

Experiment Number	Model	Result	Decision + Explanation
1	Conv3D	Throws Generator error	Crop the images correctly by giving the dimensions 128 x 128
2	Conv3D	Accuracy is 0.16 For 10 Epochs and Batch size 5	Increase the Batch size, ideally sample should fit in a single batch size. Given the accuracy is low we move towards higher batch size.
3	Conv3D	Accuracy: 0.25 for 10 Epochs and Batch Size 10	Try increasing the batch size
4	Conv3D	Accuracy: 0.20 for 10 Epochs and Batch Size 20	Increase the number of Epochs as the training accuracy is constant which means the model is not training enough.
5	Conv3D (Optimal model Identified)	Accuracy : 0.4476	Accuracy is high at Epoch 17 and the batch size is 15. Try increasing the Epochs to see if we can get a better model
6	Conv3D	Accuracy : 0.33	Achieved optimal accuracy of 0.4476 at Epoch 24. We chose the model with less Epochs as optimal because it reduces the computational time.
7	Conv2D (ResNet 50)+ GRU	Accuracy: 0.5428	Epochs : 30 and Batch size : 15 as it was the optimal model identified in the previous iterations. Optimal accuracy is identified at Epoch 27 with stochastic Gradient descent. Decision: Try Reducing number of Epochs and also try changing the optimizer and try LSTM.
Final Model	Conv2D (ResNet 50)+ GRU	Accuracy: 0.5428	

