

Interactive comment on “Environmental soil quality index and indicators for a coal mining soil” by R. E. Masto et al.

Anonymous Referee #2

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The idea and objectives of the article are interesting and of general interest. However, I am very concerned about the experimental design. The description of the experimental design is very poor, without giving necessary details to really understand how sampling spots were selected and samples collected. However, it seems that only one area in an open pit and one are in an underground mine were selected. This is not representative to establish a soil quality index for a coal mining soil. According to the authors, this area has one of the largest reserves of coal in India, with high mining activity. Thus, a wider area should have been selected to really guarantee a representative set of samples. In addition, authors indicate that 32 samples were collected in the openpit mine, and 17 in the underground mine. However, there is no explanation about the criteria followed to select those spots, the distance between them, the distance to the mines, etc. In addition, I miss the selection of an area not directly affected by mining, with the

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same geological material and soils, as a reference soil, to really check how mining is affecting soil quality, and to assess if heavy metals are indeed accumulated by mining activities or are geogenic. For these reasons I cannot recommend this manuscript for publication.

Interactive comment on Solid Earth Discuss., 7, 617, 2015.