1. **Solution**
The sample size, n, is 28. We determine the indeces and values of Q1, Q2, and Q3.

Quartile	Formula for i	i	x
Q1	$\lceil 0.25 \times 28 \rceil$	7	60.7
Q2	$\lceil 0.5 \times 28 \rceil$	14	70.77
Q3	$\lceil 0.75 \times 28 \rceil$	21	75.01

We determine the IQR.

$$\begin{aligned} \text{IQR} &= \text{Q3} - \text{Q1} \\ &= 75.01 - 60.7 \\ &= 14.31 \end{aligned}$$

We determine the outlier boundaries.

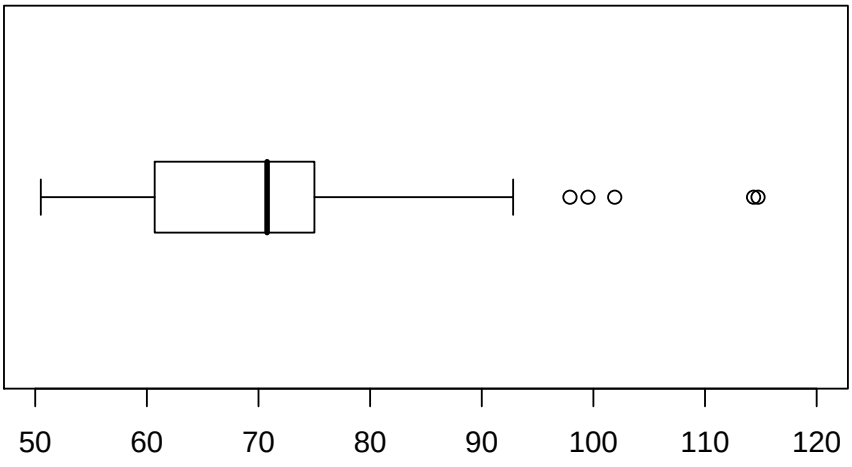
$$\begin{aligned} \text{lower boundary} &= \text{Q1} - 1.5 \times \text{IQR} \\ &= 60.7 - 1.5 \times 14.31 \\ &= 39.235 \end{aligned}$$

$$\begin{aligned} \text{upper boundary} &= \text{Q3} + 1.5 \times \text{IQR} \\ &= 75.01 + 1.5 \times 14.31 \\ &= 96.475 \end{aligned}$$

We determine the outliers.

$$\text{outliers} = \{97.9, 99.51, 101.91, 114.35, 114.75\}$$

We identify the ends of the whiskers: 50.5 and 92.81. We plot the boxplot.



2. **Solution**
The sample size, n, is 42. We determine the indeces and values of Q1, Q2, and Q3.

Quartile	Formula for i	i	x
Q1	$\lceil 0.25 \times 42 \rceil$	11	76.78
Q2	$\lceil 0.5 \times 42 \rceil$	21	90.84
Q3	$\lceil 0.75 \times 42 \rceil$	32	99.06

We determine the IQR.

$$\begin{aligned} \text{IQR} &= \text{Q3} - \text{Q1} \\ &= 99.06 - 76.78 \\ &= 22.28 \end{aligned}$$

We determine the outlier boundaries.

$$\begin{aligned} \text{lower boundary} &= \text{Q1} - 1.5 \times \text{IQR} \\ &= 76.78 - 1.5 \times 22.28 \\ &= 43.36 \end{aligned}$$

$$\begin{aligned} \text{upper boundary} &= \text{Q3} + 1.5 \times \text{IQR} \\ &= 99.06 + 1.5 \times 22.28 \\ &= 132.48 \end{aligned}$$

We determine the outliers.

$$\text{outliers} = \{24.61\}$$

We identify the ends of the whiskers: 45.46 and 109.76. We plot the boxplot.