## Homework 8

## Introduction to Data Science (QR2)

due: 11/7/25

Instructions: Please submit solutions on Populi. Only a knitted pdf of an Rmarkdown file will be accepted.

**Problem 1:** This question is related to your project.

- 1. Run a simulation to produce the "Top decile" bottom row of Table 5.3 in the SFFA expert report. Comment on the racial breakdown of this random lottery among top decile applicants to the actual racial breakdown in the admitted class. The sample() function will be useful.
- 2. Fit and interpret a regression model with your data. Please be sure to write out the model you are fitting and how it pertains to your question of interest. Remember that glm(..., family = "binomial") is used for logistic regression and lm() is used for standard linear regression.