

a. Data:

4.20, 5.45, 4.61, 0.11, 10.8, 1.44, 3.31, 2.60, 1.44, 3.92, 4.38, 3.26, 3.95, 2.79

$n = 14$

Mean:

$$\bar{x} = \frac{1}{n} \sum_{i=1}^n x_i \approx 3.733$$

Ordered data:

0.11, 1.44, 1.44, 2.6, 2.79, 3.26, 3.31, 3.92, 3.95, 4.2, 4.38, 4.61, 5.45, 10.8

$n = 14$ so the median is the mean between the 7th and the 8th element:

$$\text{Median} = Q_2 = \frac{3.31 + 3.92}{2} = 3.615$$

There are 7 elements before Q_2 and 7 after, so Q_1 is the 4th element and Q_3 is the 11th.

$$Q_2 = 2.6 \quad Q_3 = 4.38$$

b. Boxplot:

