

The authors responded to each reviewer comment clearly and carefully, and the manuscript is much improved. I think this manuscript will be an important contribution to the atmospheric deposition modeling literature, and I look forward to seeing it in press.

I have only a few very minor wording suggestions:

Line 75: Check subject-verb agreement.

We have edited to reflect proper subject-verb agreement.

Lines 141-142: I appreciate the clarification that the measurement-model fusion was not applied to the dry deposition, but this sentence is now confusing. It is not clear what is not being applied to the dry deposition.

We have broken this sentence into two parts to clarify no adjustment was done to dry deposition:

The modeled wet deposition fields are adjusted to account for input biases and uncertainty in the chemical and physical processes governing deposition. No corrections are applied to dry deposition due to limited dry deposition measurements.

Line 245: Missing space between SO₄ and concentrations.

Thank you for catching this error.

Line 321: The use of "on the other hand" here is confusing because the story remains the same - the trend is still greater in 2002-2009 and then levels out (and becomes slightly positive) in the later time period.

"On the other hand" was used to highlight that the South was the only region that indicated a positive N deposition trend from 2010-2017. This sentence was clarified to read:

On the other hand, the South is the only region with a very small increasing trend of ~0.01 kg-N/ha/yr of total N deposition with large variability from 2010-2017, but also indicates a larger declining trend of -0.08 kg-N/ha/yr from 2002-2009.

Lines 393-395: The use of "to" instead of a dash to indicate a range of values is confusing here. I would recommend using a dash for each range of values, as is done on line 399 for the percentages.

We have made the change as suggested.