

## Community Convergence or Divergence in Response to Global Change

Organizers: Kimberly La Pierre, Sally Koerner, Kevin Wilcox, Meghan Avolio

The focus of our working group was to brainstorm future analyses to be conducted using a dataset of 82 plant community responses to global change drivers, which was compiled in part through a working group at ASM 2012 and a subsequent LNO funding stand-alone working group. We began the working group with a short presentation describing the dataset and analyses currently underway. We then opened the discussion up to all participants for the remainder of the session.

We had 27 participants in the working group. We initially split the participants randomly into groups of 4-5 to brainstorm as many questions as they could come up with that could be addressed with the dataset we have in hand. We then came back together as a big group to write out all of the questions generated on the big notepad in the room. Across all groups, we generated 20 new questions for future pursuit. These questions spanned a broad range of ideas and generated a lot of enthusiasm from the working group participants. We next chose a subset of five questions that participants were most excited about and split back out into groups to brainstorm how to pursue these questions. In the end, we had participants step up to lead the follow-up work for each of these five questions. The five questions and the project leaders are listed below:

(1) How does resource manipulation change the trajectory of plant communities through time? Examining transient and alternate community states in response to triggers (climatic or otherwise). Lead: Zak Ratajczak

(2) How does initial alpha diversity affect how much communities respond to resource manipulations? Leads: Marko Spasojevic, Sara Baer, Kevin Wilcox

(3) What is the relationship between plant communities and weather? How do resource manipulations change this relationship? Leads: Bill Bowman, Siddarth Iyengar

(4) Is there a phylogenetic signal to species responses to resource manipulations? Leads: Nate Lemoine, Patrick Kearns

(5) Are community responses to resource manipulations determined by the functional traits of the species? This could be tackled at the community or species level, and will require the collection of trait data. Leads: Kaitlyn Kimmel, Peter Reich, Mark Anthony

Overall, we accomplished our goal of publicizing our dataset and generating exciting new questions to address with the data we have already collected. We also have a list of participants who would be interested in exploring this idea further. Toward this end, we would be very interested in submitting a proposal to the LNO for future working group meetings to further develop these ideas.

Participants:

Gus Shaver

Zak Ratajczak

Bill Bowman

Teal Potter

Eve Gasarch  
Sara Baer  
Emma Rossi-  
Marshall  
Marko Spasojevic  
Luca Mararri  
Lauren Hallet  
Nate  
Kevin  
Julie Ripplinger  
Patrick Kearns  
David Johnson  
Mark Anthony  
Mustafa Saifuddin  
Sarah Merolla  
Bridget Shayka  
Ashley Asmus  
Katilyn Kimmell  
Siddarth Iyengar  
Lauren Alteio  
Peter Reich  
Brad Gottshall  
Laureno Ghir  
Forest Isbell