

Hello Dr. Khosrawi,

Thanks for these comments, they are highly appreciated.

Regarding the ACE team, their policy, communicated to me in an email, is this: "If one of our team members were involved in data analysis then a co-authorship would be warranted. Otherwise, we don't ask for co-authorship but only acknowledgement and reference." However, I'll ask again for good measure.

Thank you for the references. I am unfamiliar with several of the newer ones.

>A major point that does not become clear from your study is if you are assessing the accuracy of the
>ACE-FTS isotope measurements or the accuracy airborne in-situ instruments? What actually is the
>intention of the study should be more clearly pointed out.

This is a good point, and in revising the paper I will make it more clear what the main point is. The original intent with this study was to respond to statements in the literature such as those found in Fueglistaler et al. 2009 (see Section 2.6 and Figure 10) suggesting a need for reconciliation between satellite and in situ measurements of water isotopologues before either could properly be used for interpretation. As with so many things, it is not that simple. As Chris notes in his review either or both of the satellite and in situ retrievals could be biased, and the biases may change based on altitude, the presence of cirrus, or the sampling priorities of the in situ measurements.

Thanks again,

Ben