biosecurity Plan (2017-2027)

The first few talks on each day focused on the policies, implementation, achievements, and future directions in invasive species management. The first presentation provided a progress of Hawai'i Interagency Biosecurity Plan (HIBP, 2017-2027), which is now halfway through with 39% of action plans (147) having been “completed” or “ongoing in perpetuity”; and appropriate steps have taken to move actions forward. A talk following this provided an overview of history,

and the various applications of the Hawai'i-Pacific Weed Risk Assessment, the strengths and weaknesses of the system, and prospects for the program going forward. In line with the HIBP, a talk introduced the Prevention Priority and Limited Distribution lists and highlighted some harmful invasive species whose impacts can be prevented. Another presentation provided details on a state-wide project to engage haumana (students) in grades K-12 in two legislative efforts that supported native species conservation in Hawai'i.

A couple of presentations highlighted the impacts of climate change on invasive species: Hawai'i's native forest birds experiencing drastic declines due to climate change leading to greater densities of its primary avian malaria vector; and the Pacific Regional Invasive Species and Climate Change (RISCC) Management Network. Then, a snail session – there were two presentations on species diversity of invasive terrestrial (including freshwater) snails and up-to-date surveys of introduced species, identification, establishment, and pathways of spread. A separate talk reviewed some of the known pests from these poorly studied groups (non-insect, invertebrates) that have become established in the islands, clarifying the identities and impacts of these species. Another talk also overviewed the Yellow crazy ants control program to conserve natural habitats on Johnston Atoll. Other talks were on the vertebrate invasive pests – the distribution and abundance of ungulate species across the Hawai'ian Islands; and feasibility and effectiveness of a new self-resetting trap called AT-220 to control small vertebrates (rats, mongoose, etc.) in the island ecosystem.

Two small sessions on Coconut rhinoceros beetle (CRB) and Coffee pests were the next attraction. In the CRB session, the first presentation discussed the current status and future direction of CRB response. The second presented the Master Gardeners Program to motivate the public to prevent CRB spread on Oahu, and the final one presented recent tools to survey for CRB (trap with the Rhino Cam) and on the aerial application of insecticide into palm crowns to control CRB. In the coffee pest session, for improved IPM of Coffee berry borer, future research needs on the introduction and establishment of a parasitoid *Phymastichus coffea* were highlighted. Three additional presentations were on Coffee leaf rust, which discussed what we have learned from the past two years' infestation, research updates at Kona Research and Extension Center and its management using systemic and biological fungicides.

There were many other topics in the final session. Recent studies that are effective in fighting against Rapid Ōhi‘a Death and protecting our native Ōhi‘a forest were discussed. The statewide diamondback moth IPM program provided growers with an insecticide rotation schedule to mitigate DBM crop loss. A presentation revealed organic herbicides were not effective in controlling the Devil weed, thus emphasizing the importance of conventional herbicides. The next talk reviewed the dual impacts of a biological control agent that controlled fireweed and spreads naturally to Cape ivy. A brief overview of factors leading to successful and environmentally safe biological control was provided. Finally, an impact statement on Invasive Pest Communication and Networking through a number of Invasive Pest Mini-conferences that reached out to many stakeholders in Hawai‘i and beyond was highlighted. For the detailed information of presentation: title, author, co-authors (if any), their affiliations and the abstract, please click [Abstract](#).

The conference was well attended with more than 70 participants, mostly from CTAHR, State and Federal Agencies, Invasive Species Committees, Industries and Botanical gardens, non-profit organizations, etc. Apart from learning tons of things, participants had a good environment to communicate and share knowledge on invasive pest concerns with the others. A feedback report from participants is in pending.

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