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Interactive comment on "Using ordered weight averaging (OWA) for multicriteria soil fertility evaluation by GIS (case study: southeast Iran)" *by* Marzieh Mokarram and Majid Hojati

Anonymous Referee #2

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In this paper, the concerns of articles, which are about how to incorporate the Inverse Distance Weighted (IDW) and Ordered Weighted Averaging(OWA) to make the multi-criteria soil fertility maps based on the GIS. It aims to introduce a method for farmers in case of make balance between their budget and their farm soil parameters.

Weakness: 1. The layout of samples is unreasonable, in the northeast and west part of which has no any sample. Moreover, the author did not verify the accuracy of the interpolation results in that part. Accordingly, it is doubtful in terms of the accuracy of their final results and the possibility of the agricultural application.

2. Although the method is good, it is only a general application of the methods, which has no much new ideas in the paper. Furthermore, the paper failed to explain how to

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make decision for the farmers based on these different criteria findings, which reduces the value of this paper.

3. One of the main weaknesses is its language. It is really hard to understand.

In details: 1. Line 127. Please provide additional information of the speciation of mineral elements in this paper. Does it means the total amount, available amount or others? 2. Tab 2. Please provide additional information on the chemical methods used in measuring these factors. 3. Tab 2. Content of OC is out of normal range. Please check the value and the unit. 4. Fig 2. Please add map elements in the Fig. 5. Fig 3. Please add the unit for the factors. 6. Line 268-269. I can hardly understand its meaning.

In summary, in this article, the idea is not innovative, the meaning is general, the design is defective, and the reliability of the results is in doubt. Thus, I would recommend to reject it.

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