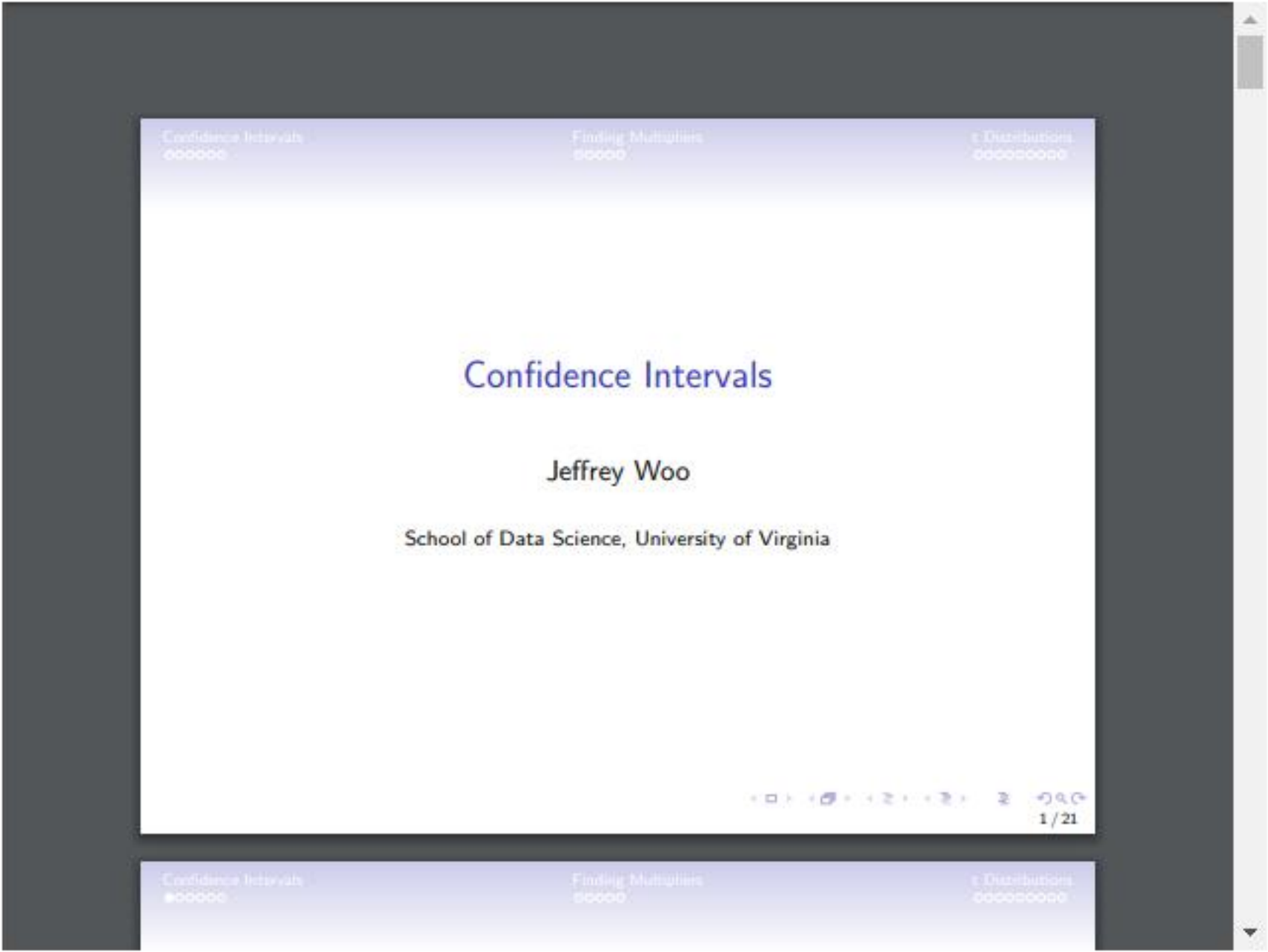


### 0.3: Confidence Intervals

[Print view](#) [Index of pages](#)

The slides for the video presentation on Confidence Intervals can be found below. Please download the slides and then follow along the accompanying videos further below this page. The video is split into three parts.



#### PART 1: INTRO TO CONFIDENCE INTERVALS

##### Learning Objectives

- Know the goals of confidence intervals.
- Know the general form of confidence intervals.
- Define confidence level.
- Define margin of error.
- Know the confidence interval for a population mean.

