

Unit 1: One-Variable Statistics

CONCEPT

Name: _____ Date: _____

Show all work. Write each answer as a single exact value (a number, fraction, or short word).

1. Find the mean of this data set: 4, 6, 8, 10, 12.

Answer: _____

2. Find the mean of this data set: 3, 5, 7, 9.

Answer: _____

3. Find the median of this data set: 2, 5, 8, 11, 14.

Answer: _____

4. Find the median of this data set: 4, 7, 9, 12 (an even number of values).

Answer: _____

5. Find the mode of this data set: 3, 5, 5, 7, 9.

Answer: _____

6. Find the range of this data set: 6, 10, 4, 15, 8.

Answer: _____

7. This ordered data set has 7 values: 1, 3, 5, 7, 9, 11, 13. Find Q1 (the median of the lower half, not counting the overall median).

Answer: _____

8. This ordered data set has 7 values: 1, 3, 5, 7, 9, 11, 13. Find Q3 (the median of the upper half, not counting the overall median).

Answer: _____

9. For an ordered data set, $Q1 = 4$ and $Q3 = 10$. Find the IQR (interquartile range).

Answer: _____

10. Find the IQR of this data set: 2, 4, 6, 8, 10, 12, 14, 16. ($Q1 = 5$, $Q3 = 13$.)

Answer: _____

11. The mean of a data set is 10. One data value is 13. Find the deviation of that value from the mean (value minus mean).

Answer: _____

12. A data set has just two values: 4 and 8. Find the mean, then find the standard deviation (for two values, it equals half the distance between them).

Answer: _____