

CS 419 : INTRODUCTION TO MACHINE LEARNING

AUTUMN SEMESTER 2018

Mohd Safwan 17D070047, Aryan Agal 16D170004

17 August

We implemented Regression Decision Tree from scratch in python using the popular matrix manipulation library numpy.

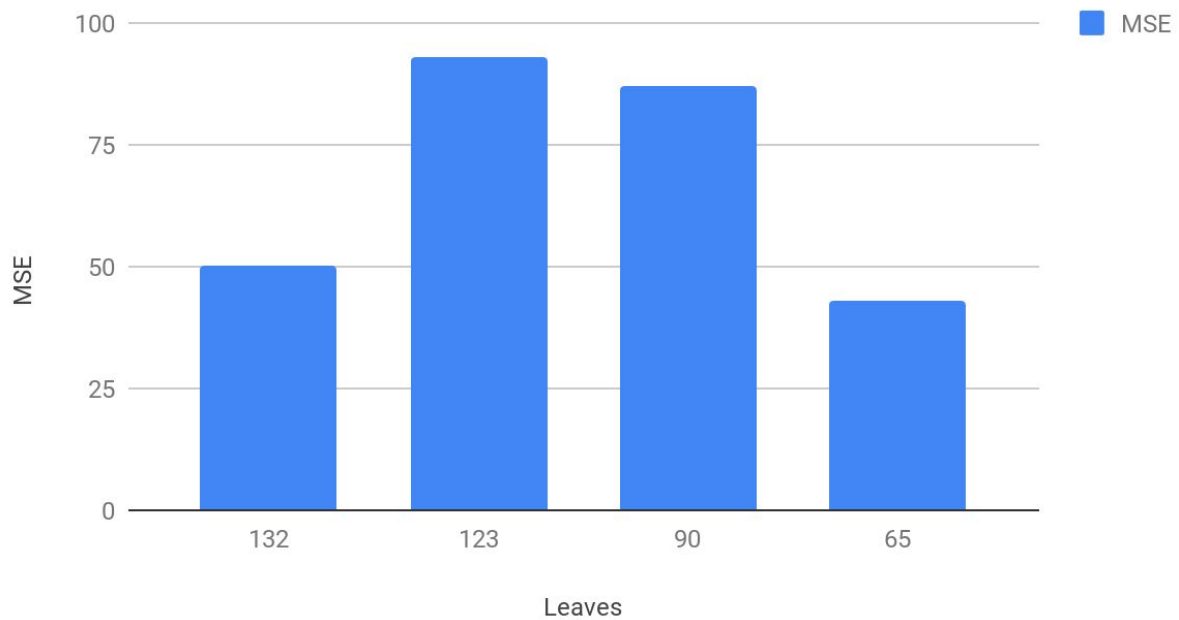
Results :

For 1st Dataset we get the following results :

Method	Min Leaf	Mean Squared Error	Training Time
Without pruning	17	20.25	1.20s
With pruning	17	45.61	1.20s

Graph :

MSE vs. Leaves



For 2nd Dataset we get the following results :

Method	Min Leaf	Mean Squared Error	Training Time
Without Pruning	20	0.21	19s
With Pruning	20	0.53	19s

T

