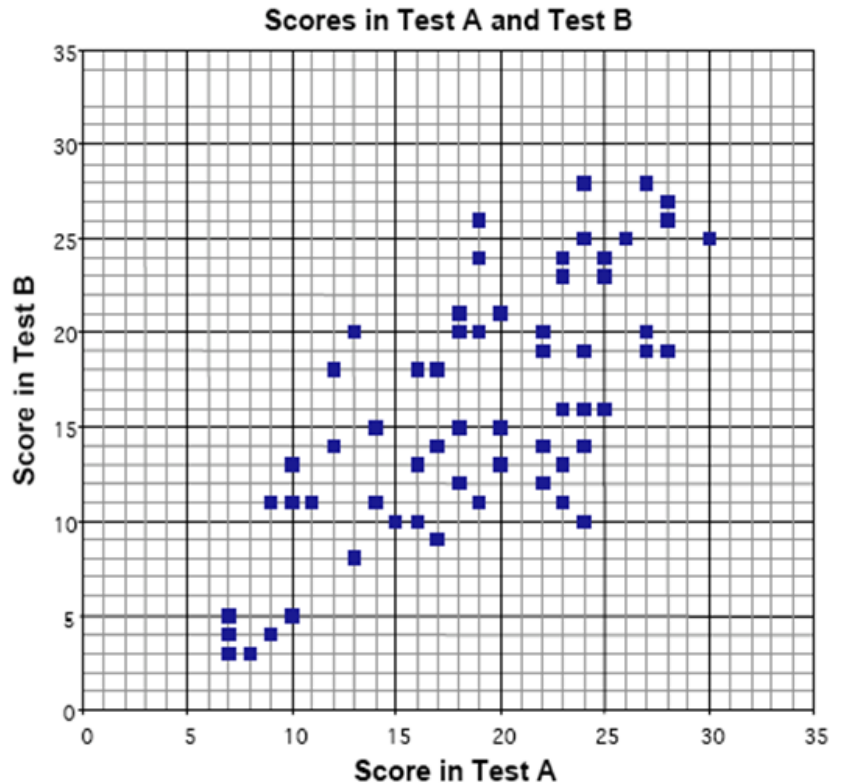


Name: _____

Scatter Diagram

A group of 66 students took two tests, Test A and Test B. In the scatter diagram, each square represents one student and shows the scores that student got in the two tests.

1. The mean score for Test A was 19 and the mean score for Test B was 16. Plot a point to show this on the scatter diagram.



2. Draw a line of best fit on the scatter diagram.
How can a line of best fit be used?

3. If another student took Test A and scored 33, what would you expect her to score on Test B?
Explain how you determined your answer.

4. Here are five statements about the scores shown on the scatter diagram. If a statement is true check (✓) it. If it is not true, write a correct statement.

Statement	Check (✓) or write correct statement
The scatter diagram shows positive correlation between the scores on Test A and the scores on Test B.	
The lowest score on Test A is lower than the lowest score for Test B.	
The range of scores on Test B is 25.	
The student with the highest score on Test A also has the highest score on Test B.	
The biggest difference between a student's scores on the test tests is 5.	

Scatter Diagram	Rubric	
<p>The core elements of performance required by this task are:</p> <ul style="list-style-type: none"> • discuss and understand a scatter plot of real data <p>Based on these, credit for specific aspects of performance should be assigned as follows</p>	points	section points
1. Point correctly plotted	1	1
2. Draws a line that best fits the data. Gives a correct statement such as: A line of best fit can be used to estimate a students' score in one test if you know their score in the other.	1 1	2
3. Student gives correct answer. Accept any number between 27 and 31.	1	1
4. Correctly completes the table such as: ✓ No. The lowest score on Test A (7) is greater than the lowest score on Test B (3). ✓ No. The student with the highest score on Test A (30) does not have the highest score on Test B (28). No. The biggest difference is more than 5 (accept 14).	1 1 1 1 1	5
Total Points		9