1 The table shows some information about the profit made each day at a cricket club on 100 days.

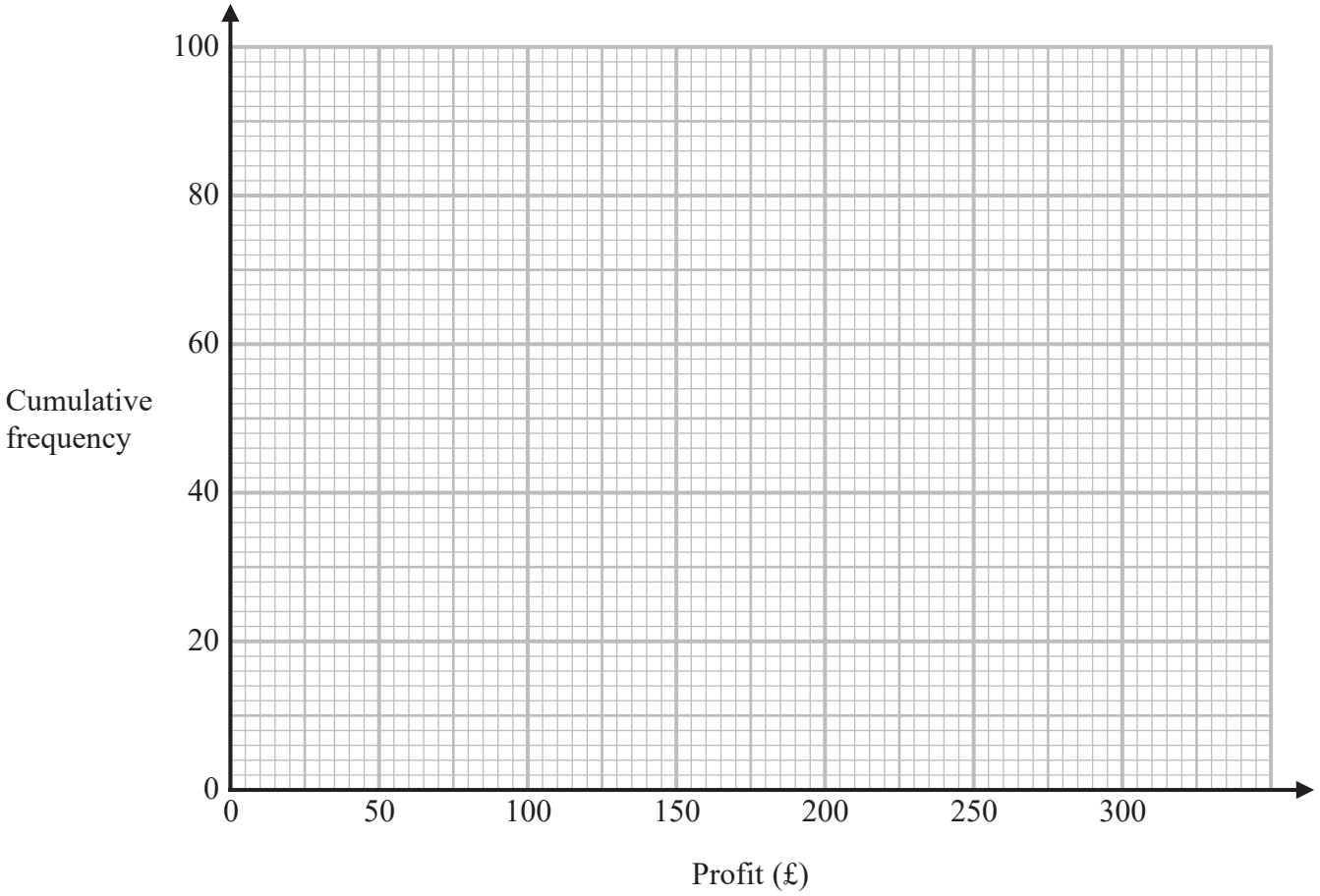
Profit (£x)	**Frequency**
$0 \leqslant x < 50$	10
$50 \leqslant x < 100$	15
$100 \leqslant x < 150$	25
$150 \leqslant x < 200$	30
$200 \leqslant x < 250$	5
$250 \leqslant x < 300$	15

(a) Complete the cumulative frequency table.

