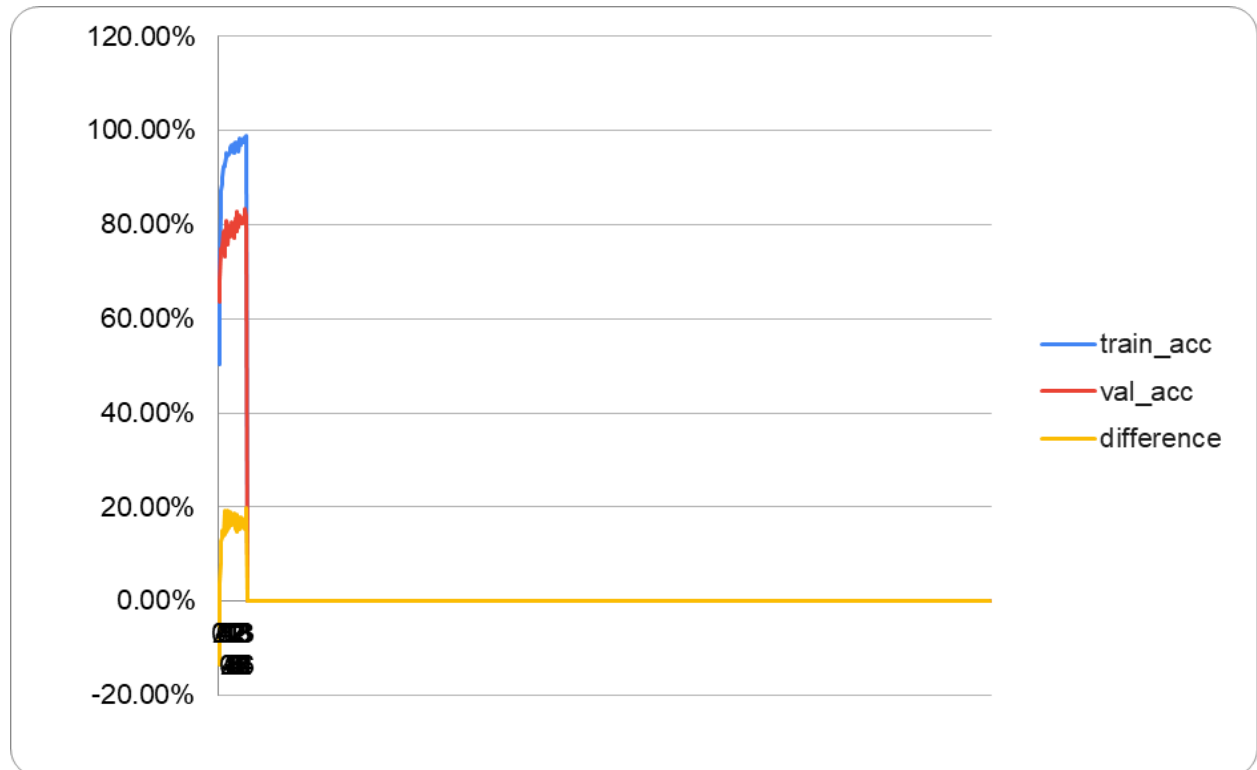


DL REPORT PHASE 3

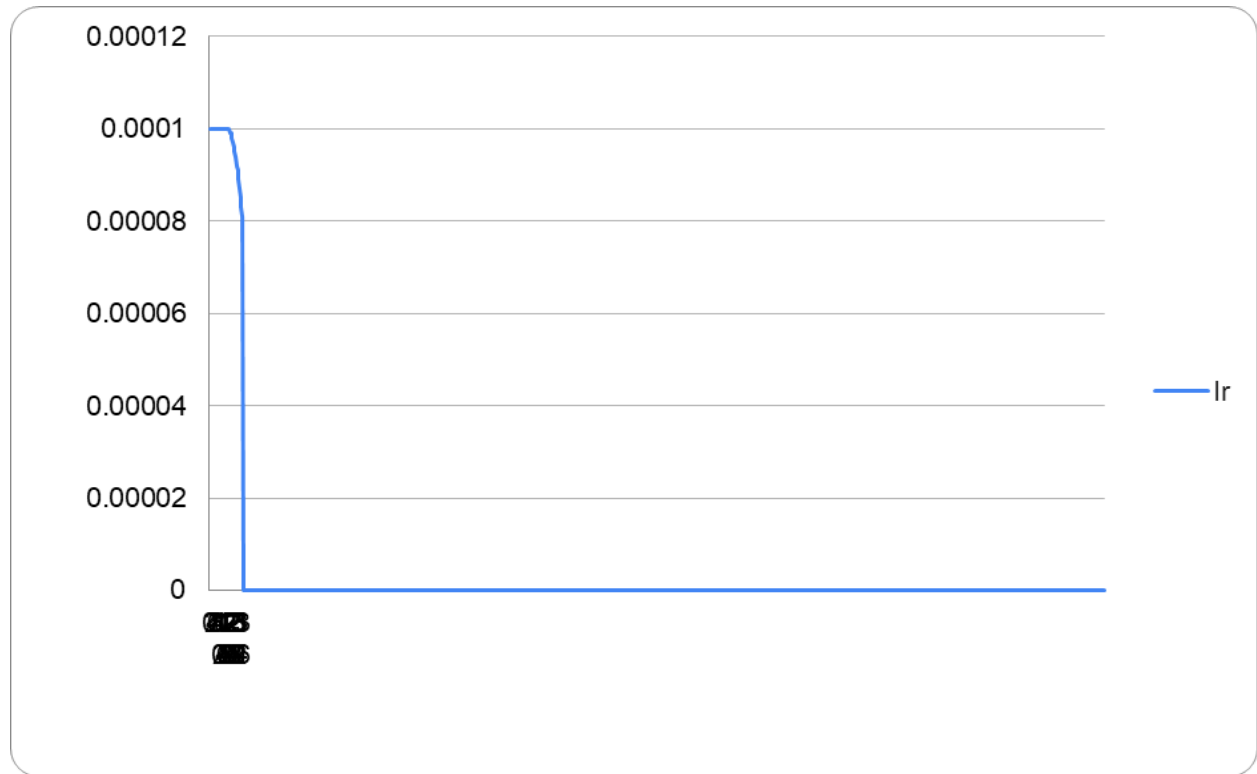
Visualization and Tabulation are done