

Introduction

- What I am doing and why
- Importance of what I am doing
- Examples of use case (Relevance)
- Figure of ML System
- Project Summary
 - Limited in the visual analysis

Dataset Overview

- Provide examples of images
- Provide a formal explanation of ML system
 - 'Blah blah blah. More formally, ...'
- Mention the initial dataset split and reasoning for combining and resplitting
- Provide table of counts summary
- Explain the chosen test-train-val-split

Dataset Transformations

- Image resizing
 - Distribution of image sizes
- Image Augmentation
- Feature Extraction
 - Design of CNN and layers
 - Dropout
 - train-val accuracy curve across epochs
 - Overfitting and underfitting in terms of learning rate and optimizers

Evaluation Metrics

- Explain what all the evaluation metrics mean in the context of my dataset
 - Accuracy
 - Precision
 - Recall
 - Balanced Accuracy
 - F1 Score

Model Evaluation

- kNN, and Logistic or Random Forest
- Justification
- Explain the key parameters of each model
- Note and justify the parameter values you'd expect to be optimal
- Random Grid-Search - Explain infeasibility of full grid Search
- kfold split for train and validation again

Conclusion

Self Evaluation

- What have you learned from the lectures?
- What have you learned from the coursework?
- What are your difficulties in the module?

- What would you do differently if you were to do it again?
- Are there unique contributions or novel ideas that make your project different from existing machine learning work?