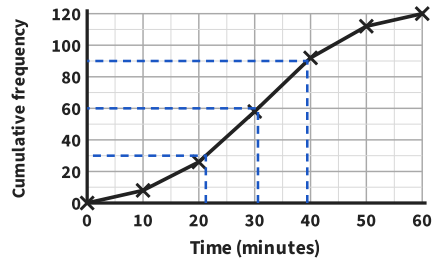


Cumulative Frequency *stretch*

ANSWERS 

1

The graph shows how long 120 visitors stayed in a library. Estimate the median and the interquartile range.



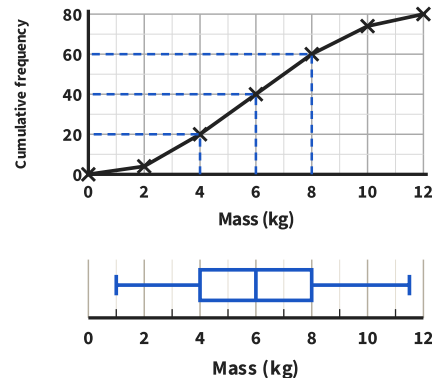
Median at 60: 31 (29 to 33)

IQR 39 - 21 (15 to 22)

Answer median about 31, IQR about 18

2

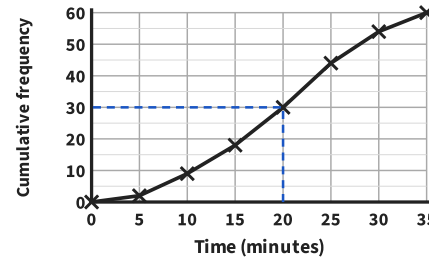
The graph shows the masses of 80 pumpkins. The lightest was 1 kg and the heaviest 11.5 kg. Draw a box plot.



Box plot 1, 4, 6, 8, 11.5 kg

3

60 people cooked a meal kit. Rhys says the point (20, 30) means 30 people took 20 minutes. What does it mean? How many took more than 20 minutes?

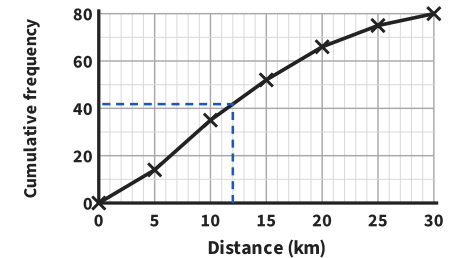


30 people took 20 minutes or less

Answer 60 - 30 = 30 people

4

The graph shows how far 80 fans live from a stadium. Fans living over 12 km away get a free bus. A bus holds 15. How many buses are needed?



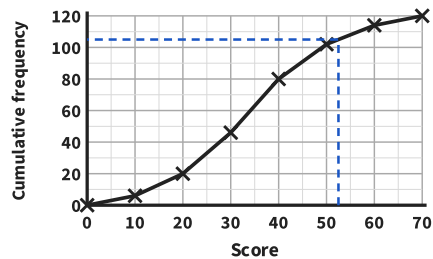
about 80 - 42 = 38 further than 12 km

38 ÷ 15 = 2.53...: round up to 3

Answer 3 buses

5

The graph shows the scores of 120 players in an online game. The 15 players with the highest scores win a prize. Estimate the lowest score that wins a prize.

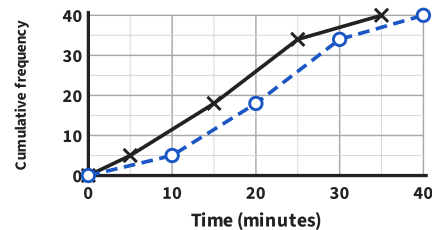


120 - 15 = 105: read across from 105

Answer about 53 (50 to 55)

6

Sam drew this graph for 40 times: 5 took 0 to 10 minutes, 13 took over 10 and up to 20, 16 over 20 and up to 30, 6 over 30 and up to 40. Explain his mistake.

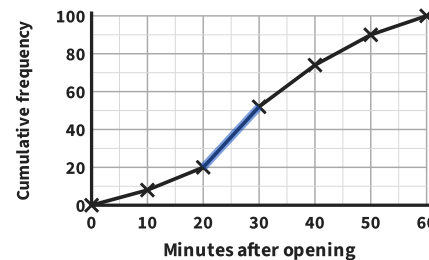


He plotted at the midpoints 5, 15, 25, 35

Answer plot at 10, 20, 30, 40

7

The graph shows when 100 shoppers came into a shop after it opened. In which 10 minutes did most arrive? How does the graph show it?

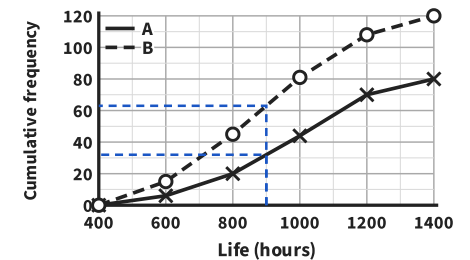


52 - 20 = 32 shoppers: the steepest part

Answer 20 to 30 minutes

8

Factory A tested 80 bulbs and factory B tested 120. Whose bulbs are more likely to last over 900 hours? Show how you decide.



A: 48 of 80; B: 57 of 120 (B has more)

Answer A: 60% against 47.5%