**Name**: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Date**: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Unit 11 Quiz

Answer the following two questions. **Show your work (or explain your calculations)**.

**Setup**: We took a random sample of eleven Biology students and recorded the following values for the percentage grade on Test 1 and the percentage grade on the Midterm exam. The data is given below.

Table

Description automatically generated

1. **Conduct** a hypothesis test for the data above to determine if there is a significant positive correlation between grades on Test 1 and grades on the Midterm exam at a 5% level of significance (no need to look at a scatterplot).
2. **Determine** the linear regression equation.
3. Use your equation to **predict** the Midterm exam grade for a student who received an 85 on Test 1.