

MEET A MALACOLOGIST

REBECCA J. RUNDELL

Associate Professor
 Head Curator, Roosevelt Wild Life Collections
 State University of New York
 College of Environmental Science and Forestry
 Dept of Environmental and Forest Biology
 Syracuse, New York USA
www.snailevolution.org
rundell@esf.edu



Photo: Dr. Rebecca Rundell



Photo: Palau from a plane.

What do you do (related to mollusks)?

- I am a professor and do research on the evolution, biogeography, and conservation of Pacific island land snails, especially those from Micronesia and the Republic of Palau. I am also the new Editor-in-Chief of *Malacologia*, the International Journal of Malacology.

How did you come to be doing that (who or what influenced you)?

- Rob Cowie took me in the field with him to the Big Island of Hawaii, and American Samoa, during my Master's degree with him at the Bishop Museum. I was fully intending to go on to study marine invertebrates, but after spending that time amongst the tree ferns in the rain and mud with Rob, I knew I was going to dedicate my life to Pacific island land snails.

What is (are) your main project(s)?

- I work on the molecular phylogenetics, geographic distribution, shell morphology, and conservation of endemic land snails of Palau and Micronesia, alongside my graduate students who are also mainly focused in this area. I am collaborating with Carl Christensen (Bishop Museum) on a Hawaiian land snail project. I also lead a large collaborative project on the conservation of New York State's Chittenango ovate amber snail.

How would you explain to an educated layperson the importance of your project?

- Land snails give us important insights on how life on Earth has evolved and why we have so many species. Tropical land snails in particular are important to study because there are so many species still unknown, yet they are rapidly going extinct.

What accomplishment(s) make you feel particularly proud?

- Establishing a field program in the Republic of Palau with the help and inspiration of local people and organizations. After 20 years of working in Palau, I am starting to feel like I can be useful.

What are the biggest challenges you face in achieving your goals (mollusk-related or otherwise)?

- There are more funds available to work on certain questions or model systems in the U.S. than there is for biodiversity exploration and conservation in remote tropical forests. As a wealthy country I think we have a responsibility to invest in science that is interesting and important, whether or not it builds status, creates revenue, or yields immediate medical or technological benefit.

Describe an exciting experience in the field.

- I almost stepped on a sea snake in the leaf litter. Together, we immediately ran and slithered to the ocean for safety.

What have you done for AMS and what has AMS done for you?

- I am so grateful to the many AMS malacologists who encouraged and inspired me along my path and created a welcoming environment for students. One of them (Rüdiger Bieler) even became my Ph.D. adviser. Now that I have a job in molluscs, I hope to draw my own snailly students into AMS.

What is your favorite mollusk or group of mollusks and why?

- Extinct Hawaiian *Carelia*. Pacific paradise is a carpet of large leaf litter-dwelling land snails.

If you could chat with any malacologist, past, present, or future, who would it be and why?

- I would like to have a snail morphology dinner with Steve Gould. When he was alive I think we took him for granted, maybe because he was viewed as a "public scientist." I encourage new malacology students to read his books and papers and remember that he was one of us.

What advice do you have for young people entering the field of Malacology?

- Persist in the field. There are many more biologists studying animals like birds, mammals, herps, and even arthropods, despite the fact that there are so many species of molluscs. We need students to turn their passion for molluscs into scientific careers that push the frontier of research on these animals. Otherwise, we are going to have a skewed and inaccurate view of life on Earth.

What energizes you to study mollusks?

- Being in the rainforest with Palauan community members and watching someone light up the first time they see a species they had not noticed before.

If you could reincarnate as any mollusk, what would it be and why?

- I admire the lifestyle of infaunal bivalves, but realistically I will always be a carrier shell. Probably most of us who are drawn to collections-based research can relate!

What's the best piece of advice anyone ever gave you?

- When someone gives you edits on something you've written, use that opportunity to improve your writing. Anyone at any career stage should seek to improve their writing. From a practical perspective, reading and writing also improve your public speaking.

What literature or other media have you consumed lately?

- *The Outlaw Ocean* by Ian Urbina. Many of us were drawn to molluscs in part because we were attracted to the ocean as a source of inspiration, adventure, and calm. Urbina's book brings attention to what humans are *really* doing on, around, and under the ocean. It should make us act together as citizens to bring attention to these issues and seek to change national and international policy and enforcement.

Tell us something that recently made you smile.

- Seeing the incremental successes of my graduate students. And snail jokes by Tim Pearce.

THREE SELECTED READINGS:

Rundell, R.J. 2008. Cryptic diversity, molecular phylogeny and biogeography of the rock- and leaf litter-dwelling land snails of Belau (Republic of Palau, Oceania). *Philosophical Transactions of the Royal Society B Biological Sciences* 363(1508): 3401-3412.

Rundell, R.J. 2011. Snails on an evolutionary tree: Gulick, speciation, and isolation. *American Malacological Bulletin* 29(1/2): 145-157.

Czekanski-Moir, J.E. and R.J. Rundell. 2020. Endless forms most stupid, icky, and small: The preponderance of noncharismatic invertebrates as integral to a biologically sound view of life. *Ecology and Evolution* 10: 12638-12649. <https://onlinelibrary.wiley.com/doi/pdf/10.1002/ec3.6892>



FUNDING OPPORTUNITIES

THE J FRANCES ALLEN INSTITUTE OF MALACOLOGY STUDENT RESEARCH AWARD

Submitted by Ellen Strong, Past AMS President

The Board of Directors of the Institute of Malacology, publisher of the academic journal *Malacologia*, is pleased to announce the J. Frances Allen Student Research Award. The purpose of these awards is to support undergraduate (bachelor's) and graduate (Master's, Ph.D.) research on mollusks conducted by a student enrolled in a degree-granting program. Recipients should plan on