GOV. MSG. NO. 701

Frederick Reppun





Professional Qualifications

Harvard University

Cambridge, MA

Environmental

A.B., 2007

Science and Public Policy

The Ohio State University

Columbus, OH Environme

Environmental

M.S., 2016

Science

Academic and Professional Positions

2023 - present	Assistant Specialist, Hawai'i Institute of Marine Biology (HIMB), University of Hawai'i at Mānoa, Kāne'ohe, HI; Education Coordinator, He'eia National Estuarine Research Reserve (NERR)
2018 - 2023	Junior Specialist, Hawai'i Institute of Marine Biology (HIMB), University of Hawai'i at Mānoa, Kāne'ohe, HI; Education Coordinator, He'eia National Estuarine Research Reserve (NERR)
2017-2018	Education Specialist, PLACES Program, University of Hawai'i at Mānoa, Honolulu, HI
2016-2017	Junior Extension Agent, Dept. of Tropical Plant and Soil Sciences, University of Hawai'i at Mānoa, Honolulu, HI
2014-2015	Graduate Administrative Assistant, Initiative for Food and AgriCultural Transformation, The Ohio State University, Columbus, OH
2013-2014	Research Assistant, Center for Industrial Ecology, Yale University, New Haven, CT
2012-2013	Project Coordinator, Hui Ulu Mea 'Ai, Kaneohe, HI
2012-2103	Lecturer and Project Coordinator, GoFarm Hawai'i, University of Hawai'i Windward Community College, Kāne'ohe, HI
2010-2012	High School Program Coordinator, MA'O Organic Farms, Wai'anae, HI
2008-2009	AmeriCorps VISTA volunteer, The Urban Ecology Institute, Boston College, Boston, MA

Selected Products, Publications, and Presentations

- 1. Ayau, L. C. Beebe, N. Goo, M. Kahoʻohanohano, F. Reppun, et al. (2021). "What is Research Good For? Improving Place-Based Management through Reciprocal Collaboration." Hawaiʻi Conservation Conference, online.
- 2. He'eia National Estuarine Research Reserve Management Plan. December 2021. Prepared for the National Oceanic and Atmospheric Administration. Honolulu, Hawai'i.
- 3. Reppun, F, J Deenik, J Martin, and C Hoy. "Effects of Fresh and Anaerobically Digested Algae (G. Salicornia) as Soil Amendments on Yield and Nutrient Concentrations of Pak Choy." Agroecology and Sustainable Food Systems 45, no. 9 (October 21, 2021): 1270–99. https://doi.org/10.1080/21683565.2021.1917470.
- 4. Reppun, F, J Syvertsen, J Martin, J Deenik, and C Hoy. "Soil Management Practices of Farmers in the Kāne'ohe Bay Watershed and Potential for Implementing Algae-Based Soil Amendments."

Agroecology and Sustainable Food Systems, September 14, 2020. https://doi.org/10.1080/21683565.2020.1813233.

- 5. Winter, KB., NK Lincoln, F Berkes, F. Reppun, et al. "Ecomimicry in Indigenous Resource Management: Optimizing Ecosystem Services to Achieve Resource Abundance, with Examples from Hawai'i." Ecology and Society 25, no. 2 (June 2020): 1–18. https://doi.org/10.5751/ES-11539-250226.
- 6. Winter, KB., YM Rii, F Reppun, et al. "Collaborative Research to Inform Adaptive Comanagement: A Framework for the He'eia National Estuarine Research Reserve." Ecology and Society 25, no. 4 (2020). https://doi.org/10.5751/es-11895-250415.
- 7. Reppun, F. October 2019. Developing dual fluencies in indigenous places to navigate the 21st century. National Diversity in STEM Conference, Society for the Advancement of Chicanos/Hispanics and Native Americans in Science; Honolulu, HI. Oral presentation.
- 8. Reppun, F. and Falinski, K. (2019). Engaging Community to Restore Wetland Kalo and Study Water Recharge. Pacific Water Conference; Honolulu, HI.
- 9. F Reppun, J Silva, K Wong, and J Deenik. "A Soil Phosphorus Primer for Hawaiian Soils." Soil and Crop Management 33. College of Tropical Agriculture and Human Resources, University of Hawaiia at Mānoa, 2017.

Current Responsibilities and Recent Activities

- 1. Coordination of community-driven education programs with numerous site partners, stakeholders, and other researchers and educators to promote Indigenous and Western scientific knowledge of watershed and estuarine systems.
- 2. Coordination of 'āina-based education professional development program for teachers.
- 3. Mentoring graduate and undergraduate student researchers, aligning their research projects with needs of non-profit community partners.
- 4. Co-Investigator on a study of groundwater-surface water dynamics in the He'eia watershed, wetland, and estuary. Study aims to map and quantify major areas of discharge and recharge, and analyze flows for N, P, Si, and other nutrients.
- 5. Kāne'ohe Bay Regional Council, State Legislature-appointed voting member, 2020-present. Council advises policymakers on issues related to health and use of the bay.
- 6. Develop and teach hands-on, interdisciplinary courses at the community college to graduate school level. Topics have included the science and culture of Hawaiian taro agroecosystems, cooking with locally-grown ingredients, and research ethics and place-based methodologies.
- 10. Coordinated project funded by Hawai'i Commission on Water Resource Management entitled "Engaging Community to Restore Wetland Kalo and Study Water Recharge."

Skills and Interests

Volunteer work: invasive species control (albizia, little fire ant), support for community-based renewable energy systems

Hobbies: hiking, sailing, surfing, gardening, travel

Languages: Chinese (conversational)