

Name: _____

GCSE (1 – 9)

Bar Charts

Instructions

- Use **black** ink or ball-point pen.
- Answer all questions.
- Answer the questions in the spaces provided
– *there may be more space than you need.*
- Diagrams are **NOT** accurately drawn, unless otherwise indicated.
- You must **show all your working out.**

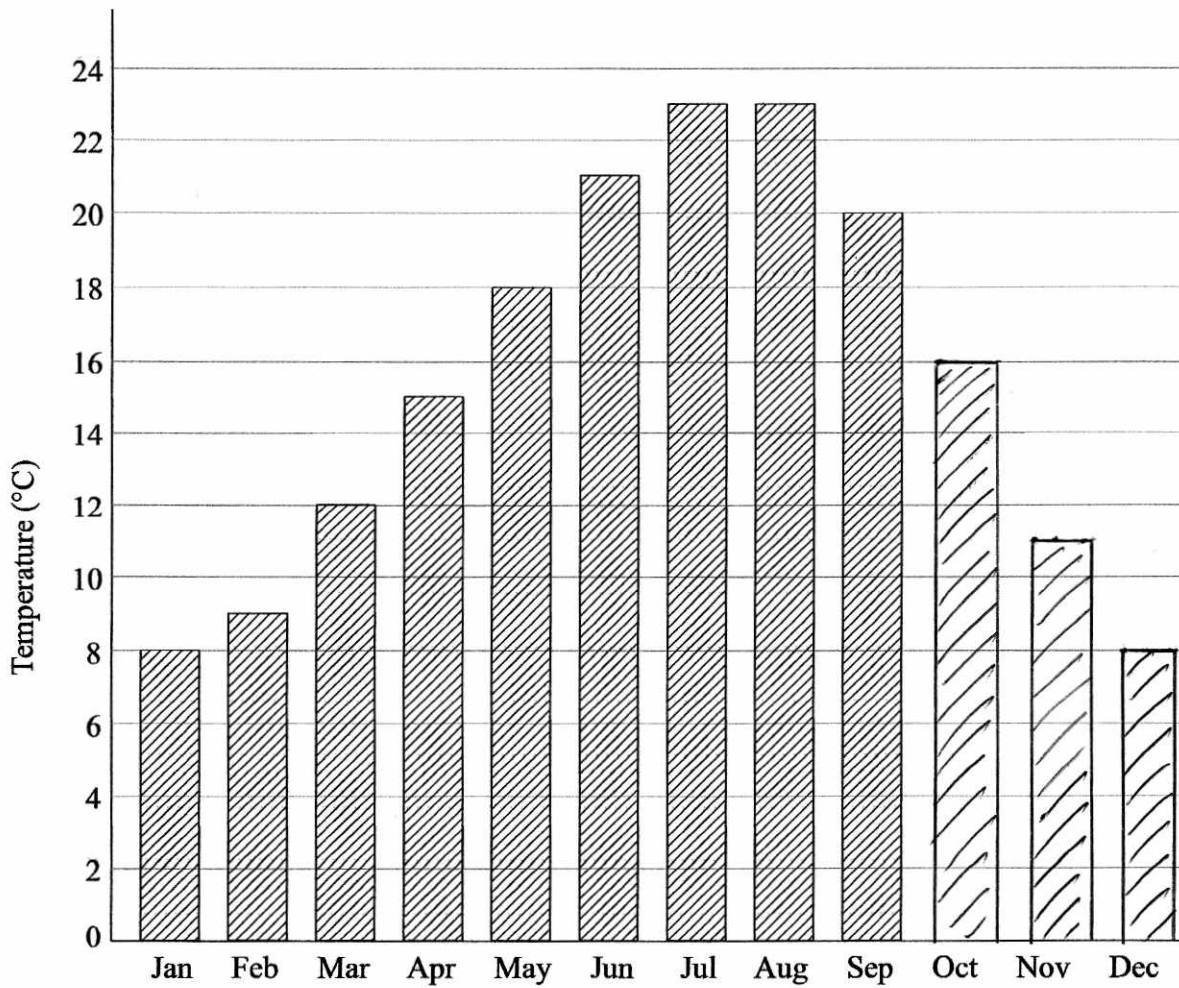
Information

- The marks for each question are shown in brackets
– *use this as a guide as to how much time to spend on each question.*

Advice

- Read each question carefully before you start to answer it.
- Keep an eye on the time.
- Try to answer every question.
- Check your answers if you have time at the end

1 Here is a bar chart showing the average maximum monthly temperature (°C) in Greenwich.



Here are the average monthly temperatures in October, November and December.

