

## README

1. To run the model without attention for custom hyperparameters: Run **Model\_Vanilla.ipynb**. Under Set up Dataset cell please give appropriate directory of the dataset. First cell is the configuration cell in which every hyperparameter can be changed to train for different hyperparameters. Best model hyperparameters are assigned currently in this cell and keep it as it is to reproduce best model results. Running all cells will automatically create the required text file containing Test predictions and all also log 50 random test samples into wandb. Model evaluation i.e, on test data is done under cell Test accuracy for best which fetches the saved model of lowest val loss during training.
2. To run the model with attention for custom hyperparameters: Run **Model\_Attention.ipynb**. Under Set up Dataset cell please give appropriate directory of the dataset. First cell is the configuration cell in which every hyperparameter can be changed. Best model hyperparameters are assigned currently and keep it as it is to reproduce best model results. Running all cells will automatically create the required text file containing Test predictions and all also log 50 random test samples into wandb. It will also log attention heatmaps for all 50 random samples into wandb. Model evaluation i.e, on test data is done under cell Test accuracy for best which fetches the saved model of lowest val loss during training.
3. To reproduce Sweep run **Sweep.ipynb**. This file was run in colab so few libraries like *mount drive* can be commented out if not running in colab. Similar to above under Set up Dataset cell please give appropriate directory of the dataset. Sweep Configuration can be changed in Sweep configuration cell.