

CmpE 343: Introduction to Probability and Statistics for Computer Engineers (Fall 2019)

Bonus Homework

Due December 18, 2019 by 11:59pm on Moodle

Note: Please type your answers and submit your homework as PDF. Please show your steps clearly. Otherwise, you will NOT get the full point.

It is claimed that the value of π is 3.2. Use a statistical procedure to test this claim.

- (45 points) Generate a random sample of π values as described in Simulating Random Experiments lecture. Include a snapshot of your code in the report.
- (20 points) Calculate sample mean and variance of the random sample you generated.
- (35 points) State H_0 , H_1 , and the test statistic you use. Determine if the random sample is an evidence to accept the claim.