



H16-10min Histograms and Frequency Density: 10-minute Pack

EDEXCEL 1ST0 · Calculator allowed · about 10 minutes

Total Marks

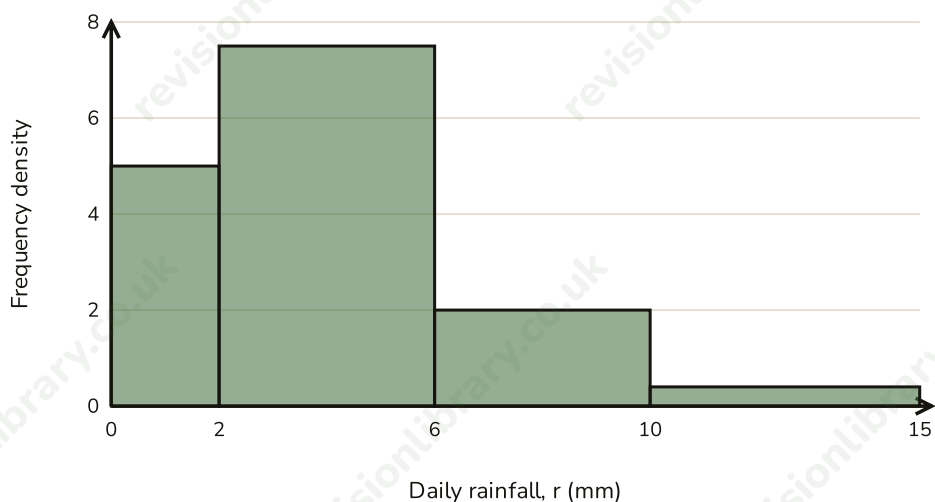
Name: _____ Date: ____ / ____ / ____

Answer ALL questions. Show all your working.

- 1** A class in a grouped frequency table has frequency 18 and class width 3. Work out the frequency density for this class.

(Total for Question 1 is 1 mark)

- 2 A weather station recorded the daily rainfall, r mm, on each of 50 days one spring. The histogram shows the results.



- (a) Write down the frequency density for the class $6 < r \leq 10$. (1)

- (b) Write down the class with the highest frequency density. (1)

- (c) Work out the number of days with rainfall between 2mm and 6mm. (2)

(Total for Question 2 is 4 marks)

- 3 Write down whether the following statement is True or False: In a histogram, the area of a bar represents the frequency for that class.

(Total for Question 3 is 1 mark)

4 For each part, use the formula $\text{frequency density} = \text{frequency} \div \text{class width}$.

(a) A class has frequency 36 and frequency density 4.5. Work out the class width. (2)

(b) A different class has class width 12 and frequency density 3.5. Work out the frequency for this class. (2)

(Total for Question 4 is 4 marks)

Mark scheme · H16-10min Histograms and Frequency Density: 10-minute Pack

Question 1

- **B1** 6 cao
- **Answer: 6**

Question 2

- (a) **B1** 2 cao
- (a) **Answer: 2**
- (b) **B1** $2 < r \leq 6$ cao
- (b) **Answer: $2 < r \leq 6$**
- (c) **M1** 7.5×4 , oe
- (c) **A1** 30 cao
- (c) **Answer: 30**

Question 3

- **B1** True cao
- **Answer: True**

Question 4

- (a) **M1** $36 \div 4.5$, oe
- (a) **A1** 8 cao
- (a) **Answer: 8**
- (b) **M1** 3.5×12 , oe
- (b) **A1** 42 cao
- (b) **Answer: 42**