

Name:

ID #:

Section 1

Serial #:

A quality control engineer is interested in the mean length of sheet insulation being cut automatically by machine. The desired length of the insulation is 12 feet. A sample of 70 cut sheets yields a mean length of 12.04 feet and a standard deviation of 0.15 feet.

a. Obtain a 99% confidence interval for the mean length cut by machine.

b. If the engineer claims that the average length of insulation cut by machine exceeded the desired length, do you agree with him at 1% level of significance? Use any approach.

c. Using 98% confidence level, can we say that machine does NOT exceed the desired length of insulation? Use the p -value approach.

With My Best Wishes