SOIL Discuss.,
https://doi.org/10.5194/soil-2019-10-RC1, 2019

Interactive comment on "Changes in soil properties in a low-quality broadleaf mixed forest after cutting strip reforms in a 9-year period in Northeastern China" *by* Huiwen Guan et al.

Anonymous Referee #1

Received and published: 5 June 2019

The manuscript is not ready to be published in its current state. Some more work is necessary to be done by the authors in order to improve it both, from the scientific and formal/technical point of view. Besides the results from this kind of long-term experiment has a high potential applicability for forest management in low quality environments, the way that the data are analysed and the work presented make it very difficult to understand. Methodological section needs some more detail: the study area and experimental design is not well described: some information in relation to the soils in the area (texture, pH, for example), total area under study (only length is mentioned), number of trees in each plot, sampling date (is the same date all the years?...). In relation to the number of samples confusing information is given: 1

sample per plot?, 5 samples per strip? Composed? , three samples mixed???...In addition, it seems that 0-10 cm and 10-20 cm depth samples are taking (page 3, line 23) but this information is not given in tables... Also, if the soil depth is 30 cm (page 2 line 30), why did not do the sampling at this depth??; area occupied for each treatment; you should give some more detailed about the vicinity area selected as pre-cutting conditions (control): for example how far is it? A map indicating where the study area is, etc... should help to understand the experimental design. Some methods, in particular, soil physical properties, should be better described. Please, explain all the variables you are introduced in the analysis... Results are not well explained. Tables are very difficult to interpret. I suggest using figures instead. Also, no statistical analysis is reported. Thus, it is so difficult to interpret the results due the high variability among years and width strips. I would suggest using a general lineal model with repeated measurements ANOVA design and try to separate the effects of years and strip. Also the interactions.. Discussion section is very poor. Some more references and scientific explanations from the results should be included and discussed. There are quite a lot of technical errors through the mnuscript (marked in the annotated file), including the absence of the journals in some articles cited. In the attached file other comments are related.

Please also note the supplement to this comment:
https://www.soil-discuss.net/soil-2019-10/soil-2019-10-RC1-supplement.pdf

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