CS6375-004 Machine Learning Fall18
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Observations with 3 activation functions:

Sl No	ActivationFunction	Learning rate	Iterations	Training error	Test Error
1.	Sigmoid	0.001	10000	81.340	20.983
2.	Sigmoid	0.05	10000	76.145	19.472
3.	Sigmoid	0.5	10000	88.748	22.433
4.	Tanh	0.001	10000	72.694	20.641
5.	Tanh	0.001	5000	75.779	20.841
6.	Tanh	0.005	10000	78.228	20.745
7.	ReLu	0.005	10000	88.748	22.433
8.	ReLu	0.01	10000	88.748	22.433
9.	ReLu	0.5	10000	88.748	22.433

Given table is our observations with different learning rates and number of iterations with Sigmoid, Tanh and ReLu activation functions.

We have used Car Evaluation dataset. We have splitted the dataset with test_size:0.2