#### Video for Part 1

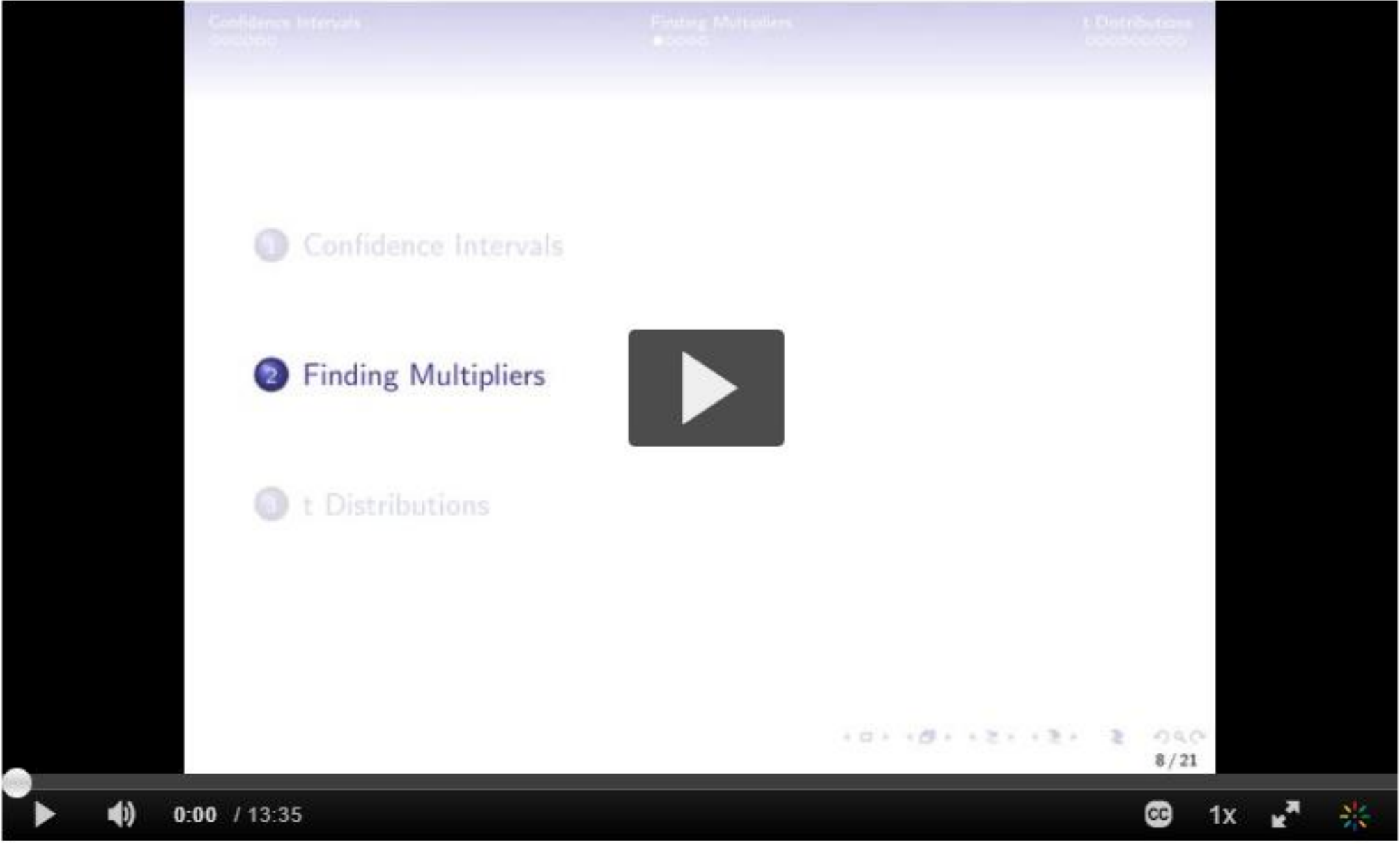


#### PART 2: FINDING MULTIPLIERS

##### Learning Objectives

- Know how to find the value of the z multiplier for various levels of confidence using R.
- Describe how the value of the z multiplier changes as confidence level changes.

#### Video for Part 2



#### PART 3: T DISTRIBUTIONS

##### Learning Objectives

- Explain why the standard normal should not be used for the confidence interval for a mean.
- Explain the difference between the standard deviation of the sample mean and the standard error of the sample mean.
- Compare and contrast the t distribution with the standard normal distribution.
- Know how degrees of freedom is found for the confidence interval for the population mean.
- Know how to find the value of the t multiplier for various levels of confidence and degrees of freedom using R.
- Know how to compute the confidence interval for the population mean, given data.
- Know how to use the computed confidence interval to answer questions of interest.

#### Video for Part 3