Profit (£x)	**Cumulative frequency**
$0 \leqslant x < 50$	
$0 \leqslant x < 100$	
$0 \leqslant x < 150$	
$0 \leqslant x < 200$	
$0 \leqslant x < 250$	
$0 \leqslant x < 300$	

(1)

(b) On the grid, draw a cumulative frequency graph for this information.



(2)

(c) Use your graph to find an estimate for the number of days on which the profit was less than £125

..... days

(1)

(d) Use your graph to find an estimate for the interquartile range.

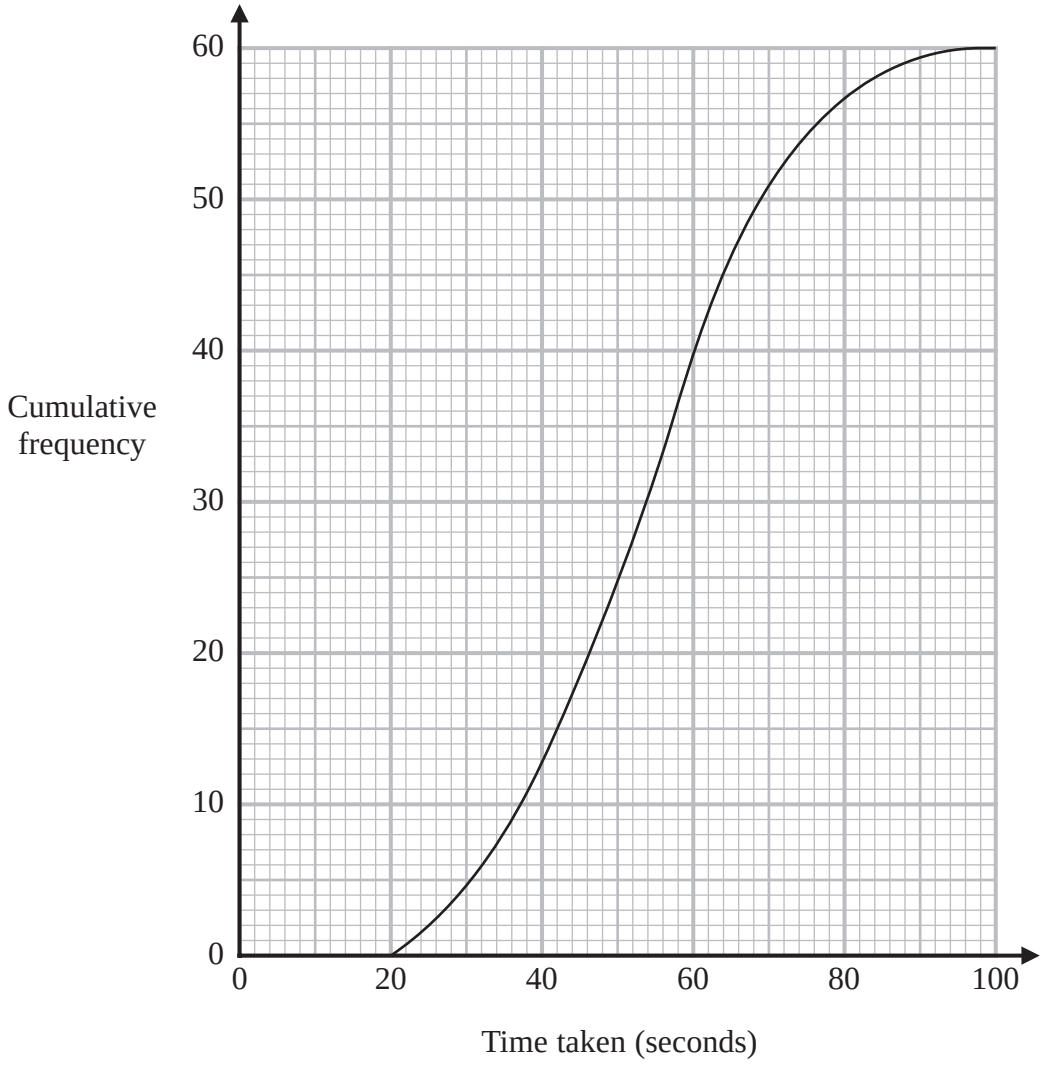
£.....

