

# Review of: "A Simple Preprocessing Method Enhances Machine Learning Application to EEG Data for Differential Diagnosis of Autism"

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Potential competing interests: No potential competing interests to declare.

1. Title: For scientific research purposes, it is advisable to replace the word "simple" with "novel".
2. Abstract: While the title emphasizes "Enhances Machine Learning Application", the abstract only discusses "building up a model of machine learning", which is indeed different.
3. Introduction: What is the scientific basis of the need for machine learning techniques, specifically KNN?
4. Methods: What is the scientific basis for segmenting EEG with a duration of 10 minutes?
5. Preprocessing phase:
  - a. It is advisable to add illustrations related to the data acquisition process and the overall proposed method. This is important to facilitate the reader's understanding.
  - b. What are the units of the values shown in Figure 1?
6. Results: It is important to show the confusion matrix of the predicted model results obtained.
7. In the Grossi 2017 study, using the same number of channels and MS-ROM/I-Fast achieved an accuracy of 100%, while in this study, with MST, an accuracy of 94.8% was achieved. The advantages of this study over the mentioned research need to be clarified to highlight its novelty.