

HW 8-1

Sec 1

Box and Whisker Plots

Unit 8

****Don't forget to add LABELS to all of you graphs!****

1. The data sets below give the waiting times (in minutes) of several people at two veterinary offices. Find the mean, median, mode and range of each data set.

Office A	
14, 17, 18, 19, 20, 24, 24, 30, 32	

Office A:

Mean: 22

Median: 20

Mode: 24

Range: 18

Find the **mean, median, mode and range** for each data set.

2. number

each hour: 3, 5, 8, 1, 4, 11, 3

3. weight in pounds of boxes loaded onto a semi truck: 201, 201, 200, 199, 199

mean: 200

median: 200

mode: 201, 199

range: 2

4. car speeds in miles per hour observed by a highway patrol officer: 60, 53, 53, 52, 53, 55, 55, 57

Find the **minimum, lower quartile, median, upper quartile, maximum and IQR** values for each data set.

5. prices in dollars of smartphones: 311, 309, 312, 314, 399, 312

Minimum: 309
 Lower Quartile (Q1): 311
 Median: 312
 Upper Quartile (Q3): 314
 Maximum: 399
 IQR: 3

6. attendance at an event for the last nine years: 68, 99, 73, ...

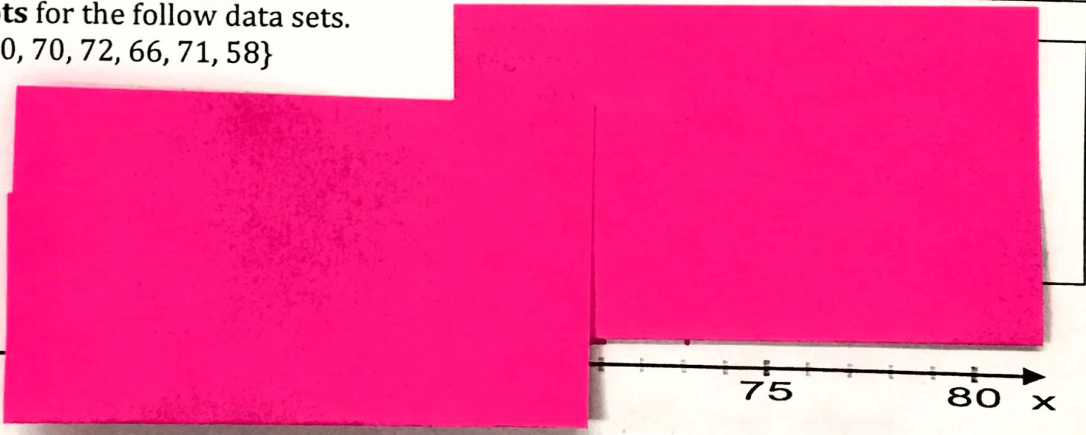


7. books a student checks out of the library: 17, 9, 10, 17, 18, 5, 2

Minimum: 2
 Lower Quartile (Q1): 5
 Median: 10
 Upper Quartile (Q3): 17
 Maximum: 18
 IQR: 12

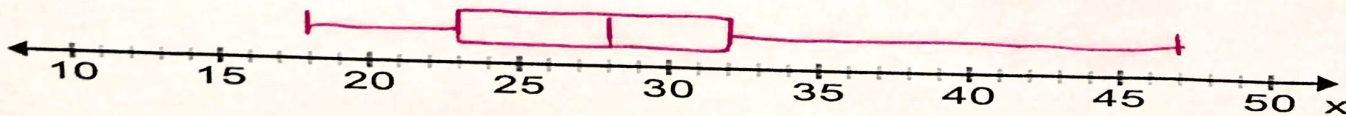
Create **box and whisker plots** for the follow data sets.

8. {65, 63, 69, 71, 73, 59, 60, 70, 72, 66, 71, 58}



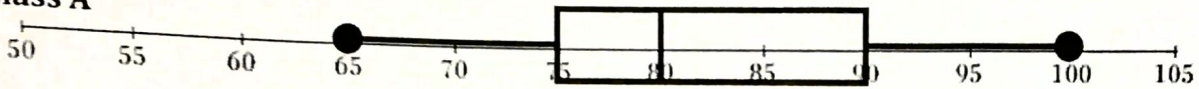
9. {31, 30, 28, 26, 22, 34, 26, 31, 47, 32, 18, 33, 26, 23, 18}

Minimum: 18
 Lower Quartile (Q1): 23
 Median: 28
 Upper Quartile (Q3): 32
 Maximum: 47
 IQR: 9

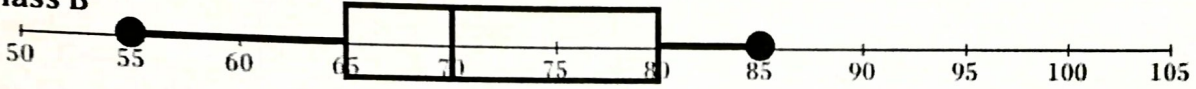


Three classes all take the same test. The next three box and whisker plots all are made from those classes scores. Use them to answer 6-11 (found on the next page).

Class A



Class B



Class C



10. Which class had the largest range?

11. What is the interquartile range (IQR) for Class A? 15

12. What percent of the data is represented by the IQR?

13. Which class had the lowest score? Class B

14. Which class had the highest score?

15. Which class did the best? Why do you think so?

Class C High score of lowest was only 75%

16. Which class do you think had the highest mean (average)?

17. Which class likely had the highest mean (average)?

Class C