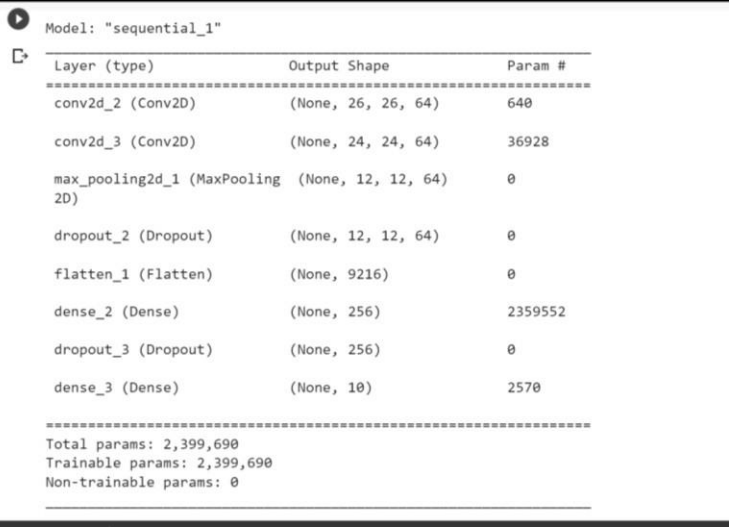
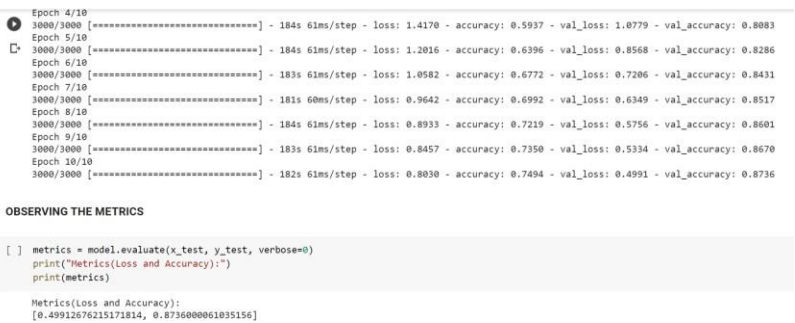


Model Performance Test

Date	14th November 2022
Team ID	PNT2022TMID44229
Project Name	A Novel Method for Handwritten Digit Recognition System
Maximum Marks	10 Marks

Model Performance Testing:

S.No	Parameter	Values	Screenshot
1.	Model Summary		 <pre> Model: "sequential_1" Layer (type) Output Shape Param # ----- conv2d_2 (Conv2D) (None, 26, 26, 64) 640 conv2d_3 (Conv2D) (None, 24, 24, 64) 36928 max_pooling2d_1 (MaxPooling (None, 12, 12, 64) 0 2D) dropout_2 (Dropout) (None, 12, 12, 64) 0 flatten_1 (Flatten) (None, 9216) 0 dense_2 (Dense) (None, 256) 2359552 dropout_3 (Dropout) (None, 256) 0 dense_3 (Dense) (None, 10) 2570 ----- Total params: 2,399,690 Trainable params: 2,399,690 Non-trainable params: 0 </pre>
2.	Accuracy	Training Accuracy – 74.94 Validation Accuracy - 87.23000	 <pre> Epoch 4/10 3000/3000 [=====] - 184s 61ms/step - loss: 1.4170 - accuracy: 0.5937 - val_loss: 1.0779 - val_accuracy: 0.8083 Epoch 5/10 3000/3000 [=====] - 184s 61ms/step - loss: 1.2016 - accuracy: 0.6396 - val_loss: 0.8568 - val_accuracy: 0.8286 Epoch 6/10 3000/3000 [=====] - 183s 61ms/step - loss: 1.0582 - accuracy: 0.6772 - val_loss: 0.7206 - val_accuracy: 0.8431 Epoch 7/10 3000/3000 [=====] - 181s 60ms/step - loss: 0.9642 - accuracy: 0.6992 - val_loss: 0.6349 - val_accuracy: 0.8517 Epoch 8/10 3000/3000 [=====] - 184s 61ms/step - loss: 0.8933 - accuracy: 0.7219 - val_loss: 0.5756 - val_accuracy: 0.8601 Epoch 9/10 3000/3000 [=====] - 183s 61ms/step - loss: 0.8457 - accuracy: 0.7350 - val_loss: 0.5334 - val_accuracy: 0.8670 Epoch 10/10 3000/3000 [=====] - 182s 61ms/step - loss: 0.8030 - accuracy: 0.7494 - val_loss: 0.4991 - val_accuracy: 0.8736 OBSERVING THE METRICS [] metrics = model.evaluate(x_test, y_test, verbose=0) print("Metrics(Loss and Accuracy):") print(metrics) Metrics(Loss and Accuracy): [0.49912676215171814, 0.8736000061035156] </pre>