Atmos. Chem. Phys. Discuss., https://doi.org/10.5194/acp-2020-1173-RC2, 2021 © Author(s) 2021. This work is distributed under the Creative Commons Attribution 4.0 License.



Interactive comment on "Measurement report: Spectral actinometry at SMEAR-Estonia" by Andres Kuusk and Joel Kuusk

Anonymous Referee #2

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This study reports the 8-year summertime observations of downwelling solar radiation in a research station in southeast Estonia. The observations include radiation across a range of spectrum and of both global and diffuse radiation. Some basic examinations and analyses of the observations from different perspectives are conducted. Although the data and the report themselves are useful, the manuscript lacks scientific insights. The major conclusion is that the ratio of the measured flux to possible total flux can dictate the cloud cover. This result itself is of little interest to the community, not to mention that it is subject to very weak justification (lack of actual cloud cover measurements) and is not fully discussed in terms of its potential impacts on the field. Although I understand that this manuscript, as a measurement report, is not science-oriented, the level of the scientific quality does not meet the basic standard of ACP for any kind

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of publication. For these reasons, I suggest rejection.

Interactive comment on Atmos. Chem. Phys. Discuss., https://doi.org/10.5194/acp-2020-1173, 2020.