

Atmos. Chem. Phys. Discuss., referee comment RC1
<https://doi.org/10.5194/acp-2021-311-RC1>, 2021
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Comment on acp-2021-311

Anonymous Referee #2

Referee comment on "Measurement report: Spatiotemporal and policy-related variations of PM_{2.5} composition and sources during 2015-2019 at multiple sites in a Chinese megacity" by Xinyao Feng et al., Atmos. Chem. Phys. Discuss., <https://doi.org/10.5194/acp-2021-311-RC1>, 2021

This manuscript, Spatiotemporal and policy-related variations of PM_{2.5} compositions and sources during 2015-2019 at multisite of a Chinese megacity, has been studied the relationship among urbanization, policy and PM_{2.5} components variation in a fast-developing Chinese city. This manuscript investigated the spatiotemporal and policy-related variations of PM_{2.5} components and sources via the methods of Hierarchical Cluster Analysis and PMF, etc. Meanwhile, source weighted PSCF was developed in this work. The results and method can be useful for further policy formulation in most developing and polluted countries as well as supply basic information for future epidemiological studies. I recommend the manuscript to be published after minor corrections.

Some minor corrections were as followed:

- (1) Latitude and longitude should be added in Figure 1 and Figure 8.
- (2) It is suggested that the coordinates of industrial factories could be added to Figure 1.
- (3) Line 115: the start and end time of sampling day should be detailed.
- (4) In section 2.2, 24 chemical species in PM_{2.5} were analyzed and why only 22 chemical compositions were introduced into PMF.
- (5) Lines 173-174: why the time of "12 h" and "6 h" were chosen? Have you tried other time options? Such as the 24 h backward trajectories starting from the receptor site and 2 h time intervals during all sampling periods will chose.