

Revisions for EGUSPHERE-2022-641

Towards an ensemble-based evaluation of land surface models in light of uncertain forcings and observations

8 November 2022

Dear Associate Editor,

Thank you for giving us the opportunity to revise our manuscript following the reviewers' comments. We have taken all of the reviewers' comments into consideration while revising our manuscript as detailed in our response to the reviewers' comments in the Discussion section of our manuscript available online.

<https://egusphere.copernicus.org/preprints/2022/egusphere-2022-641/>

In particular, all model results figures have been modified to address the reviewers' concerns. Following their advice, we have moved the figures that showed results from all simulations to the appendix and moved the figures that showed ensemble-averaged results to the main text. We have also added the description of our model benchmarking approach to the appendix.

We have modified text at multiple places to provide additional information and clarifications to satisfy the reviewers' concerns.

Reviewer #1 raised concern that our approach does not take into account the uncertainty associated with the implementation of land use change. We have made this explicitly clear in the abstract, as well as in the main text and the Conclusions section.

Many thanks,  
Vivek.