```
1 !pip install tensorflow
2 !pip install numpy
3 !pip install scipy
4 !pip install opencv-python
5 !pip install pillow
6 !pip install matplotlib
7 !pip install h5py
8 !pip install keras
9 !pip3 install https://github.com/OlafenwaMoses/ImageAI/releases/download/2.0.
```

```
1 from google.colab import drive
2 drive.mount('/content/drive')
3 !ls "/content/drive/My Drive"
```

```
1 from imageai.Prediction.Custom import ModelTraining
2
3 model_trainer = ModelTraining()
4 model_trainer.setModelTypeAsResNet()
5 model_trainer.setDataDirectory("/content/drive/My Drive/images")
6 model_trainer.trainModel(num_objects=5, num_experiments=10, enhance_data=True
```

Layer (type)	Output Shape	Param #	Connected
input_3 (InputLayer)	(None, 224, 224, 3)	0	
conv2d_106 (Conv2D)	(None, 112, 112, 64)	9472	input_3[0
batch_normalization_v1_106 (Bat	(None, 112, 112, 64)	256	conv2d_10
activation_100 (Activation)	(None, 112, 112, 64)	0	batch_nor
max_pooling2d_2 (MaxPooling2D)	(None, 55, 55, 64)	0	activatio
conv2d_108 (Conv2D)	(None, 55, 55, 64)	4160	max_pooli
batch_normalization_v1_108 (Bat	(None, 55, 55, 64)	256	conv2d_10
activation_101 (Activation)	(None, 55, 55, 64)	0	batch_nor
conv2d_109 (Conv2D)	(None, 55, 55, 64)	36928	activatio
batch_normalization_v1_109 (Bat	(None, 55, 55, 64)	256	conv2d_10
activation_102 (Activation)	(None, 55, 55, 64)	0	batch_nor
conv2d_110 (Conv2D)	(None, 55, 55, 256)	16640	activatio
conv2d_107 (Conv2D)	(None, 55, 55, 256)	16640	max_pooli
batch_normalization_v1_110 (Bat	(None, 55, 55, 256)	1024	conv2d_11
batch_normalization_v1_107 (Bat	(None, 55, 55, 256)	1024	conv2d_10
add_32 (Add)	(None, 55, 55, 256)	0	batch_nor batch_nor

Layer	Output Shape	Param #	Connected to
activation_103 (Activation)	(None, 55, 55, 256)	0	add_32[0]
conv2d_111 (Conv2D)	(None, 55, 55, 64)	16448	activatio
batch_normalization_v1_111 (Bat	(None, 55, 55, 64)	256	conv2d_11
activation_104 (Activation)	(None, 55, 55, 64)	0	batch_nor
conv2d_112 (Conv2D)	(None, 55, 55, 64)	36928	activatio
batch_normalization_v1_112 (Bat	(None, 55, 55, 64)	256	conv2d_11
activation_105 (Activation)	(None, 55, 55, 64)	0	batch_nor
conv2d_113 (Conv2D)	(None, 55, 55, 256)	16640	activatio
batch_normalization_v1_113 (Bat	(None, 55, 55, 256)	1024	conv2d_11
add_33 (Add)	(None, 55, 55, 256)	0	batch_nor activatio
activation_106 (Activation)	(None, 55, 55, 256)	0	add_33[0]