GCSE FOUNDATION · REVISION MAT 1

Stem-and-leaf diagrams

1 The stem-and-leaf diagram shows some test scores.

1	2 5 7
2	0 3 3 8
3	1 4 6
4	1

Key: 1 | 2 means 12

(a) Find the median.

(b) Find the range.

2 Here are some times, in minutes.

34, 21, 45, 28, 39, 22, 47, 31, 26, 40

Draw an ordered stem-and-leaf diagram. Include a key.

3 The stem-and-leaf diagram shows some test scores.

1	2 5 7
2	0 3 3 8
3	1 4 6
4	1

Key: 1 | 2 means 12

Ben says the highest score is 1.

Explain why Ben is wrong.

4 The stem-and-leaf diagram shows some test scores.

1	2 5 7
2	0 3 3 8
3	1 4 6
4	1

Key: 1 | 2 means 12

Show that the mode is 23.

5 The diagram shows the scores of group A.

1	2 5 7
2	0 3 3 8
3	1 4 6
4	1

Key: 1 | 2 means 12

Group B has a median of 27 and a range of 20.

Compare the two groups.

6 The stem-and-leaf diagram shows some test scores.

1	2 5 7
2	0 3 3 8
3	1 4 6
4	1

Key: 1 | 2 means 12

What percentage of the scores are more than 30? Give your answer to the nearest whole number.

Mr&Mrs MATHS

ANSWERS · REVISION MAT 1

Stem-and-leaf diagrams

1 (a) 11 values, middle is value 6: **23**

(b) 41 − 12 = **29**

2

2	1 2 6 8
3	1 4 9
4	0 5 7

Key: 2 | 1 means 21

3 Ben has read only the leaf. The stem gives the tens.

Highest score = **41**

4 **23** appears twice; every other value appears once ✓

5 Group A: median 23, range 29

Group **B** has the higher median, so did better on average.
Group **B** has the smaller range, so is more consistent.

6 4 out of 11

4 ÷ 11 × 100 = **36%**