ST790: Homework 7

Due: 11/19/2019

General Instructions:

- All the HW files (except the R code) should be saved as PDF, and named in the form Lastname_Firstname_hw1.pdf".

- The code should be saved as "Lastname_Firstname_hw1_prob1_code.r".

- Test your R code before submission to make sure it can be executed successfully by the "source()" function.

- It is ok to turn in multiple files.

1. Classify "1", "2" and "3" for the zip code using the classification tree in R. Report both the training error and test error. You may consider using the R package *tree*.

2. Classify "1", "2" and "3" for the zip code using the MARS. Report both the training error and test error. You may consider using the R package *earth*.

3. Classify "1", "2" and "3" for the zip code using the random forest. Report both the training error and test error. You may consider using any R package for random forest.