

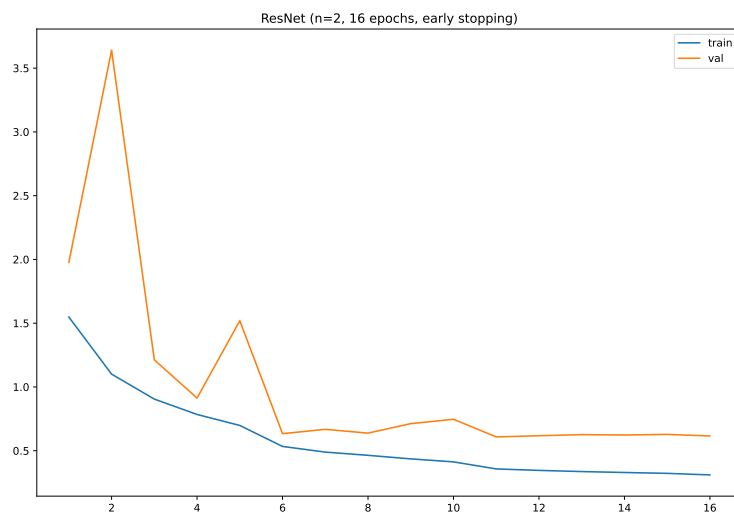
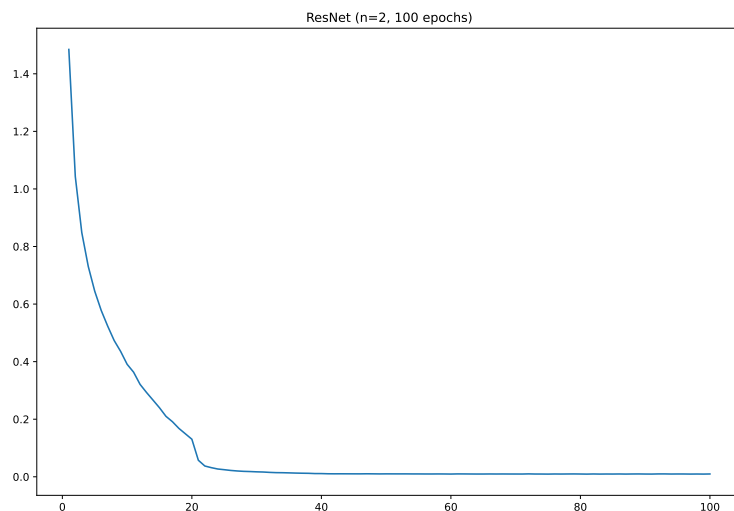
COL775 Assignment 1

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1 ResNet over CNN's and Different Normalization Schemes

1.1 Image Classification using ResNets



	Accuracy	F1 micro	F1 macro
train	0.916	0.916	0.916
val	0.797	0.797	0.796
test	0.791	0.791	0.790

1.2 Impact of Normalization

Norm	set	Accuracy	F1 micro	F1 macro
bn (torch)	train	0.913	0.913	0.913
	val	0.791	0.791	0.790
	test	0.783	0.783	0.783
bn	train	0.913	0.913	0.913
	val	0.782	0.782	0.781
	test	0.785	0.785	0.785
in	train	0.725	0.725	0.724
	val	0.684	0.684	0.682
	test	0.669	0.669	0.667
bin	train	0.933	0.933	0.932
	val	0.788	0.788	0.787
	test	0.780	0.780	0.780
ln	train	0.766	0.766	0.765
	val	0.725	0.725	0.723
	test	0.727	0.727	0.725
gn	train	0.757	0.757	0.756
	val	0.706	0.706	0.705
	test	0.699	0.699	0.697
nn	train	0.737	0.737	0.736
	val	0.714	0.714	0.712
	test	0.706	0.706	0.705

