

9.1 Significance Tests

Michael Brodskiy

Instructor: Mr. Thompson

February 9, 2022

Statistics AP-Thompson-Year-12462 (66479) > Activities and Due Dates > 9.1 Significance tests

Assignment Score: 97.7%

Resources

Give Up?

Solution

Next Question

< Question 1 of 18 >

My Attempt

Mr. Tabor believes that less than 75% of the students at his school completed their math homework last night. The math teachers inspect the homework assignments from a random sample of 50 students at the school.

What are the appropriate hypotheses for performing this significance test?

- ☐ $H_0 : \hat{p} > 0.75; H_a : p < 0.75$, where \hat{p} = the sample proportion of the students at Mr. Tabor's school who completed their math homework last night.
- ☒ $H_0 : p = 0.75; H_a : p < 0.75$, where p = the true proportion of the students at Mr. Tabor's school who completed their math homework last night.
- ☐ $H_0 : p < 0.75; H_a : p = 0.75$, where p = the true proportion of the students at Mr. Tabor's school who completed their math homework last night.
- ☐ $H_0 : \hat{p} = 0.75; H_a : \hat{p} < 0.75$, where \hat{p} = the sample proportion of the students at Mr. Tabor's school who completed their math homework last night.
- ☐ $H_0 : p = 0.75; H_a : p > 0.75$, where p = the true proportion of the students at Mr. Tabor's school who completed their math homework last night.