

CHAPTER-5 | Tales by Dots and Lines

QUIZ
PART-02

1. The mean of a data set acts as its —

A. Largest value
B. Smallest value
C. Balance point
D. Frequency (C)

Explanation : The mean is the balancing point where distances on both sides are equal.

2. For the mean, the total distance of values on the left side is _____ the total distance on the right side.

A. Greater than
B. Less than
C. Equal to
D. Double (C)

Explanation: The mean balances the data, making both sides equal.

3. A collection of data has how many arithmetic means?

A. None
B. One
C. Two
D. Many (B)

Explanation: Every data set has one unique arithmetic mean.

4. If a new value greater than the current mean is added, the mean generally —

A. Increases
B. Decreases
C. Becomes zero
D. Remains unchanged (A)

Explanation: Adding a value above the mean pulls the mean upward.

5. If a new value smaller than the current mean is added, the mean generally —

A. Increases
B. Decreases
C. Doubles
D. Remains unchanged (B)

Explanation : A value below the mean pulls the mean downward.

6. What happens when a value equal to the mean is added to the data set?

A. Mean increases
B. Mean decreases
C. Mean remains unchanged
D. Mean becomes zero (C)

Explanation : Adding a value equal to the mean does not change the mean.

7. If a value equal to the mean is removed from the data set, the mean will —

A. Increase
B. Decrease
C. Remain unchanged
D. Become negative (C)

Explanation : Removing a value equal to the mean leaves the mean unchanged.

8. The mean of 2, 4, and 6 is 4. If 2 is added to every number, the new mean becomes —

A. 4
B. 5
C. 6
D. 8 (C)

Explanation : Adding the same number to every observation increases the mean by that number.

9. The mean of 1, 2, and 3 is 2. Replacing 3 with 6 will make the mean —

A. Increase
B. Decrease
C. Remain 2
D. Become 0 (A)

Explanation : Replacing a value with a larger one increases the average.

10. The main idea of this section is that the mean changes according to the _____ of the values in the data set.

A. Colour
B. Position relative to the mean
C. Shape of graph
D. Order of writing (B)

Explanation : Values above or below the mean affect whether the mean increases or decreases.