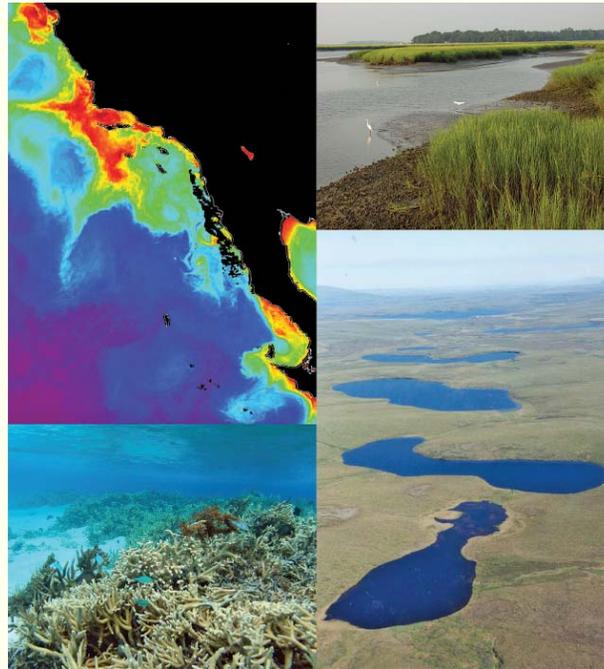


Expanding the U.S. network of Coastal Ocean Ecosystem LTER's



www.lternet.edu

A discussion at the LTER All-Scientists Meeting, Estes Park, CO
2 Sept. 2015

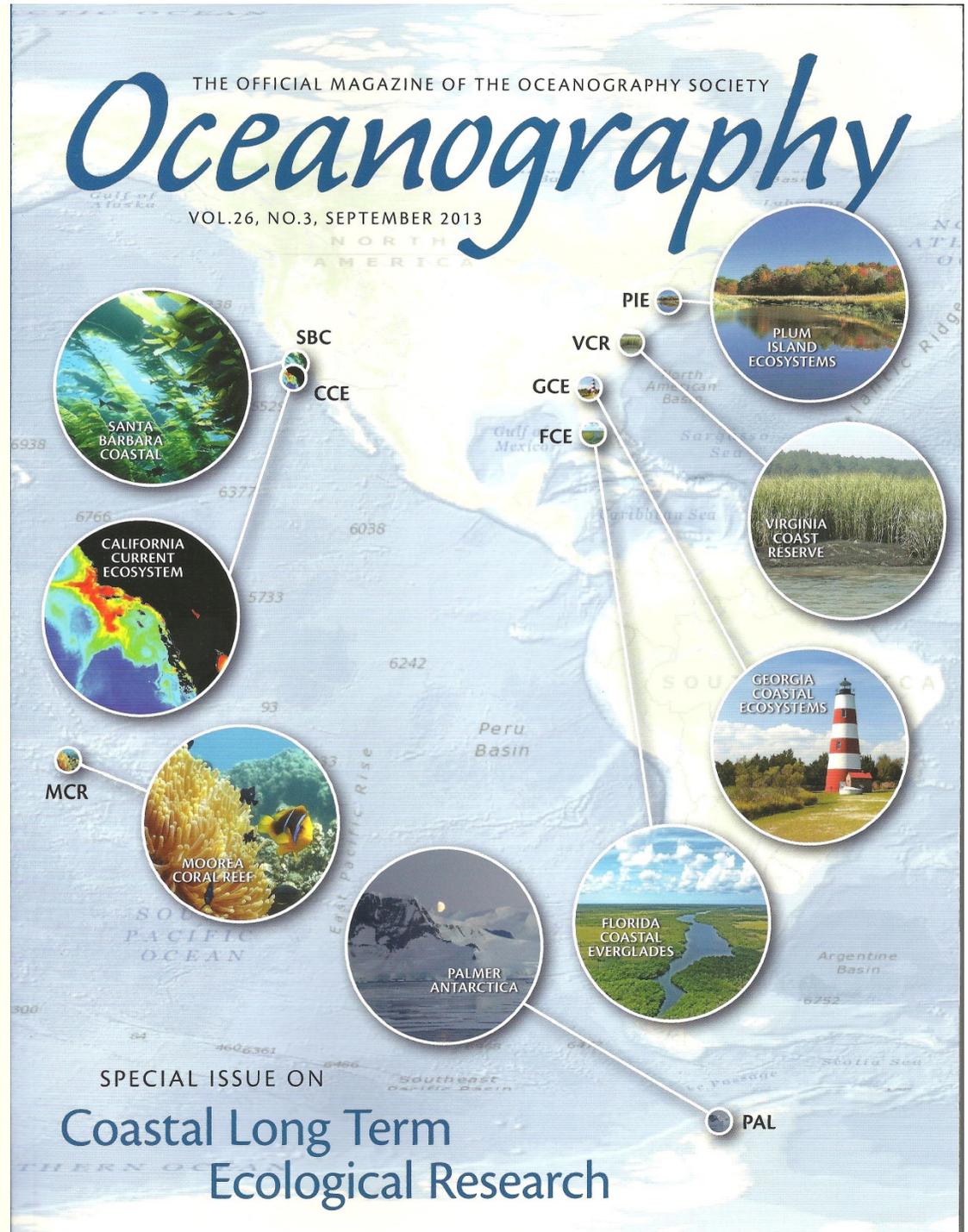
Led by Mark Ohman (*California Current Ecosystem*) and
Anne Giblin (*Plum Island Ecosystems*)

