Review of: "Artifact Subspace Reconstruction (ASR) for electroencephalography artifact removal must be optimized for each unique dataset"

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Potential competing interests: The author(s) declared that no potential competing interests exist.

1.The research work to remove EEG artifacts optimally for unique datasets is vital for results accuracy in myriad clinical and non-clinical applications. However, Artifact subspace reconstruction (ASR) term seems misleading as artifact rejections have been done throughout the paper.

2. Results can also be shown as pie chart, or other pictorial forms, as going through such a large set of data is time taking and may confuse the readers to conclude the analysis at a glance.

3. As one increases/decreases the ASR parameter, does the results and performance follow any pattern to preserve the number of trials? Even if it is artifact type dependent do one get some specific pattern pertaining to specific artifact type.

4. In line with this statement in the manuscript, "As such, researchers should investigate what type of artifacts exist in their data set a priori and keep track of whether those artifacts are being rejected or if more brain signals are being rejected." A potential future work can be to predict the type of artifact from the EEG signal and then ASR algorithm suggests optimal parameter choice based on the type of artifacts to automate this process further.

5. There are some typos in the manuscript, such as page 8