EEB 3898 – Field Methods in Fish Biology – Summer 2014 Field Exercise Report III guidelines Due Wednesday, June 25, 2014

Introduction and Methods: See general field report guidelines posted on the course website, as well as Lecture 3 for more information.

Analysis and results

- Calculate **relative abundance** as catch per unit effort (CPUE) for white catfish (*Ameirus catus*) and channel catfish (*Ictalurus punctatus*) from the Connecticut River.
 - o CPUE should be defined as catch per net day
 - We had 6 hoop nets out for 3 days = 18 net days
 - CPUE = # of individuals/18 net days
 - o **Plot** relative abundance data in whatever way you feel is most appropriate
- Create **length frequency histograms** for both catfish species to analyze differences in their size distributions

In your discussion, answer the following questions:

- Which catfish species are the most abundant in the Connecticut river?
- Are these real differences in relative abundance or the result of sampling bias? Is there gear bias, time of day bias, season bias? What could be influencing these results besides true differences in relative abundance?
- How do length distributions differ between catfish species? Speculate on the cause of any differences.
- Comment on the fish that were captured via boat electrofishing. Discuss why we did or did not see overlap in the species captured using these techniques, even though both gears were fishing in the same location.