October	16°C
November	11°C
December	8°C

(a) Complete the bar chart to show this information.

(2)

(b) In which two months were the highest average temperatures recorded?

..... July and August
(1)

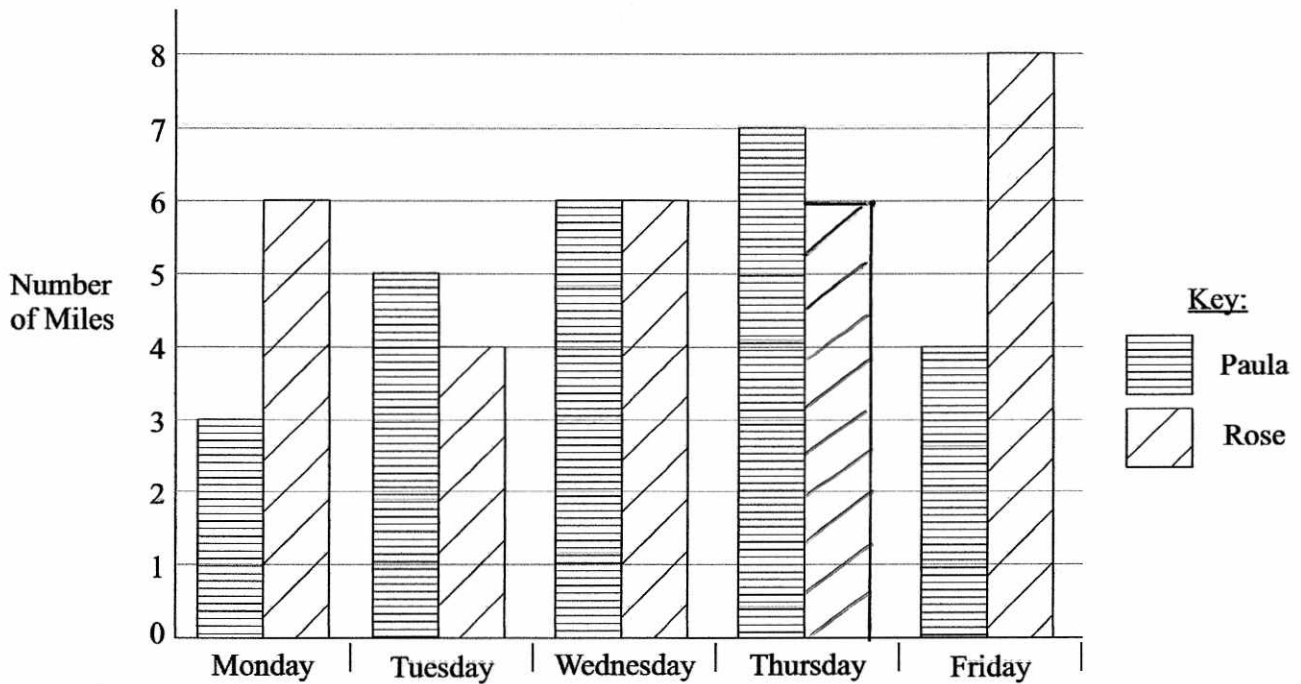
(c) Work out the range of average monthly temperatures

$$23 - 8 = 15$$

..... 15°C
(1)

(Total for question 1 is 4 marks)

2 Here is a bar chart showing the number of miles Paula and Rose ran from Monday to Friday in a week.



Rose runs further than Paula on Monday

(a) How much further?

$$6 - 3$$

$$\begin{array}{r} \dots\dots\dots 3 \\ \hline \end{array}$$

(1)

Rose ran 6 miles on Thursday

(b) Use this information to complete the bar chart.

