Summary

The project discuss feature learning and prediction on the MNIST dataset. Scattering net, ResNet and VGG-19 are used for feature extraction and LDA, SVM and Random Forest is used for prediction on top of the learned features. PCA and t-SNE are used to visualize features and assess the performance of the feature extraction.

Assessment

Strengths

- Structured analysis
- Informative visualizations
- Several different algorithms used and compared

Weaknesses

- Typesetting of math could be improved
- Some of the statements could be explained in greater detail
- Code could be included for repeatability

Quality of writing: 4

The presentation is clear and there are not many language errors. The math typesetting could be better in the Scattering net section. The sentence "we removed 8 layers of (...) and adjust the..." is mixing past tense with present tense.

Technical quality: 4

Structured analysis. Project code could be included for repeatability. References to relevant articles could be included.

Overall rating: 4

Confidence of peer review: 3