

Interactive comment on “The Trace Element Composition of Size Fractionated Suspended Particulate Matter Samples from the Qatari EEZ of the Arabian Gulf: The Role of Atmospheric Dust” by Oguz Yigiterhan et al.

Anonymous Referee #2

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The manuscript on The Trace Element Composition of Size Fractionated Suspended Particulate Matter Samples from the Qatari EEZ of the Arabian Gulf: The Role of Atmospheric Dust by Yigiterhan et al presents work on the suspended particulate matter (SPM) from the Qatari EEZ. The samples have been collected during October 2012 and 2014. They have also used dust samples from the land that were previously collected. Trace element composition data of SPM is compared with that of leached, unleached dust, UCC and also applied various corrections like salt lithogenic corrections to get the clear idea of the source of the SPM. They have normalized the data

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with Al and also calculated excess metals using atmospheric dust as the background and fate of the dust reaching the EEZ is discussed. With help of the data the authors have distinguished between lithogenic and anthropogenic trace metals reaching the EEZ. The data is of interest as this is the first report and includes systematic study that will help in understanding the biogeochemistry. Abstract, Introduction, Study area, methods, Results discussions and conclusions are clear. Overall, manuscript is nicely written with the clarity that readers will understand. This manuscript has potential and I would suggest that the manuscript may be accepted with moderate revision as I find that there lot of repetitions in the text. The text could be further improved.

Specific comments have been included in the pdf attached.

I would suggest to reduce the number of figures or add them to the supplement

Results and discussion could be combined as same things are repeated.

Please check time of sample collection October or April?

Check tables 2 and 3- same stations during two different years? Change the tables or the captions.

Please also note the supplement to this comment:

<https://www.biogeosciences-discuss.net/bg-2019-183/bg-2019-183-RC2-supplement.pdf>

Interactive comment on Biogeosciences Discuss., <https://doi.org/10.5194/bg-2019-183>, 2019.

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