

## DAILY ASSESSMENT FORMAT

<b>Date:</b>	<b>31<sup>st</sup> July 2020</b>	<b>Name:</b>	<b>Rajeshwari Gadagi</b>
<b>Course:</b>	<b>Coursera</b>	<b>USN:</b>	<b>4AL17EC076</b>
<b>Topic:</b>	<b>Basic statistics</b>	<b>Semester &amp; Section:</b>	<b>6<sup>th</sup> sem 'B' sec</b>
<b>Github Repository:</b>	<b>Rajeshwari-gadagi</b>		

### FORENOON SESSION DETAILS

## Image of session

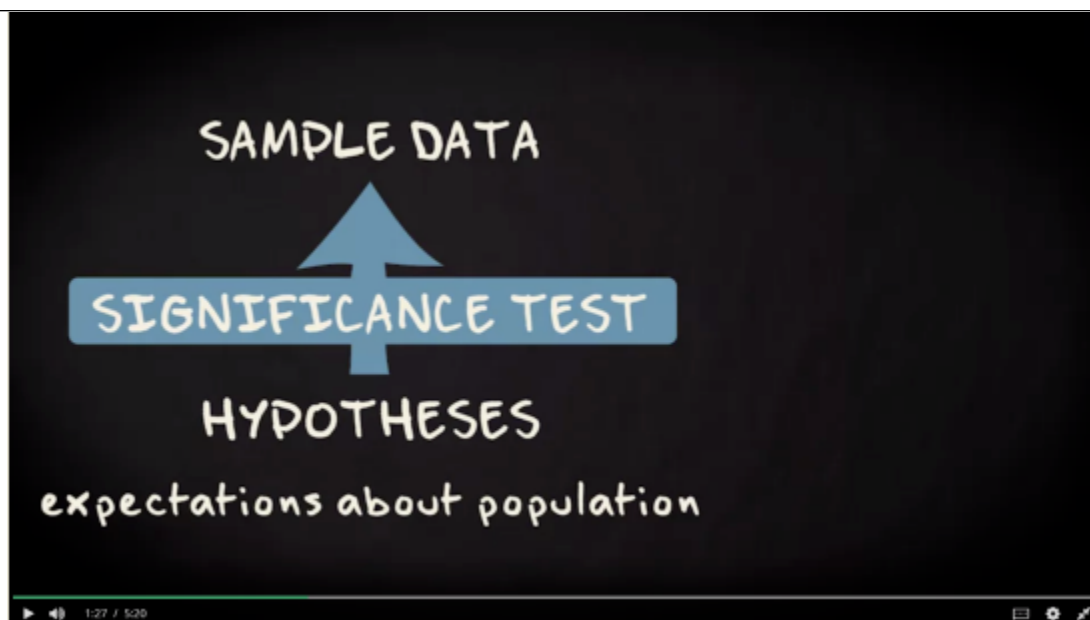
The screenshot shows a web browser window with the URL `coursera.org/learn/basic-statistics/exam/751bq/final-exam/attempt?redirectToCover=true`. The page title is "Final Exam" and it is marked as a "Graded Quiz • 1h". The due date is "Due Sep 6, 11:59 PM PDT". A green banner at the top says "Congratulations! You passed!" with a checkmark icon and the text "TO PASS: 70% or higher". A blue button labeled "Keep Learning" is next to the banner. The "GRADE" is displayed as "83.33%". Below the banner, the "Final Exam" title is shown, followed by "LATEST SUBMISSION GRADE 83.33%". The exam questions are listed below:

1. What does the test statistic tell you? 1 / 1 point  

✓ Correct
2. In a group of students 25% are enrolled in physics, 23% in sociology, 17% in chemistry, 14% in political science, 12% in anthropology, and 9% in math. You are going to select an individual from the group of students. The probability of event A is equivalent to the probability that you select someone who studies social science (sociology, political science and anthropology) or physics. What is the probability of the event A's complement? 1 / 1 point

The Windows taskbar at the bottom shows the time as 14:22 on 28-07-2020.

This is a duplicate of the screenshot above, showing the same Coursera Final Exam result page with a passing grade of 83.33% and two questions listed.



Coursera for Students | Coursera x Significance tests | Coursera x +

← → ↺ coursera.org/learn/basic-statistics/exam/lvjC/significance-tests/attempt?redirectToCover=true ☆ 👤 ⋮

← Significance tests Graded Quiz • 20 min Due Aug 30, 11:59 PM PDT

✓ **Congratulations! You passed!**  
TO PASS 80% or higher

Keep Learning

GRADE  
**100%**

## Significance tests

LATEST SUBMISSION GRADE  
100%

1. Which of the following statement(s) is/are correct? 1 / 1 point

I. If you conduct a significance test you assume that the alternative hypothesis is true unless the data provide strong evidence against it.

II. The null hypothesis and the alternative hypothesis are always mutually exclusive.

☐ Statement I is correct, statement II is incorrect.

☒ Statement II is correct, statement I is incorrect.

☐ Both statements are incorrect.

☐ Both statements are correct.

Windows Taskbar: 14:01 28-07-2020

Hypotheses :-

Hypotheses  
expectations about population.

↓ → significance test.

Sample data.

↓  
null - hypothesis testing

↓  
Hypothesis

↓  
null hypothesis  
 $H_0$

- The parameter you're interested in takes a specific value.
- Will be rejected if the data in your sample suggest that it is a

↓  
alternative hypothesis  
 $H_a$

- claims that the parameter you're interested in falls within an alternative range of values.

- Will be rejected if the data in your sample suggest that it is a highly unlikely expectation.

falls within an alternate Range of values.

Significance test :-

We assume that population value has a certain value the sample we collected comes from this population.

Sampling distribution :-

we can determine what the sampling distribution of the sample proportion looks like.

$$\text{test statistic} = z = \frac{P - \pi_0}{SE_0}, \text{ where } SE_0 = \sqrt{\frac{\pi_0(1 - \pi_0)}{n}}$$

$H_0$  value

$$\text{test statistic} = z = -1.85, \text{ where } SE_0 = 0.005$$

