

ML2021Spring HW2 Report

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Public Score	Private Score
0.76593	0.76489

Methods:

1. Shuffle the dataset before splitting into training & validation sets
2. Learning rate scheduler: ReduceLROnPlateau
3. Weights for Cross Entropy Loss [1]
Since the distribution in the training set is unbalanced, I set the weights in CE loss to alleviate this.
4. Post Processing
The labels in this dataset are continuous, so I revise the discontinuous labels in my prediction to improve the accuracy
5. Ensemble multiple predictions
i.e. voting for the output labels

I also try some tools in [2] but did not improve my best submission, just for your information.

Reference:

1. Weights for Cross Entropy Loss
<https://discuss.pytorch.org/t/weights-in-weighted-loss-nn-crossentropyloss/69514>
2. Pytorch-toolbox
<https://github.com/PistonY/torch-toolbox#1-labelsmoothingloss>