Keystone Week 15 **Name:** _____

1. Raquel and Simon both ride their bicycles to school and leave their houses at the same time. The time it took each of them to bike to school from Monday through Thursday is recorded in the table below.

	Mon.	Tues.	Wed.	Thurs.
Raquel	18 min	23 min	19 min	20 min
Simon	15 min	14 min	16 min.	19 min

Based on their mean times, which statement best describes how Raquel and Simon will most likely arrive at school on Friday?

- **A.** Raquel will most likely arrive 4 minutes after Simon arrives.
- **B.** Raquel will most likely arrive 1 minute after Simon arrives.
- **C.** Simon will most likely arrive 4 minutes after Raquel arrives.
- **D.** Raquel and Simon will most likely arrive at the same time.

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2. The number of books checked out at two different libraries each day this week are shown below.

	Mon.	Tues.	Wed.	Thurs.	Fri.	Sat.
Williams	66	59	63	58	65	58
Ryder	70	65	72	74	72	69

How do the median number of books checked out each day compare?

- **A.** The median number of books checked out at Ryder is equal to the median number of books checked out at Williams.
- **B.** The median number of books checked out at Williams is 12 more than the median number of books checked out at Ryder.
- **C.** The median number of books checked out at Ryder is 5 more than the median number of books checked out at Williams.
- **D.** The median number of books checked out at Ryder is 10 more than the median number of books checked out at Williams.

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3. What is the range of the following set of numbers?

29.91, 31.51, 38.11, 39.11, 34.51, 32.51, 28.91, 38.11, 27.91

- **A.** 11.2
- **B.** 39.11
- **C.** 33.40
- **D.** 10.2

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4. Each of the five math teachers are comparing the number of students in their homeroom classes. The number of boys and girls in each teachers' classes are recorded in the table below.

Homeroom Classes

Girls	17	14	18	14	17
Boys	8	12	11	6	8

Which statement best describes the means of the two sets of data?

A. The mean number of girls is 7 times greater than the mean number of boys in the homeroom classes.

B. The mean number of girls is 7 more than the mean number of boys in the homeroom classes.

C. The mean number of boys is 7 more than the mean number of girls in the homeroom classes.

D. The mean number of girls is the same as the mean number of boys in the homeroom classes.

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5. What is the range of the following set of numbers?

39.1, 32.2, 43, 38.1, 34.2, 37.1, 33.2, 44, 33.2

A. 11.8

B. 37.12

C. 44

D. 10.8

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6. What is the mode of the following set of numbers?

67.5, 69, 41, 67.5, 69, 122.71, 69, 139, 41, 139

A. 41

B. 69

C. 122.71

D. 80.58875

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7. What is the upper quartile, Q_3, of the following data set?

60, 58, 48, 67, 72, 82, 43, 81, 53, 77, 62, 38, 54, 66, 39

A. 75

B. 67

C. 79

D. 72

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8. A company conducted a survey of 5,670 people to find out the fastest speed they have driven in certain cities. Based on the table below, what is the difference between sample's interquartile range and the population's interquartile range?

Name	Minimum	1st Quartile	2nd Quartile	3rd Quartile	Maximum
Atlanta	63	82	92	100	114
Athens	64	76	97	104	116
Chickamauga	70	78	86	95	110
Gray	70	85	88	105	118

Population	61	73	96	105	126

A. There is a difference of 14.25.
C. There is a difference of 8.25.
B. There is a difference of 15.4.
D. There is a difference of 11.25.

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9. The scores on Ms. Glowson's math tests are listed below.

65, 57, 79, 84, 81, 66, 70, 73, 60, 51, 64

What is the interquartile range of the scores?

A. 19
C. 79
B. 60
D. 33

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10. What is the mean of the following set of numbers? [Round the answer to the hundredths place if needed.]

5, 0.99, 5, 2.84, 6, 44, 1.51, 16

A. 10.17
C. 44
B. 5
D. 11.62

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11. In Mrs. Roberge's fifth grade class, the students are measuring and recording their heights. The heights of five girls and five boys in the class are recorded in the table below.

Students' Heights					
Girls	54 inches	51 inches	55 inches	51 inches	54 inches
Boys	42 inches	46 inches	45 inches	40 inches	42 inches

Which statement best describes the means of the two sets of data?

A. The mean of the girls' heights is 10 times greater than the mean of the boys' heights.
C. The mean of the boys' heights is 10 inches greater than the mean of the girls' heights.
B. The mean of the girls' heights is 10 inches greater than the mean of the boys' heights.
D. The mean of the girls' heights is the same as the mean of the boys' heights.

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12. Mike, Shannon, Layla, and Rachel each recorded the grades they received on five tests in their math class in the table below.

Student	**Test Scores**				
	Test 1	**Test 2**	**Test 3**	**Test 4**	**Test 5**
Mike	81	71	68	91	73
Shannon	96	84	83	88	92
Layla	83	89	88	81	82
Rachel	91	69	64	70	74

What is the range of Rachel's scores?

A. 23
C. 21
B. 27
D. 13

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13. To prepare for an upcoming marathon, John and Luke have been running several miles each day. As a comparison, they have recorded the time it has taken them to run one mile on each of the last seven days on the table below (times are shown in seconds).

John	752	700	679	732	709	713	669
Luke	682	621	609	642	589	621	672

How does the mode of John's data compare to the mode of Luke's data?

A. The mode of John's data is 700, while there is no mode for Luke's data.
C. The mode of John's data is less than the mode of Luke's data by 88.
B. The mode of John's data is greater than the mode of Luke's data by 88.
D. There is no mode for John's data, while the mode of Luke's data is 621.

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14. What is the lower quartile, Q_1, of the following data set?

58, 53, 42, 69, 74, 84, 40, 79, 47, 76, 63, 32, 49, 67, 37

A. 78
C. 69
B. 74
D. 42

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15. What is the mode of the following set of numbers?

52.7, 138, 20.16, 52.7, 138, 177, 52.7, 8.3, 8.3

A. 138
C. 177
B. 52.7
D. 79.945

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16. What is the mean of the following set of numbers?

27.86, 24, 5.14, 24

A. 18.86
C. 20.25
B. 5.14
D. 10.125

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17. What is the median of the following set of numbers?

39.4 , 38 , 32 , 38 , 33.6 , 30.6 , 35 , 41.4 , 28.6

A. 38
C. 32
B. 28.6
D. 35

18. What is the interquartile range of the following data set?

26, 36, 37, 44, 41, 31, 32

A. 36
C. 31
B. 10
D. 61

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19. What is the median of the following set of numbers?

32.9 , 29 , 34.9 , 31 , 29 , 29.1 , 27.1 , 36.9 , 33

A. 27.1
C. 31
B. 34.9
D. 25.1

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20. What is the interquartile range of the following data set?

451, 518, 540, 579, 559, 471, 493

A. 108
C. 518
B. 128
D. 88
