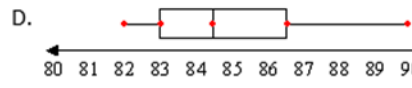
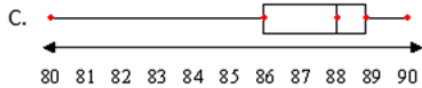
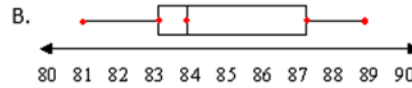
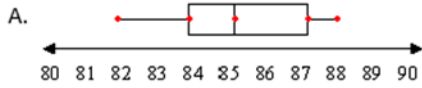


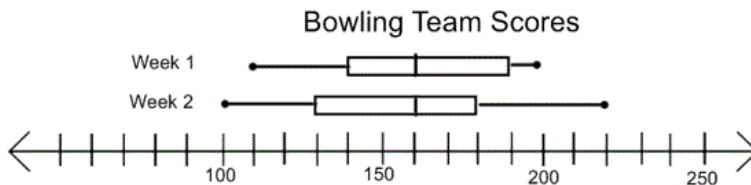
4/6 Comparing Box Plots Lesson Check-In **Answers**

(1) Which box and whisker plot has a range of 10?



- Hi - Lo = Range**
- A. $88 - 82 = 6$
 - B. $89 - 81 = 8$
 - C. $90 - 80 = 10$
 - D. $90 - 82 = 8$

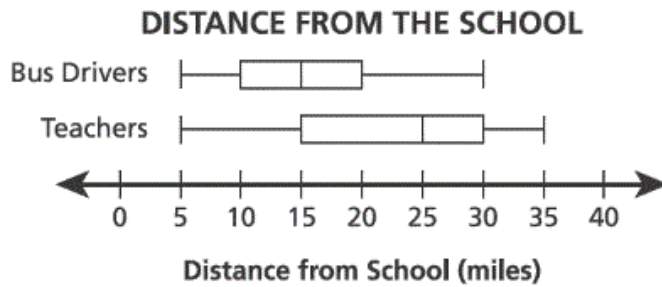
(2) A bowling team participates in a two week tournament and records the scores for each team member each week. The scores for both weeks are represented by the box plots. Which conclusion can be drawn?



	Week 1	Week 2
Median	160	160
IQR (Q3 - Q1)	80 (190 - 110)	80 (180 - 100)

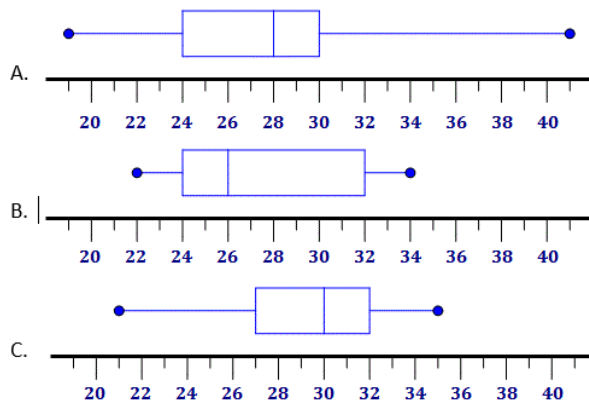
- A. The scores in week 1 and week 2 have the same median and interquartile range.
- B. The scores in week 1 have a greater median and a greater interquartile range than week 2.
- C. The scores in week 2 have a greater interquartile range but both data sets have the same median.
- D. The scores in week 2 have a greater median but both data sets have the same interquartile range.

- (3) A principal gathered data about the distance, in miles, that his teachers and bus drivers live from school. The box plots show these data. Which statement is TRUE?



	Bus Drivers	Teachers
Range (Hi - Lo)	25 (30 - 5)	30 (35 - 5)
IQR (Q3 - Q1)	10 (20 - 10)	15 (30 - 15)

- A. The interquartile range of the distances for the bus drivers is twice the interquartile range of the distances for the teachers.
- B. The range of distances for the teachers is twice the range of the distances for the bus drivers.
- C. The interquartile range of the distances for the bus drivers is 5 miles less than the interquartile range of the distances for the teachers.
- D. The range of the distances for the teachers is 5 miles less than the range of the distances for the bus drivers.
- (4) The box plots below summarize the number of points scored in any given basketball game during one season by three different players. Each letter represents a different player. What conclusion can be drawn from these data?



Remember, each section of the box-and-whisker plot contains 25% of the data.

- A. Player A is the most consistent player. **FALSE (The data is wide spread, not consistent.)**
- B. All three players scored at least 28 points or more during 50% of the season. **FALSE (The 50% means that all median must be 28 or higher for all 3 players. Player B has a median of 26.)**
- C. Player C is a high scoring player because he scored 27 points or more during 75% of the season. **TRUE (Player C has a first quartile score of 27 points, there are three sections of the box-and-whisker plot greater than 27 points. These three sections represent 75% of the data.)**
- D. Players B and C never scored less than 22 points in a game. **FALSE (Player C's low score is 21.)**