Review of: "The assessment of similarity vectors of fingerprint and UMLS in adverse drug reaction prediction"

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This is a study concerning several computational approaches to an adverse drug reaction. The authors have depicted four corresponding models based on random forest, neural networks, and two matrix factorization scenarios, respectively. The description of the feature similarity matrix is appropriate with fluent writing. The performance evaluation of the models is detailed and accurate. I also appreciate that the authors have released the source code. In my opinion, this paper could be published if it gains a minor revision towards the items listed below.

1. Several descriptions in the paper are inconsistent abbreviation formats. For example, it appears that one of the evaluation criteria is AUPR, but in the abstract, they wrote it as AUPRC. Moreover, the declared the results are written in the form as "ACC = %89.15, AUC = %96.14 and AUPRC = %92.9", while the numeric outcomes are written in decimal format. And I doubt that should the results can be written as "%xx. xx", not "xx.xx%"?

2. The authors declared at the end of the fifth page that "In Fig. 2., it can be seen Δ2 dataset includes adverse reactions, which are not more common in most drugs. Fig. 3. indicates Δ3 dataset contains rare adverse reactions". However, intuitively, it is bare can be said as their claiming. If the authors can more adequately explain the corresponding figures, it should be better.

3. The authors adopted AUC, AUPR, and ACC to evaluate the prediction effect of their models. It appears that they have obtained compatible results among the state-of-the-art works. Nevertheless, they have not mentioned the time cost detail of their models. If they can use numerical results or figures to illustrate the running time or give a comparison between other state-of-the-art works, the whole paper can be more persuasive.