

Project Update: December 2001

I recently returned from an expedition to north-western Costa Rica, where I undertook experiments investigating the relationship between biodiversity and ecosystem functioning. The experiments were performed using bromeliad plants, which house diverse assemblages of insect larvae and microbes in the rainwater trapped in the bromeliad leaves.

Using these miniature ecosystems, I performed an experiment in which the biodiversity of insect larvae and the presence of a top predator was manipulated, and measured a variety of ecosystem functions, including the decomposition rate and the biodiversity of micro-metazoans and unicellular protists. The experiment was successful in that the communities were successfully manipulated. I have since returned with the samples to Vancouver, and I am working to describe the microbial communities that developed under the different experimental treatments. I hope to complete this work within the next month.