

Proportion - Recipes and the Unitary Method

For Pearson Edexcel GCSE Mathematics (1MA1) • Foundation tier

Name _____

Total marks: **20**

Answer **all** questions in the spaces provided. Show your working: marks are given for correct method.

- 1** Here is a list of ingredients for making 6 portions of tomato sauce.

Tomato sauce (6 portions)

tomatoes	800 g
onions	2
olive oil	30 ml
garlic	4 cloves

Carys wants to make 9 portions of tomato sauce.

Work out how much of each ingredient she needs.

tomatoes g

onions

olive oil ml

garlic cloves

(3)

(Total for Question 1 is 3 marks)

2 Tomasz wants to make some muffins using this recipe.

Makes 8 muffins

flour	200 g
milk	150 ml
blueberries	120 g

Tomasz has 750 g of flour, 500 ml of milk and 450 g of blueberries.

He says,

‘I have enough ingredients to make 28 muffins.’

Is Tomasz correct?

You must show how you get your answer.

(3)

(Total for Question 2 is 3 marks)

- 3** Here is a list of ingredients for making 4 pizza bases.

Ingredients for 4 pizza bases

bread flour	600 g
water	360 ml
olive oil	20 ml
dried yeast	8 g

Gwen has 2 kg of bread flour, 1.5 litres of water, 75 ml of olive oil and 28 g of dried yeast.

Work out the greatest number of pizza bases Gwen can make.

.....
(4)

(Total for Question 3 is 4 marks)

- 4** A recipe for 8 bowls of porridge uses 360 g of oats.
Work out how much oats is needed to make 14 bowls of porridge.

..... g
(2)

(Total for Question 4 is 2 marks)

- 5** 8 cinema tickets cost £68
Work out the cost of 5 of these tickets.

£
(2)

(Total for Question 5 is 2 marks)

- 6** Tom is paid £93.60 for 8 hours of work.
How much is he paid for 13 hours of work at the same rate?

£
(2)

(Total for Question 6 is 2 marks)

- 7** Kerry drives 588 kilometres.
Her car uses 4.8 litres of petrol for every 100 kilometres.
Petrol costs £1.46 per litre.

(a) Work out an estimate for the cost of the petrol Kerry uses on this journey.

£
(3)

(b) Is your answer to part (a) an underestimate or an overestimate?
Give a reason for your answer.

.....
.....
(1)

(Total for Question 7 is 4 marks)

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