(1)

Rose is not going to run on Saturday.

(c) How many miles would Paula have to run on Saturday so that the number of miles she runs from Monday and Saturday is the same as the number of miles Rose runs from Monday to Saturday.

$$PAULA : 3 + 5 + 6 + 7 + 4 = 25 \text{ miles}$$

$$ROSE : 6 + 4 + 6 + 6 + 8 = \cancel{28} \text{ miles}$$

$$30$$

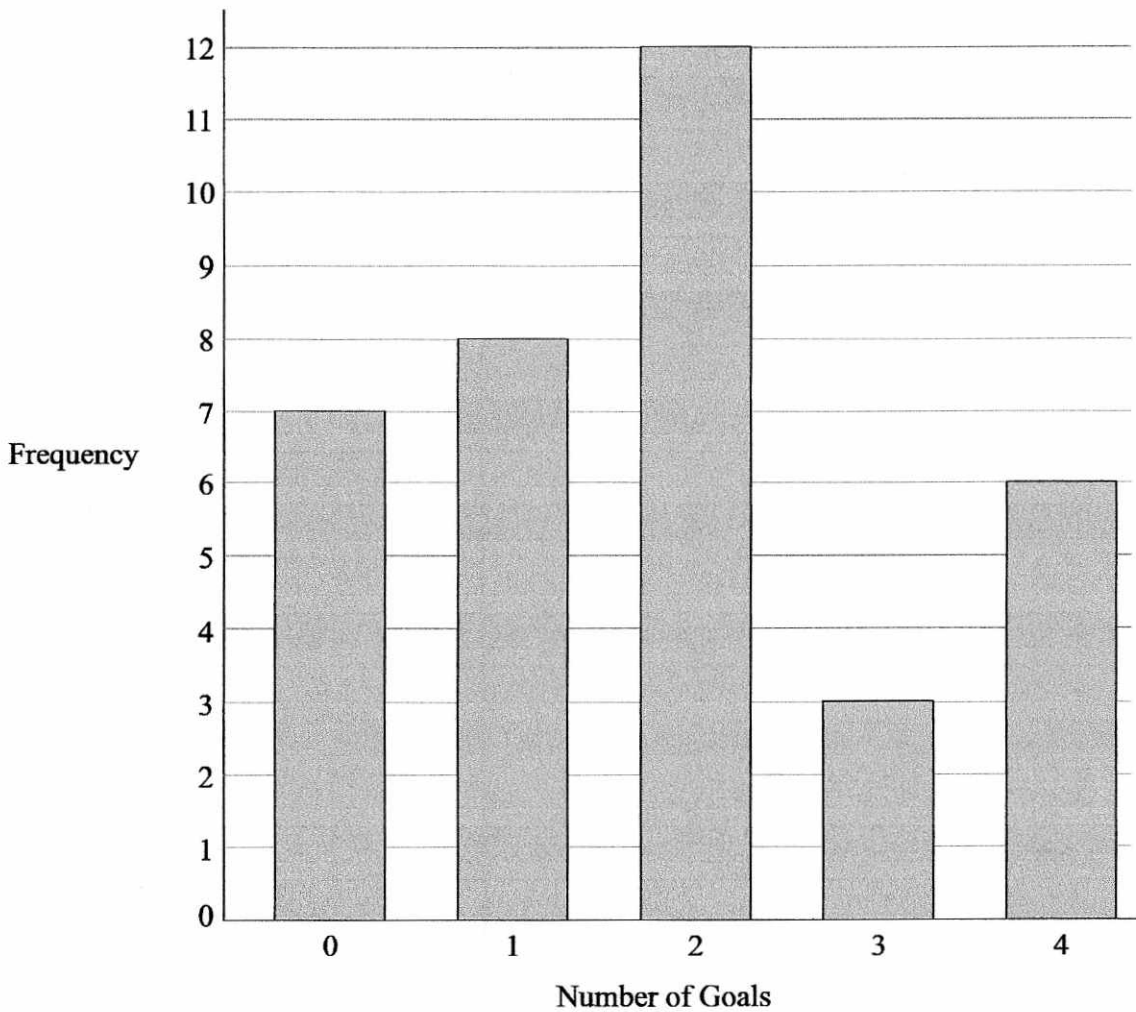
$$30 - 25$$

$$\begin{array}{r} \dots\dots\dots 5 \\ \hline \end{array}$$

(2)

(Total for question 2 is 4 marks)

3 Here is a bar chart showing the number of goals scored in a game by a football team in a season.



(a) What is the modal number of goals scored.

