Interactive comment on “Physiological basis for high CO$_2$ tolerance in marine ectothermic animals: pre-adaptation through lifestyle and ontogeny?” by F. Melzner et al.

F. Melzner
fmelzner@ifm-geomar.de

Received and published: 29 July 2009

Dear Reviewer, thanks for your good suggestions. We slightly expanded the section on pCO$_2$ variability in the natural habitat, which, as you pointed out, probably is very important in defining vulnerability towards future change in pCO$_2$. Figure 5 was meant to illustrate the general principle (i.e. animals with high acid-base regulatory abilities are equipped with similarly powerful ion regulatory machinery in their gills) more than to conduct an exact quantitative survey. The database for that would not be sufficient, you are definitively right.

Interactive comment on Biogeosciences Discuss., 6, 4693, 2009.

C1372