Central Tendency and Spread Practice Worksheet \#2
Name $\qquad$ Class Period $\qquad$

## Central Tendency and Spread

1. The table shows the scores from the top 10 players of our Homecoming basketball game.

Which player scored more than the upper quartile of the data?
A. Matt
B. Michael
C. Jim
D. Bobby

| Player | Points | Player | Points |
| :--- | :---: | :--- | :---: |
| Michael | 12 | Dave | 9 |
| Brendan | 6 | Heath | 15 |
| Andrew | 21 | Jack | 3 |
| Jim | 14 | Bobby | 10 |
| Andre | 5 | Matt | 18 |

## For \#2-3, use the graph to the right.

2. Fill in the blanks:

- The median for $1^{\text {st }}$ period is $\qquad$
- The median for $2^{\text {nd }}$ period is $\qquad$
- The lowest score for $1^{\text {st }}$ period is $\qquad$
- The lower quartile for $2^{\text {nd }}$ period is $\qquad$
- The spread of the middle $50 \%$ for $2^{\text {nd }}$ period is $\qquad$

3. Which statement below is NOT true?
A. $1^{\text {st }}$ period had the highest score on the test

B. The median for $1^{\text {tt }}$ period is 5 less than the median for $2^{\text {nd }}$
C. The LQ for $1^{\text {st }}$ period is 5 less than LQ for $2^{\text {nd }}$ period
D. The UQ for $2^{\text {nd }}$ period is 94

Sample A: 2, 4, 4, 4, 8, 8, 10, 12, 12, 14 Sample B: $0,1,4,7,9,9,10,12,12,15$
4. Which statement accurately compares the two samples?
A. The mean for Sample A is 1 greater than the mean of Sample B.
B. The mean for Sample B is 1 greater than the mean of Sample A.
C. The mean for Sample A is 0.1 greater than the mean of Sample B.
D. The mean for Sample $B$ is 0.1 greater than the mean of Sample $A$.
5. Your scores on the first 4 tests in Algebra were 85, 80, 90, and 93 . What do you need to make on the $5^{\text {th }}$ test to have a 90 average in the class?
6. Which measure of central tendency is MOST EASILY affected by outliers?
7. Forty-five people were asked about how many miles they walked in one week. The results are shown in the graph. How does the median number of miles walked for boys compare with the median number of miles walked for girls?

Average Distance Walked

8. The table below shows the running times for science-fiction movies. Find the Mean Absolute Deviation of the data.

| Running Times for Movies (min) |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 98 | 87 | 93 | 88 | 126 | 108 |

9. The summary statistics for all of the workers at a steel factory are shown. Three sample groups were taken from each of the three shifts. For which sample group is the mean absolute deviation greater than that of the population?

## Steel Factory Workers Ages

Mean Absolute Deviation: 11.23

| Shift 1 | Shift 2 | Shift 3 |
| :---: | :---: | :---: |
| 23 | 19 | 21 |
| 19 | 22 | 23 |
| 50 | 24 | 25 |
| 49 | 40 | 40 |
| 67 | 45 | 35 |
| 34 | 29 | 19 |
| 30 | 33 | 70 |
| 59 | 29 | 40 |
| 40 | 39 | 22 |
| 33 | 59 | 23 |

