



SCHOOL OF AQUATIC AND FISHERY SCIENCES
UNIVERSITY OF WASHINGTON

2026 Autumn Seminar Series

October 15, 4:00PM
Thursday (Th) (FSH 107)

Global parasite biodiversity

Scott Gardner

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Parasites are ubiquitous in natural systems with most estimates showing that there are between 2 and 4 times as many parasites on earth as free-living animals. I will discuss parasite diversity using examples from work done globally with information from collecting expeditions of terrestrial vertebrates in Bolivia, Mongolia, and even in Nebraska. The talk will center on parasites with complex life-cycles, including cestodes of the family Linstowiidae in South America, and taeniid tapeworms with a cosmopolitan distribution. Some focus will be applied to the pathogenic tapeworm *Echinococcus* which has been shown to either have an expanding range in the Nearctic or biologists are just beginning to recognize the true nature of its geographic distribution. Ecological niche models based on museum verified specimens were used to examine the potential geographical extent of this species and it appears that our predictions were accurate. I will also mention the 2nd edition of our book, *Concepts in Animal Parasitology*, which is available free on-line.

My program of NSF-funded research is focused on the evolutionary relationships among neotropical rodents and marsupials and their parasite faunas. I investigate questions of mammalian and faunal biodiversity by generating and combining data on the phylogenetic, biogeographic, and ecological relationships of hosts and parasites.

Accommodation requests related to a disability or health condition should be made before the event by contacting Jon Wittouck, Assistant Director, Facilities for SAFS: 206-616-8552/ wittouck@uw.edu.

Photo: Courtesy of Scott Gardner

