

### 10.3 HW Guide

#1: Part a asks you to identify the correct  $H_0$  &  $H_1$ .

Part b asks you to interpret the P-value you are provided. Recall that the P-value tells you the probability of getting a sample as extreme (or more extreme) than the sample you have if  $H_0$  is actually true.

Part c asks you to write up the conclusion using the P-value you were given and the stated level of significance.

#2-7: Perform a one-mean test.

If you are given data (instead of summary info:  $\bar{x}$ ,  $s$ ,  $n$ ) you might be asked to check the conditions:

- \*  $20n \leq N$
- \* Data are normally distributed (QQ Plot)
- \* There are no outliers (Boxplot)

#6: This problem will be tested using a confidence interval.

Create a confidence interval using StatCrunch.

If the interval contains the value listed in  $H_0$  then you do not reject the null hypothesis.

Otherwise you reject the null hypothesis.