

# Review of: "An Improved Hybrid Transfer Learning-Based Deep Learning Model for Alzheimer's Disease Detection Using CT and MRI Scans"

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Potential competing interests: No potential competing interests to declare.

## Comments

1. Authors need to add the challenges of using computed tomography and brain MRI scan. Is it slow? Is there high workload? Is there miss-interpretation? In the abstract section.
2. The name of the dataset, total number of data used should be mentioned as well in the abstract.
3. In this sentence: The work classifies Alzheimer's patients into various stages using transfer learning with ResNet50, VGG16, and DenseNet121 along with CNN...' Which CNN (IS IT 5-layer, is it CNN developed from scratch?).
4. There is need to add sub-section in section 1 about the challenges of conventional techniques, 'Is this the only challenge: ... but it is still uncertain which structure would be best for an early diagnosis?'
5. In table 1. The result presented is not clear, is it accuracy? Which metric is used?
6. The quality of Figure 2 is very poor
7. What is the role of Figure 1? Is it the architecture of one of the study's CNN? Or is it the most common CNN from the literature, if it is the later, then it should be deleted.
8. The Proposed Work and Its Experimental Evaluation is very short. The section should be divided into:
  - I. Dataset description
  - II. Data split/partitioning
  - III. Data augmentation
  - IV. Models training and specification of computer use and software (either Phyton or MATLAB)
  - V. Performance evaluation
1. Confusion Matrix is missing in the result section
2. The conclusion section is very short.