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Interactive comment on "Contributions of biomass-burning, urban, and biogenic emissions to the concentrations and light-absorbing properties of particulate matter in central Amazonia during the dry season" *by* Suzane S. de Sá et al.

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I would like to offer a few comments based on a quick reading.

In Section 3.2.2 the authors estimated the mass absorption efficiency (MAE) of different PMF ACSM factors using multivariate linear regression (MLR). Using PMF factors in the MLR, rather than individual chemical species, has the great advantage of providing the MAE of atmospheric particles taking into consideration their mixing state in the

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atmosphere. However, as reported by the authors, the number of papers presenting MAE (or mass scattering efficiency; MSE) of pollutant sources is rather scarce. Here, I would like to suggest the authors to cite another recent paper (Ealo et al., ACP, 2018) where both the MAE and MSE of different PMF sources were reported. The chemical speciated data used in Ealo et al. (2018) were obtained from chemical analysis of 24h filters. In Ealo et al. (2018) the highest MAE was calculated for the Traffic source (around 1.7 m2/g at 637 nm).

Moreover, Ealo et al. (2018) also reported the correlation between measured and modelled aerosol particle scattering (R2 = 0.85) and absorption (R2 = 0.76).

Ealo, M., Alastuey, A., Pérez, N., Ripoll, A., Querol, X., and Pandolfi, M.: Impact of aerosol particle sources on optical properties in urban, regional and remote areas in the north-western Mediterranean, Atmos. Chem. Phys., 18, 1149-1169, https://doi.org/10.5194/acp-18-1149-2018, 2018.

Interactive comment on Atmos. Chem. Phys. Discuss., https://doi.org/10.5194/acp-2018-1309, 2019.