

Geosci. Model Dev. Discuss., author comment AC1
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Reply on CC1

Licheng Liu et al.

Author comment on "KGML-ag: a modeling framework of knowledge-guided machine learning to simulate agroecosystems: a case study of estimating N₂O emission using data from mesocosm experiments" by Licheng Liu et al., Geosci. Model Dev. Discuss., <https://doi.org/10.5194/gmd-2021-317-AC1>, 2021

Hi Ather Abbas,

Thank you for posting this comment out. The feature importance test for our 4-layer GRU models were conducted by perturbation importance method. Specifically, we replaced one input feature of synthetic data with a Gaussian noise with mean $\mu=0$ and standard deviation $\sigma=0.01$, while keeping others untouched. The experiment was conducted during testing stage and performance drop ($\Delta RMSE$) was used as the score of feature importance. More details can be found in lines 220-225 of maintext.

Best regards,

Licheng Liu