(2)

(Total for Question 1 is 6 marks)

2 In an experiment, 60 students each completed a puzzle.

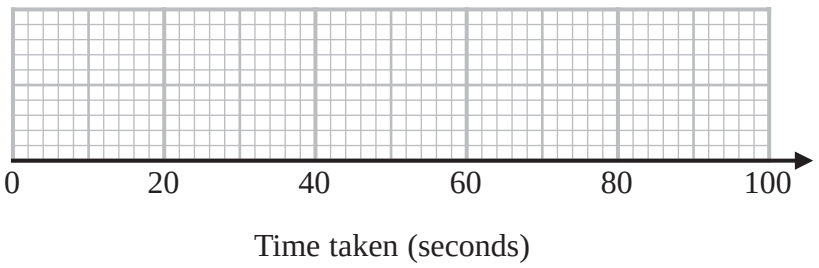
The cumulative frequency graph shows information about the times taken for the 60 students to complete the puzzle.



For these 60 students,

the least time taken was 24 seconds
the greatest time taken was 96 seconds.

On the grid below, draw a box plot for the distribution of the times taken by the students.

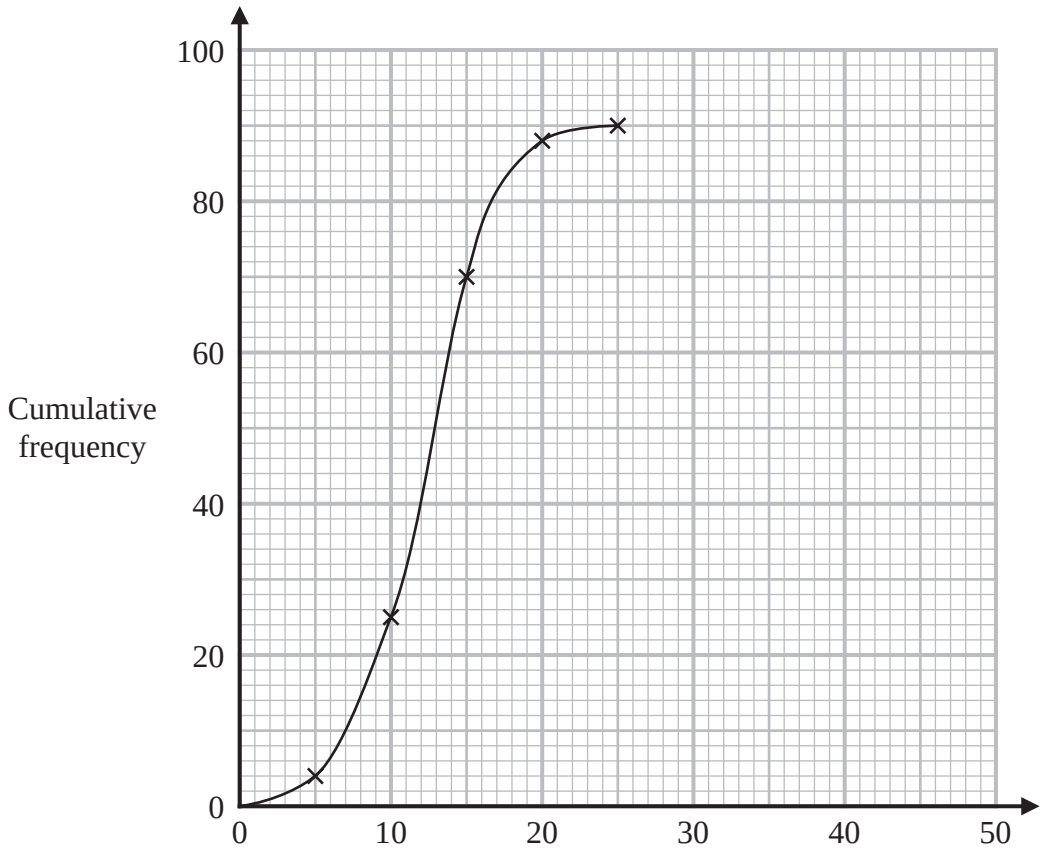


(Total for Question 2 is 3 marks)

3 Chen has this information about the time that it took an operator at a call centre to answer each of 90 calls.

Time (t seconds)	**Cumulative frequency**
$0 < t \leqslant 10$	4
$0 < t \leqslant 20$	25
$0 < t \leqslant 30$	70
$0 < t \leqslant 40$	88
$0 < t \leqslant 50$	90

Chen draws this cumulative frequency graph for the information in the table.



Write down two different things that are wrong with this graph.

1.....

.....

2.....

.....

