GCSE FOUNDATION · REVISION MAT 2

Stem-and-leaf diagrams

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

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

Key: 0 | 8 means 8

(a) Find the median.

(b) Find the range.

2 Here are some times, in minutes.

17, 32, 25, 19, 38, 24, 41, 29, 33, 16

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

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

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

Key: 0 | 8 means 8

Cara says the highest score is 5.

Explain why Cara is wrong.

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

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

Key: 0 | 8 means 8

Show that the mode is 16.

5 The diagram shows the scores of group A.

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

Key: 0 | 8 means 8

Group B has a median of 30 and a range of 28.

Compare the two groups.

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

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

Key: 0 | 8 means 8

What percentage of the scores are more than 25? Give your answer to the nearest whole number.

Mr&Mrs MATHS

1 (a) 13 values, middle is value 7: **27**

(b) 45 – 8 = **37**

2

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

Key: 1 | 6 means 16

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

Highest score = **45**

ANSWERS · REVISION MAT 2

Stem-and-leaf diagrams

4 **16** appears twice; every other value appears once ✓

5 Group A: median 27, range 37

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

6 7 out of 13

7 ÷ 13 × 100 = **54%**