$\frac{2}{(1)}$

(b) Work out the total number of goals were scored in total by the team.

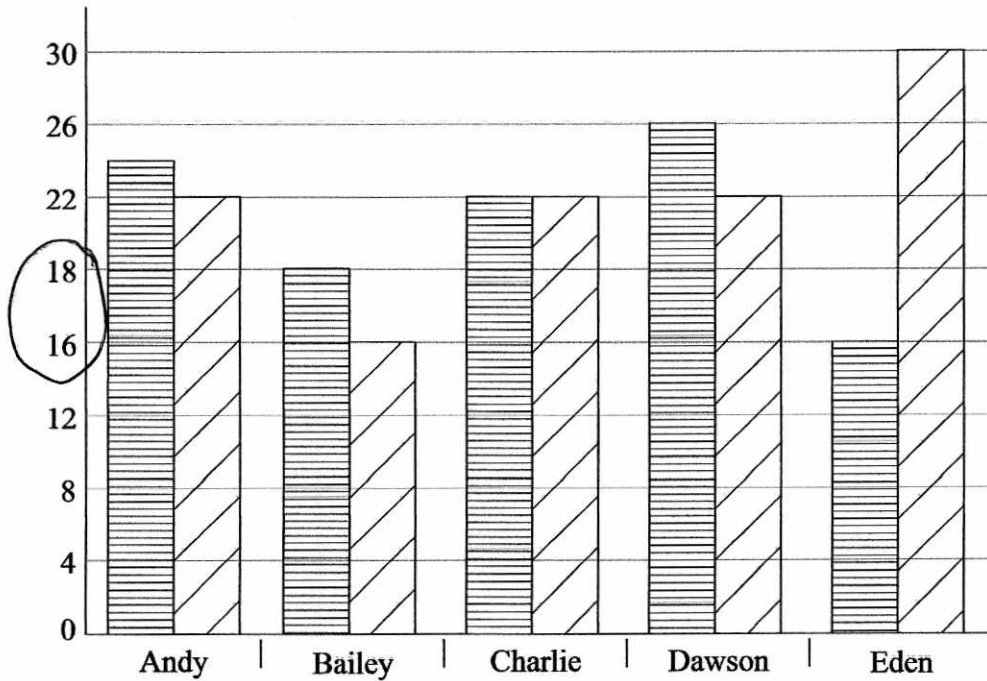
$$\begin{aligned}
 7 \times 0 &= 0 \\
 8 \times 1 &= 8 \\
 12 \times 2 &= 24 \\
 3 \times 3 &= 9 \\
 6 \times 4 &= 24
 \end{aligned}$$

$$8 + 24 + 9 + 24 = 65$$

$\frac{65}{(3)}$

(Total for question 3 is 4 marks)

4 Here is a bar chart showing the scores of five students in their Maths and English tests.



Write down three things wrong with this graph

- 1 There is no key
- 2 There is no label on the y axis
- 3 The scale is not consistent [16 to 18 is 2]

(Total for question 4 is 3 marks)

5 Elsa records the colours of the cars in the school car park. Here is the list of the colours of the 20 cars.

~~White~~ ~~White~~ ~~Black~~ ~~White~~ ~~Red~~
~~Black~~ ~~Red~~ ~~Blue~~ ~~White~~ ~~Blue~~
~~Black~~ ~~Blue~~ ~~Black~~ ~~Blue~~ ~~Black~~
~~Black~~ ~~Black~~ ~~Blue~~ ~~White~~ ~~Blue~~