Coastal / Marine Sites currently in the US LTER Network

- 8 of the current LTER sites focus on coastal marine ecosystems
- Diverse set of coastal / marine biomes & research themes



The Long Term Ecological Research Network



The following comments reflect the diversity of individual viewpoints articulated during the workshop discussion and are not intended to represent priorities or a consensus of any kind, nor do they reflect the opinions of NSF. Scientists interested in submitting a pre-proposal for a future coastal LTER should carefully read the proposal solicitation when it appears. At this time the date for that release is not known.

Some potential criteria for new site selection, for discussion:

- research excellence
- biotic or biogeochemical sensitivities
- representativeness of biome
- uniqueness of biome
- opportunities for comparative cross-site analyses
- presence of long-term contextual data
- linkages to other research infrastructure
- lack of existing coverage (holes on the map?)

Discussion points raised during workshop (p. 1 of 2)

- Ability to assemble an effective management team is important
- A critical mass of sites may be valuable in order to do cross-site comparisons (one opinion: Gulf Coast wetland site would be valuable)
- Counterpoint: Adding new sites/biomes seems a more compelling argument than expanding potential for comparisons across similar biomes
- Consider diversity of biomes (although LTER not designed *a priori* to represent a particular spectrum of biomes)
- Consider diversity of **drivers**, as an alternative to diversity of biomes
- Consider existing initiatives (e.g., SEES, OA, BON, etc.); leverage existing activity and infrastructure; add complementary research through LTER
- Leverage ratio for mature LTER sites is often 3-4:1 (non-LTER:LTER funds)
- The LTER network could do more land-ocean connectivity
- Culture of cooperative science; benefits to bringing the LTER culture to a new group of scientists
- Pre-existing data provide context for LTER site-specific hypotheses (while not critical, pre-existing data can provide a huge advantage)

Discussion points raised during workshop (p. 2 of 2)

- Key elements: ** Good people, really interesting places; ** diverse enough that the questions can turnover; change occurs at relevant timescales; attractive to students
- Societal impacts; as a network, consider sites across a gradient of different levels of human influences; place in context of other sites in network
- Consider locations known to be vulnerable to change and impacts
- Consider novel ways of incorporating autonomous instrumentation into research
- Laurentian Great Lakes should also be eligible for this competition
- Stability of supporting infrastructure is a consideration
- Merits to resurrecting analog data records to permit deeper time analyses
- Project doesn't have to be centered at a single institution
- Importance of **Conceptual Models** that have continuity, yet flexibility
- Need to understand the essence of an LTER site; what constitutes the 'core' of an LTER site; experimental, hypothesis-driven science is critical, not just times series and inventories