(Total for Question 3 is 2 marks)

4 The cumulative frequency table gives information about the ages of 80 people working for a company.

Age (a years)	**Cumulative frequency**
$20 < a \leqslant 30$	20
$20 < a \leqslant 40$	48
$20 < a \leqslant 50$	64
$20 < a \leqslant 60$	75
$20 < a \leqslant 70$	80

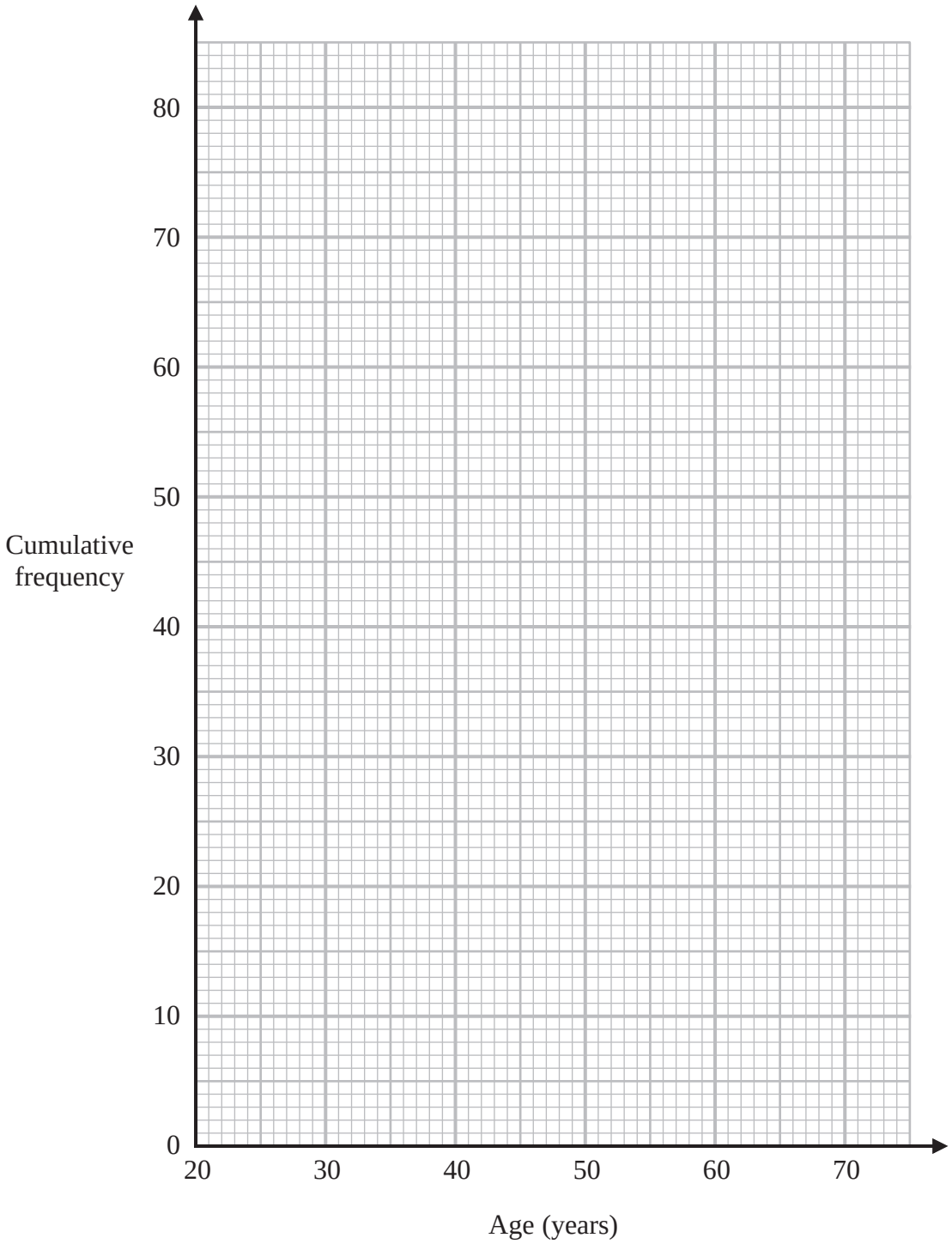
(a) On the grid opposite, draw a cumulative frequency graph for this information.

(2)

(b) Use your graph to find an estimate for the median age.