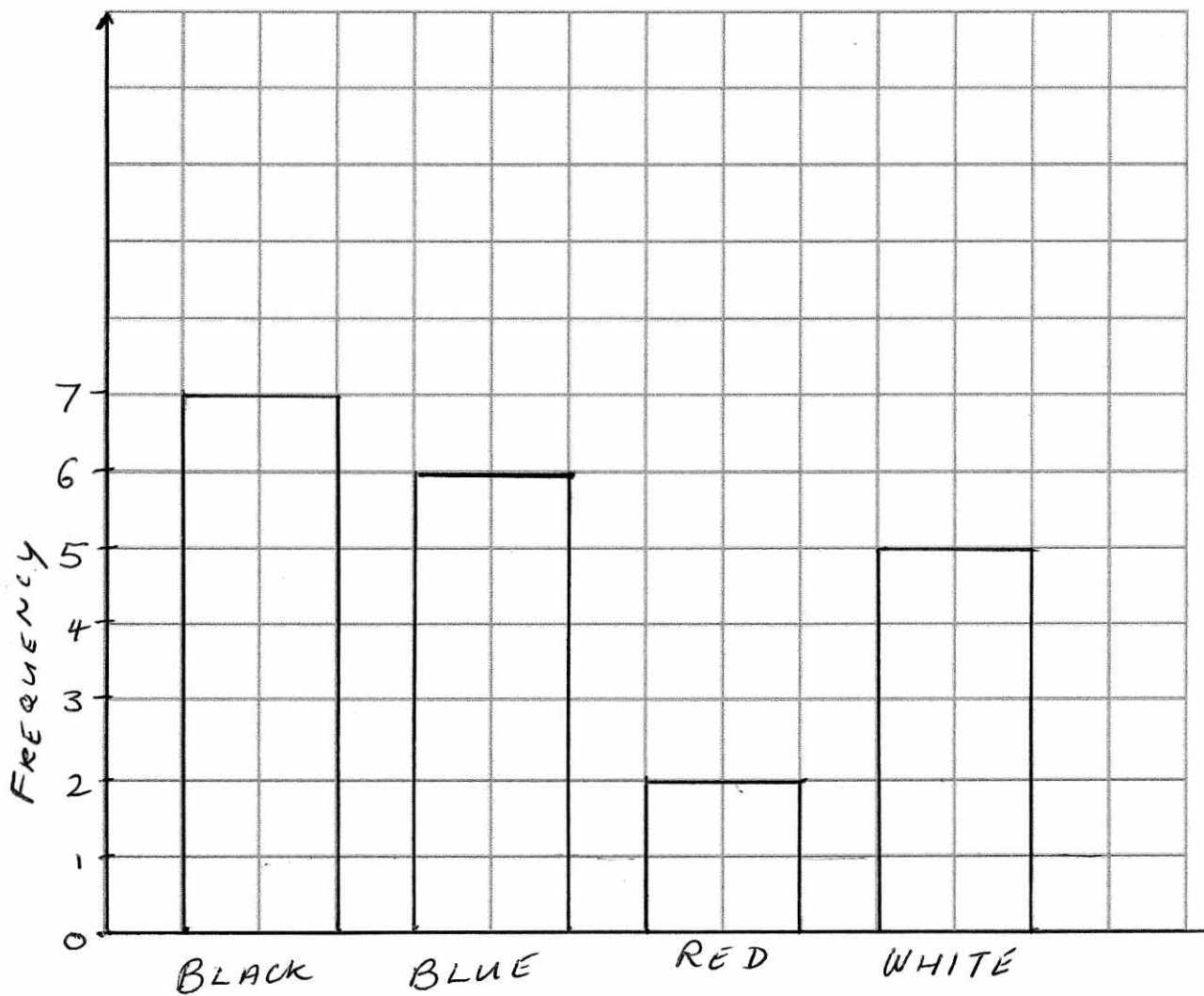
(a) Complete the table to show this information.