in the Excel sheet submitted.

I3D:

No.of epochs vs Accuracy

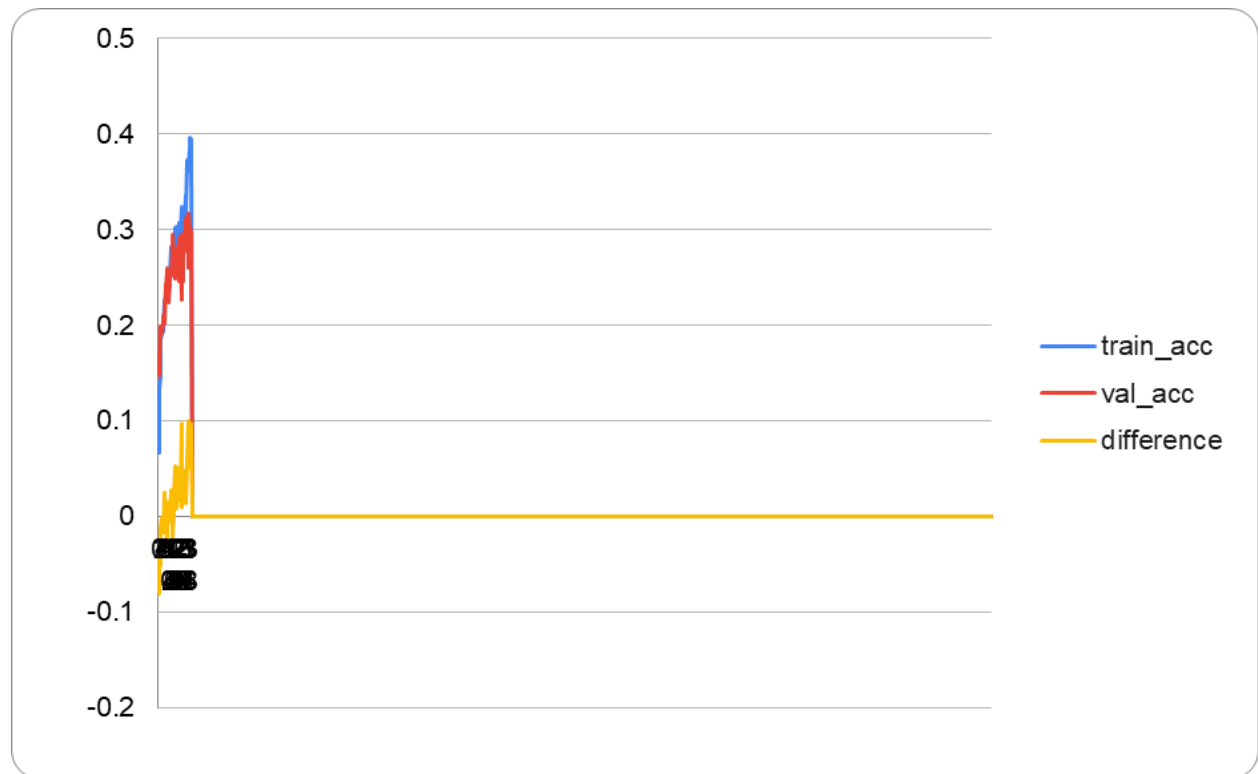


No.of epochs vs Learning rate:

