Steven

* Chemistry of ocean acidification and how it is manipulated in experiments
  + Compare/contrast changes in pCO2 vs. pH
* Effects of OA on physiology: how is this tested experimentally? What does it mean?
  + Effects of OA in all its forms (i.e. pH, pCO2) on shellfish physiology
* All class material
* Cell/molecular biology
* Effects of combined stressors, e.g. pathogen + OA

Lorenz

* Theory and evidence for adaptation to environmental changes
* How rapid is evolution?
* Beyond marine larvae – what is the population ecology and demography behind adaptation to a changing environment?
* Example: Galapagos finches – cost to adaptation is the population growth rate

Carolyn

* Complete understanding of OA chemistry
* How to design an experiment to understand the impacts of OA on cultured animals
* How to select sustainable species for a changing environment
  + How would an experiment determine that?
  + Which species would do better under OA conditions?
* Disease

Joth

* Molluscan physiology with an emphasis on the influence of food supply, temperature, salinity, and other potential stresses on physiology
* Larval physiology with specific reference to environmental stressors (e.g. food supply, temperature, salinity, and pH, etc.) for marine invertebrates generally
* Seawater chemistry as it impacts marine invertebrates (including carbonate cycle and causes of ocean acidification, etc.)
* Evolutionary biology of major marine invertebrate phyla and general response to environmental changes via adaptation, etc. Focus on Mollusca is fine but don’t ignore ehcinoderms and other shelled invertebrates.
* Differences in overall life history strategies of oysters with emphasis on cupped and flat oysters.