	Tally	Frequency
Black		7
Blue		6
Red		2
White		5

(2)

(b) Draw a bar chart for this information

(3)



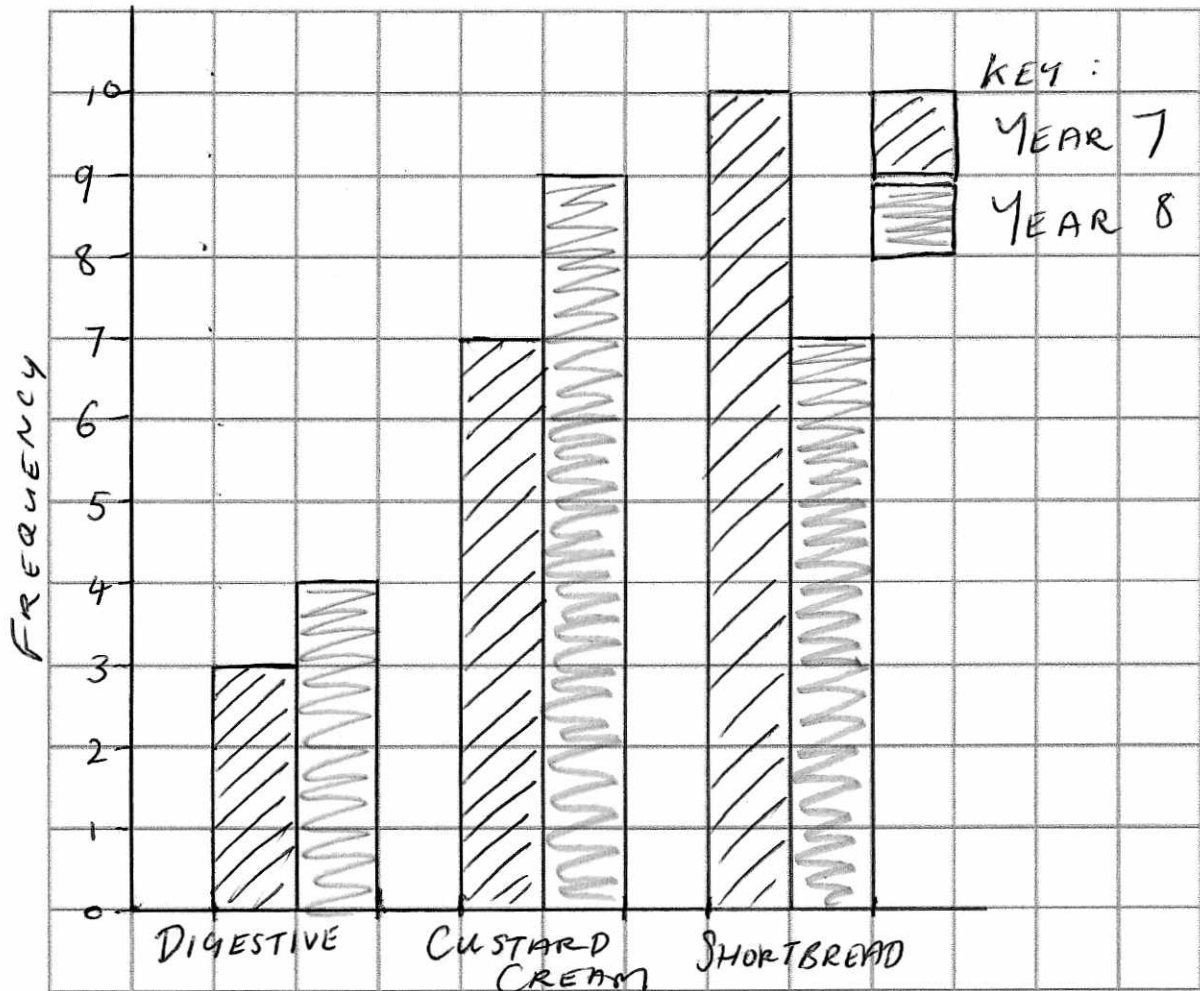
(Total for question 5 is 5 marks)

6 20 students in each of year 7 and year 8 were asked how about their favourite biscuits.

The table gives information about the results.

	Digestive	Custard Cream	Shortbread
Year 7	3	7	10
Year 8	4	9	7

Draw a suitable bar chart for this information.



