Performance Testing

Date	18-11-2022
Team ID	PNT2022TMID37590
Project Name	A Gesture – Based Tool for Sterile Browsing of Radiology Images
Maximum Marks	10 Marks

MODEL SUMMARY:

```
Model: "sequential"
_________________________________________________________________
 Layer (type)                Output Shape              Param #
=================================================================
 conv2d (Conv2D)             (None, 62, 62, 32)        320

 max_pooling2d (MaxPooling2D  (None, 31, 31, 32)       0
 )

 conv2d_1 (Conv2D)           (None, 29, 29, 32)        9248

 max_pooling2d_1 (MaxPooling  (None, 14, 14, 32)       0
 2D)

 flatten (Flatten)           (None, 6272)              0

 dense (Dense)               (None, 512)               3211776

 dense_1 (Dense)             (None, 6)                 3078

=================================================================
Total params: 3,224,422
Trainable params: 3,224,422
Non-trainable params: 0
_________________________________________________________________
```

ACCURACY:

CONTENT	VALUE
Training Accuracy	99.16%
Validation Accuracy	96.67%

```
model.fit_generator(x_train,
                    steps_per_epoch =594/3,
                    epochs=25,
                    validation_data=x_test,
                    validation_steps=30/3)
```

```
C:\Users\srina\AppData\Local\Temp/ipykernel_9384/1173897450.py:1: UserWarning: `Model.fit_generator` is deprecated and will be removed in a future ver
sion. Please use `Model.fit`, which supports generators.
  model.fit_generator(x_train,
Epoch 1/25
198/198 [==============================] - 19s 88ms/step - loss: 1.3609 - accuracy: 0.4764 - val_loss: 0.7358 - val_accuracy: 0.6667
Epoch 2/25
198/198 [==============================] - 17s 83ms/step - loss: 0.5948 - accuracy: 0.7525 - val_loss: 0.5594 - val_accuracy: 0.7667
Epoch 3/25
198/198 [==============================] - 15s 74ms/step - loss: 0.3788 - accuracy: 0.8468 - val_loss: 0.3211 - val_accuracy: 0.8333
Epoch 4/25
198/198 [==============================] - 16s 79ms/step - loss: 0.2756 - accuracy: 0.8805 - val_loss: 0.4424 - val_accuracy: 0.8000
Epoch 5/25
198/198 [==============================] - 15s 73ms/step - loss: 0.2200 - accuracy: 0.9242 - val_loss: 0.1211 - val_accuracy: 0.9667
Epoch 6/25
198/198 [==============================] - 14s 72ms/step - loss: 0.1728 - accuracy: 0.9377 - val_loss: 0.1738 - val_accuracy: 0.9333
Epoch 7/25
198/198 [==============================] - 13s 67ms/step - loss: 0.1086 - accuracy: 0.9630 - val_loss: 0.3307 - val_accuracy: 0.9667
Epoch 8/25
198/198 [==============================] - 16s 79ms/step - loss: 0.1218 - accuracy: 0.9411 - val_loss: 0.2783 - val_accuracy: 0.9667
Epoch 9/25
198/198 [==============================] - 14s 68ms/step - loss: 0.1172 - accuracy: 0.9646 - val_loss: 0.1371 - val_accuracy: 0.9667
Epoch 10/25
198/198 [==============================] - 15s 76ms/step - loss: 0.0850 - accuracy: 0.9731 - val_loss: 0.2077 - val_accuracy: 0.9667
Epoch 11/25
198/198 [==============================] - 13s 67ms/step - loss: 0.0314 - accuracy: 0.9933 - val_loss: 0.2819 - val_accuracy: 0.9667
Epoch 12/25
198/198 [==============================] - 14s 69ms/step - loss: 0.0698 - accuracy: 0.9731 - val_loss: 0.3276 - val_accuracy: 0.9667
Epoch 13/25
198/198 [==============================] - 14s 68ms/step - loss: 0.0671 - accuracy: 0.9764 - val_loss: 0.3040 - val_accuracy: 0.9667
Epoch 14/25
198/198 [==============================] - 14s 68ms/step - loss: 0.0471 - accuracy: 0.9848 - val_loss: 0.1482 - val_accuracy: 0.9000
Epoch 15/25
198/198 [==============================] - 13s 68ms/step - loss: 0.0932 - accuracy: 0.9613 - val_loss: 0.2452 - val_accuracy: 0.9667
Epoch 16/25
198/198 [==============================] - 13s 68ms/step - loss: 0.0816 - accuracy: 0.9697 - val_loss: 0.2167 - val_accuracy: 0.9667
Epoch 17/25
198/198 [==============================] - 14s 68ms/step - loss: 0.0219 - accuracy: 0.9933 - val_loss: 0.1583 - val_accuracy: 0.9667
Epoch 18/25
198/198 [==============================] - 14s 69ms/step - loss: 0.0239 - accuracy: 0.9916 - val_loss: 0.1834 - val_accuracy: 0.9667
Epoch 19/25
198/198 [==============================] - 15s 76ms/step - loss: 0.0410 - accuracy: 0.9899 - val_loss: 0.1805 - val_accuracy: 0.9667
Epoch 20/25
198/198 [==============================] - 14s 69ms/step - loss: 0.0209 - accuracy: 0.9916 - val_loss: 0.2783 - val_accuracy: 0.9667
Epoch 21/25
198/198 [==============================] - 14s 69ms/step - loss: 0.0289 - accuracy: 0.9916 - val_loss: 0.2775 - val_accuracy: 0.9667
Epoch 22/25
198/198 [==============================] - 14s 69ms/step - loss: 0.0757 - accuracy: 0.9781 - val_loss: 0.2585 - val_accuracy: 0.9667
Epoch 23/25
198/198 [==============================] - 14s 69ms/step - loss: 0.0505 - accuracy: 0.9865 - val_loss: 0.2526 - val_accuracy: 0.9667
Epoch 24/25
198/198 [==============================] - 13s 67ms/step - loss: 0.0043 - accuracy: 1.0000 - val_loss: 0.1846 - val_accuracy: 0.9667
Epoch 25/25
198/198 [==============================] - 14s 68ms/step - loss: 0.0148 - accuracy: 0.9933 - val_loss: 0.3344 - val_accuracy: 0.9333
```