..... years

(1)



(Total for Question 4 is 3 marks)

5 The frequency table gives information about the weights of 60 parcels.

Weight (w kg)	Frequency
$0 < w \leqslant 2$	7
$2 < w \leqslant 4$	21
$4 < w \leqslant 6$	15
$6 < w \leqslant 8$	11
$8 < w \leqslant 10$	6

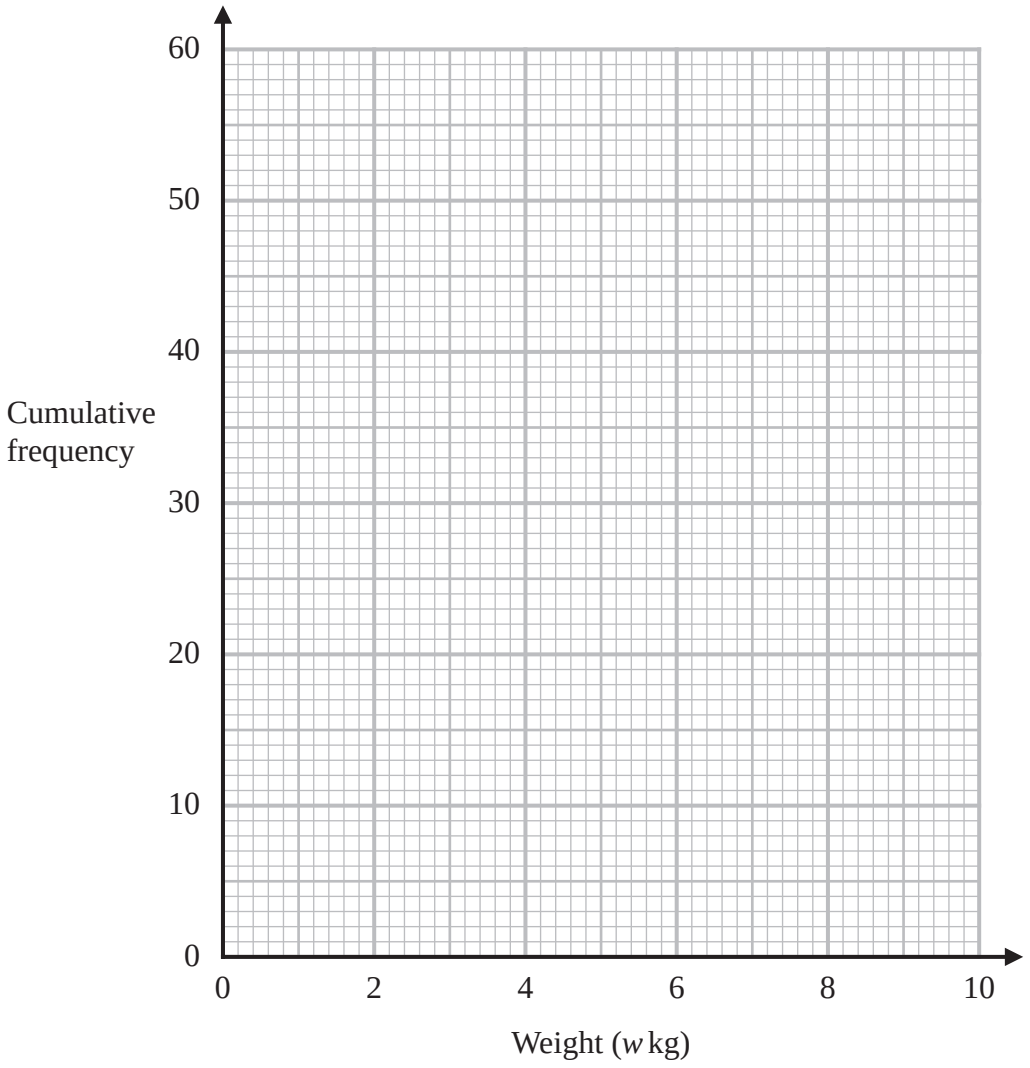
(a) Complete the cumulative frequency table.

Weight (w kg)	Cumulative frequency
$0 < w \leqslant 2$	
$0 < w \leqslant 4$	
$0 < w \leqslant 6$	
$0 < w \leqslant 8$	
$0 < w \leqslant 10$	

(1)

(b) On the grid opposite, draw a cumulative frequency graph for your table.

(2)



(c) Use your graph to find an estimate for the interquartile range.

..... kg

(2)

(d) Use your graph to find an estimate for the number of these parcels with a weight greater than 7.4 kg.

.....

(2)

(Total for Question 5 is 7 marks)