Interactive comment on “Carbon dynamics in the Mekong Delta” by Alberto V. Borges et al.

Anonymous Referee #1

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I read this manuscript with interest as it contains an excellent set of data in a large estuary. It is, however, a bit long especially the abstract. I have sampled in the Mekong Delta several times myself but the branch and place names are not familiar even to me. They should be omitted from the abstract.

My concerns are all minor:

1. The deltaTA/deltaDIC ratio of 0.55-0.87 is attributed only to aerobic degradation of organic matter and sulfate reduction. I don’t understand why dissolution of calcite/aragonite and dolomite is not at play.

2. Many figures show good correlations but with only a few points. The high correlation coefficients, however, may not be statistically significant due to the small sample size. The p values should also be shown.

3. The authors stated, correctly, that CH4 has received much less attention on shelves compared to CO2. But, surely the authors know that Tseng et al., CSR, 2017, 135, 23-34 published CH4 data on shelves off the Mekong River delta.

4. A recent paper in JGR Biogeosciences(Huang et al., 2017, 122, 1239) reported carbon export from many rivers around the SCS. A comparison would be of interest.