

Percentile and Interquartile Range(IQR)

$\text{Position}_i = (n) \left(\frac{i}{100} \right) = j + g$: i^{th} percentile

if $g > 0 \rightarrow \text{position}_i = (j+1)\text{-th position}$

if $g = 0 \rightarrow \text{position}_i = \text{the average of the two observation in the } j\text{-th and } (j+1)\text{-th}$