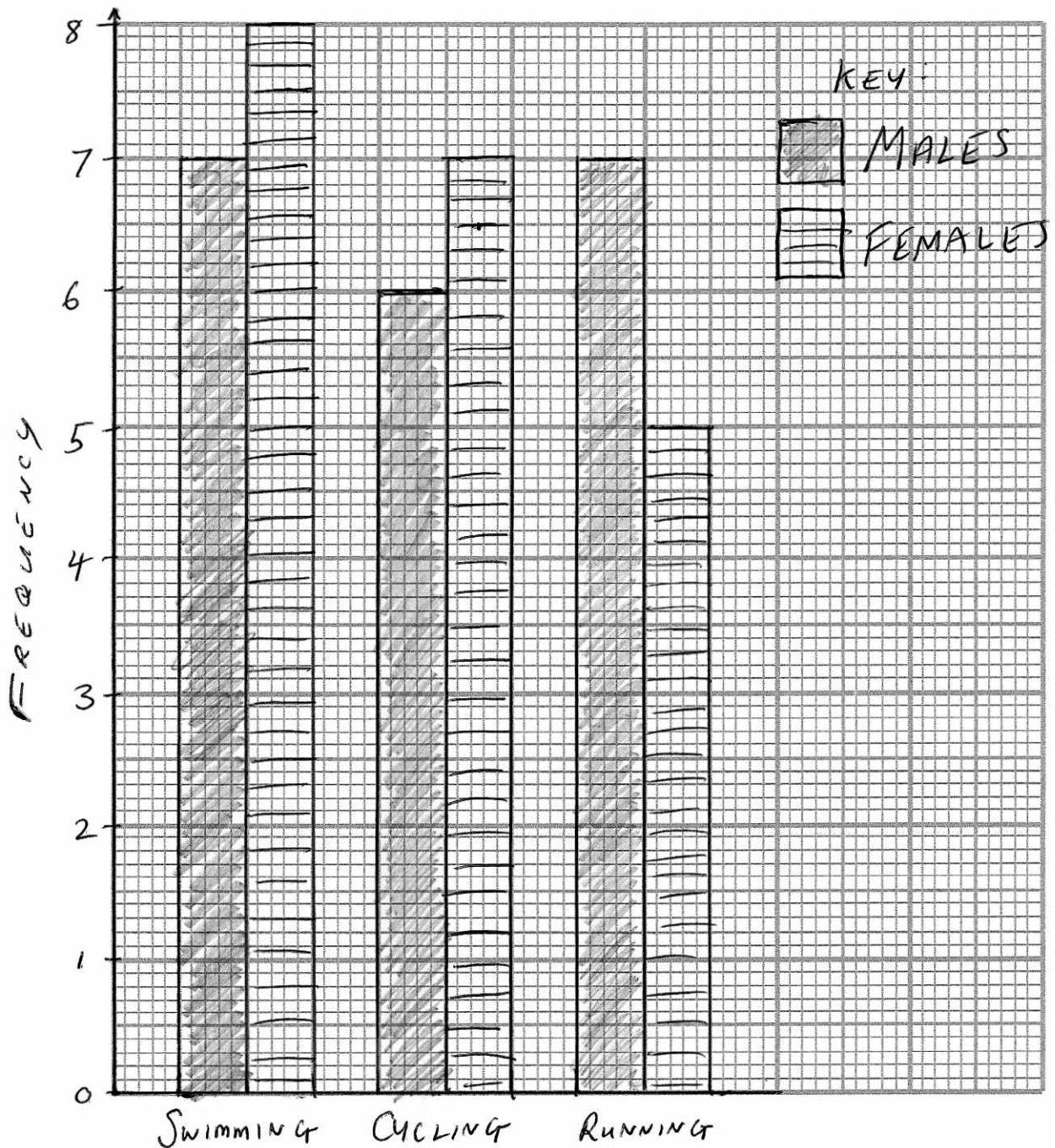
(Total for question 6 is 4 marks)

7 Some people were asked their favourite activity out of swimming, cycling and running.

The table shows the results for males and the results for females.

	Swimming	Cycling	Running
Males	7	6	7
Females	8	7	5

On the grid, draw a bar chart to show this information



(Total for question 7 is 5 marks)