1.10 Fractions: Multiplying and Dividing: 1-hour Pack

Calculators not allowed · about 60 minutes

Name: _____ Date: ____ / ____ / _____

Answer ALL questions. Show all your working.

1 Work out 4/9 of 54.

(2)

2 4/9 of the sweets in a jar is 48. How many are there altogether?

(3)

3 Work out 4/7 ÷ 1/12.
Give your answer in its simplest form.

(2)

4 Work out 5/9 x 1/4.
Give your answer in its simplest form.

(2)

© Revision Library | revisionlibrary.co.uk

5 Work out 11/12 ÷ 1/4.
Give your answer in its simplest form.

(2)

---

6 Work out 2 1/2 x 2 1/5.
Give your answer as a mixed number or fraction in its simplest form.

(3)

---

7 Work out 4/7 of £84.

(2)

---

8 Work out 3/7 ÷ 1/7.
Give your answer in its simplest form.

(2)

---

9 Work out 4 1/3 x 1 1/6.
Give your answer as a mixed number or fraction in its simplest form.

(3)

© Revision Library | revisionlibrary.co.uk

10 Work out 4 3/4 ÷ 3 1/2.
Give your answer as a mixed number or fraction in its simplest form.

(3)

---

11 Work out 3/4 of 48.

(2)

---

12 Work out 3/7 of £21.

(2)

---

13 Work out 1 1/3 × 3/2. Show your method.

(2)

---

14 Work out 2/11 x 2/3.
Give your answer in its simplest form.

(2)

© Revision Library | revisionlibrary.co.uk

15 Work out 4 2/3 ÷ 1 5/6.
Give your answer as a mixed number or fraction in its simplest form.

(3)

---

16 Work out 3/7 of £84.

(2)

---

17 2/5 of the tickets sold is 24. How many are there altogether?

(3)

---

18 Work out 3/10 of £140.

(2)

---

19 30 out of 60 pupils walk to school. What fraction is this? Give your answer in its simplest form.

(2)

© Revision Library | revisionlibrary.co.uk

20 Calculate 3/4 ÷ 1/2. Give your answer as a fraction and as a mixed number if appropriate.

(2)

---

21 Calculate 1/3 x 1/5.

(1)

© Revision Library | revisionlibrary.co.uk

Mark scheme · 1.10 Fractions: Multiplying and Dividing: 1-hour Pack

A correct answer earns full marks unless the question asks for working, a method, proof or explanation.

Question 1

54 ÷ 9 = 6 or 54 x 4 = 216	M1
24 cao	A1

Answer: **24**

Question 2

48 ÷ 4 = 12 (the value of one part)	M1
12 x 9	M1
108 cao	A1

Answer: **108**

Question 3

multiplies by the reciprocal: 4/7 x 12	M1
6 6/7 or 48/7 cao	A1

Answer: **6 6/7**

Question 4

5/36 or cancelling before multiplying	M1
5/36 cao	A1

Answer: **5/36**

Question 5

multiplies by the reciprocal: 11/12 x 4	M1
3 2/3 or 11/3 cao	A1

Answer: **3 2/3**

Question 6

both written as improper fractions: 2 1/2 = 5/2 and 2 1/5 = 11/5	M1
multiplies (or multiplies by the reciprocal when dividing)	M1
5 1/2 or 11/2 cao	A1

Answer: **5 1/2**

Question 7

£84 ÷ 7 = £12 or £84 x 4 = £336	M1
£48 cao	A1

Answer: **£48**

Question 8

multiplies by the reciprocal: 3/7 x 7	M1
3 cao	A1

Answer: **3**

Question 9

both written as improper fractions: 4 1/3 = 13/3 and 1 1/6 = 7/6	M1
multiplies (or multiplies by the reciprocal when dividing)	M1
5 1/18 or 91/18 cao	A1

Answer: **5 1/18**

Question 10

both written as improper fractions: 4 3/4 = 19/4 and 3 1/2 = 7/2	M1
multiplies (or multiplies by the reciprocal when dividing)	M1
1 5/14 or 19/14 cao	A1

Answer: **1 5/14**

Question 11

48 ÷ 4 = 12 or 48 x 3 = 144	M1
36 cao	A1

Answer: **36**

Question 12

£21 ÷ 7 = £3 or £21 x 3 = £63	M1
£9 cao	A1

Answer: **£9**

Question 13

convert mixed number to improper fraction and multiply: 4/3 × 3/2 or equivalent method	M1
2 cao	A1

Answer: **2**

Question 14

4/33 or cancelling before multiplying	M1
4/33 cao	A1

Answer: **4/33**

Question 15

both written as improper fractions: 4 2/3 = 14/3 and 1 5/6 = 11/6	M1
multiplies (or multiplies by the reciprocal when dividing)	M1
2 6/11 or 28/11 cao	A1

Answer: **2 6/11**

Question 16

£84 ÷ 7 = £12 or £84 x 3 = £252	M1
£36 cao	A1

Answer: **£36**

Question 17

24 ÷ 2 = 12 (the value of one part)	M1
12 x 5	M1
60 cao	A1

Answer: **60**

© Revision Library | revisionlibrary.co.uk

Question 18

£140 ÷ 10 = £14 or £140 x 3 = £420	**M1**
£42 cao	**A1**

Answer: **£42**

Question 19

30/60 seen	**M1**
1/2 cao	**A1**

Answer: **1/2**

Question 20

use reciprocal: 3/4 × 2/1 or equivalent	**M1**
3/2 or 1 1/2 cao	**A1**

Answer: **3/2 = 1 1/2**

Question 21

1/15 cao	**B1**

Answer: **1/15**

© Revision Library | revisionlibrary.co.uk