

***Interactive comment on “Global modeling of primary biological particle concentrations with the EMAC chemistry-climate model” by Meryem Tanarhte et al.***

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1) In the parameterization of emission, recent field measurements of fluorescence show that there is an increase of primary biological particle during rainfall. It is likely that rain droplet splash would aerosolize more fungal spores and other biological particles. Your parameterization does not include a precipitation term to reflect that. Other authors (Huffman et al. 2013 doi:10.5194/acp-13-6151-2013; Schumacher et al. 2013, doi:10.5194/acp-13-11987-2013) have provided such a parameterization for rainfall. Could you comment on that ? 2) Burrows et al (2009) provided surface bacteria fluxes for terrestrial ecosystems. But over oceans, there is also bacterial fluxes. Is there an

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account for ocean flux bacteria in your model ?

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C2