

Interactive comment on “A model-based approach to adjust microwave observations for operational applications: results of a campaign at Munich Airport in winter 2011/2012” by J. Güldner

Anonymous Referee #1

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The regression method presented minimizes radiometer retrieval bias with respect to radiosondes. However, systematic radiosonde humidity error has been identified (Miloshevich et al, 2009) and microwave radiometer data are used to correct this error (Cady-Pereira et al, 2008). This should be discussed.

The observation error typically assigned to radiosonde data when they are assimilated into numerical weather models (Cimini et al, 2011) should also be discussed. This would provide useful perspective on the relative magnitude and importance of radiometer bias with respect to radiosondes.

Cady-Pereira et al, Improved Daytime Column-Integrated Precipitable Water Vapor

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from Vaisala Radiosonde Humidity Sensors, JAOT, 2008.

Cimini et al, Thermodynamic Atmospheric Profiling during the 2010 Winter Olympics Using Ground-based Microwave Radiometry, TGRS, 2011.

Miloshevich et al, Accuracy assessment and correction of Vaisala RS92 radiosonde water vapor measurements, JGR, 2009.

Interactive comment on Atmos. Meas. Tech. Discuss., 6, 2935, 2013.