

## Nitrogen Systems: Policy-oriented Integrated Research and Education NSPIRE



## Fun with learning? Activating learning in the college classroom



Dr. Teri Balser

Dean and Professor, University of Florida

Wednesday, March 6, 2013

4:10-5:00pm

CUE 209

Dr. Teri Balser, Dean and Professor at University of Florida will give a seminar on active learning and engagement in the classroom. Participants will explore elements of active, engaged learning and will focus on the use of a game (The NGame) in helping students learn about complex topics such as nitrogen cycling. The NGame is a dynamic game-based learning tool designed to encourage student engagement with basic science content situated in a broader ecological context. Players participate in a strategic race to move nitrogen from the atmosphere, through its various forms in the soil ecosystem, and back. The NGame familiarizes students with the terminology of nutrient cycles, the types and sequence of chemical transformations that make up the N cycle, the centrality of microbiology in sustaining these processes, and the feedbacks between environment and organisms. Participants will have an opportunity to learn and play The NGame, and discuss innovative teaching strategies that encourage hands on, experiential learning. Dr. Balser is very involved in teaching development and has given numerous workshops and plenary talks on active learning and engagement, the future of teaching, and using games in the classroom.

Dr. Teresa Balser is Dean of the College of Agricultural and Life Sciences, and a Professor of Soil and Water Science at the University of Florida. Dr. Balser earned her Ph.D. in soil microbiology from the University of California at Berkeley, followed by postdoctoral research in ecosystem ecology at Stanford University. In 2001, Dr. Balser joined the University of Wisconsin-Madison Department of Soil Science as an Assistant Professor of Soil and Ecosystem Ecology. Following tenure and promotion to Associate Professor she was appointed as Director of the Institute for Biology Education at UW-Madison. As Director, she was responsible for working with the Council of Biodeans in overseeing all aspects of biology education on campus including outreach and continuing education. Dr. Balser also maintained an active collaborative, interdisciplinary research program in soil science with funding from the National Science Foundation (including a 2006 NSF Early Career Award), USDA, the US DOE, and the University of Wisconsin Alumni Research Foundation. Her work in soil science is nationally and internationally known, and she is regularly invited to present in conferences, symposia and department seminars on topics including soil and climate change, carbon sequestration, and ecosystem ecology.