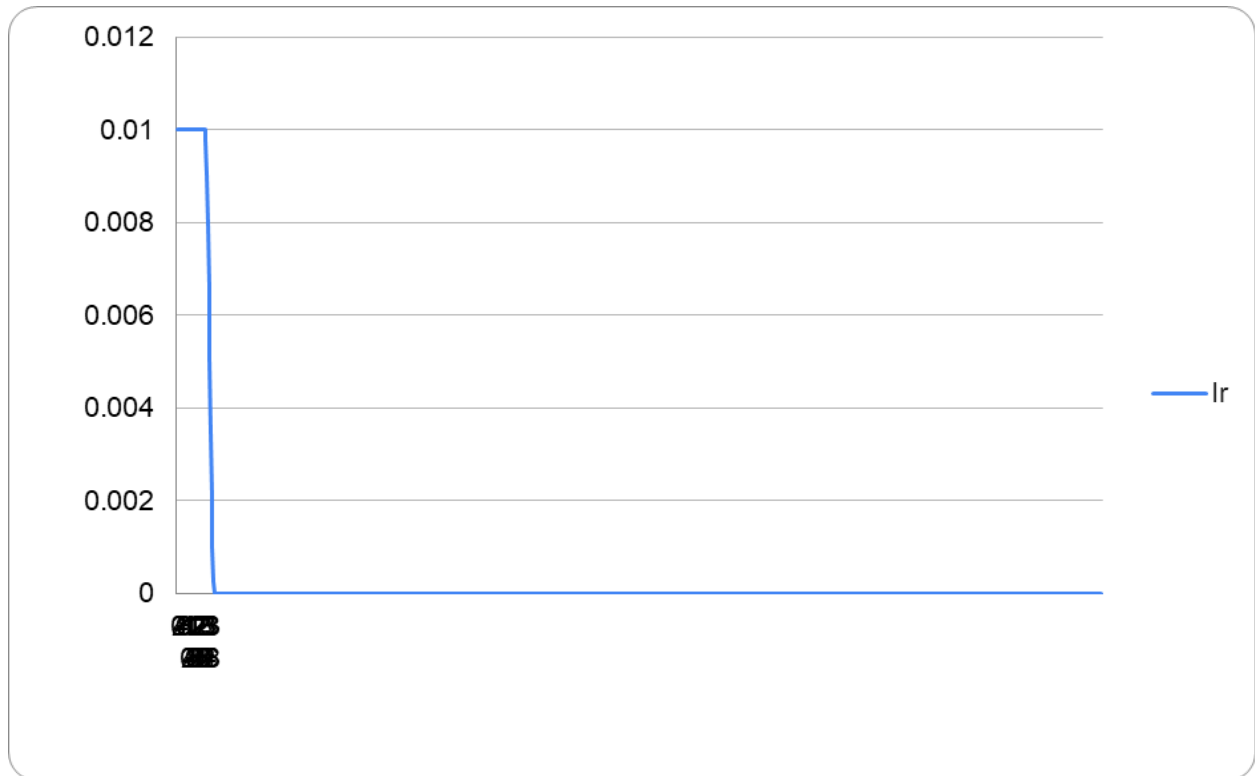


C3D:

No.of epochs vs Accuracy



No.of epochs vs Learning rate:



Result Analysis:

I3D model with resnet 50 as backbone is working better than c3d. Both are pretrained on the Kinetics 400 dataset. One of the intuitions that I3D is better can be because it's more complex and has residual connections.

Accuracy and Performance:

I3D Resnet 50 :- 0.8470

training accuracy at the end for I3D :- 0.9864

C3D :- 0.3031

training accuracy at the end for C3D :- 0.3955

C3D is underfitting. Whereas I3D is performing well.

Models and Reasoning:-

I3d non localization

i3dnlr es50 _1	last layer unfrozen with the 70 epoch lr
i3dnlr es50 _2	from scratch error but added the charts also
i3dnlr es50 _3	unfrozen+no regu
i3dnlr es50 _4	unfrozen+1e -4 regu

Both the models ran for 35 epochs only , hence ran it again after adding retry to the parameter files.

C3D

c3d_kinetics4 00_fc_1	last layer unfrozen with the 40 epoch
--------------------------	--

Conclusion:-

I3D model is performing better than the C3D for the task of Sign Language Recognition. I will be implementing other models like SlowFast, P3D for this task in the future.