

## Project Development Phase Model Performance Test

Date	10 November 2022
Team ID	PNT2022TMID52735
Project Name	Project - A Novel Method for Hand Written Digit Recognition
Maximum Marks	10 Marks

### Model Performance Testing:

Project team shall fill the following information in model performance testing template.

S.No.	Parameter	Values	Screenshot
1.	Model Summary	Model: "sequential" Layer (type)                      Output Shape Param # conv2d (Conv2D)                      (None, 26, 26, 64)                      640 conv2d_1 (Conv2D)                      (None, 24, 24, 32)                      18464 flatten (Flatten)                      (None, 18432)                      0 dense (Dense)                      (None, 10)                      184330 Total params: 203,434 Trainable params: 203,434 Non-trainable params: 0	<pre>from tensorflow.keras.models import load_model model=load_model("digit.h5")  model.summary()  Model: "sequential" Layer (type)                 Output Shape                 Param # ----- conv2d (Conv2D)              (None, 26, 26, 64)          640 conv2d_1 (Conv2D)            (None, 24, 24, 32)          18464 flatten (Flatten)             (None, 18432)                0 dense (Dense)                 (None, 10)                   184330 Total params: 203,434 Trainable params: 203,434 Non-trainable params: 0</pre>
2.	Accuracy	Training Accuracy - 0.9979166388511658  Validation Accuracy -0.98089998960495	<pre>metrics = model.evaluate(X_test1, y_test1, verbose=0) print("Metrics (Test Loss &amp; Test Accuracy): ") print(metrics)  Metrics (Test Loss &amp; Test Accuracy): [0.14363905787467957, 0.98089998960495]  metrics = model.evaluate(X_train1, y_train1, verbose=0) print("Metrics (Train Loss &amp; Train Accuracy): ") print(metrics)  Metrics (Train Loss &amp; Train Accuracy): [0.007249436806887388, 0.9979166388511658]</pre>