Lancashire Curriculum Tests

Year 3 – End of Summer Term

(Meeting end of year expectations)

Mathematics

Paper 2: reasoning

First name	
Middle name	
Last name	

Total marks	

Lancashire County Council

Instructions

You **may not** use a calculator to answer any questions in this test.

Questions and answers

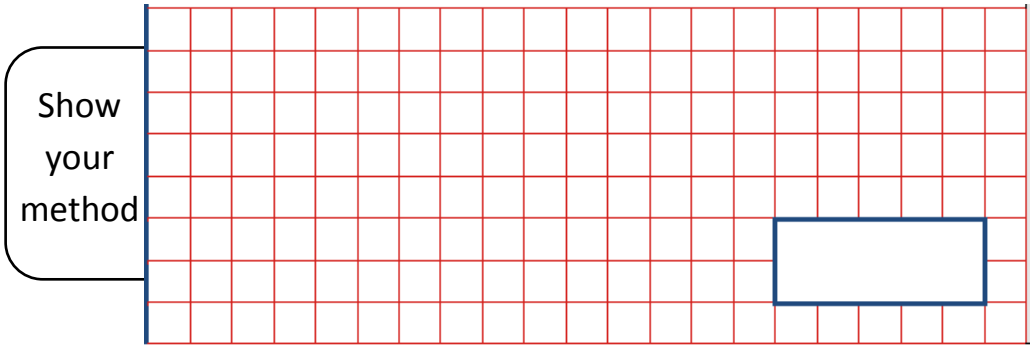
You have approximately **40 minutes** to complete this test.

Follow the instructions for each question.

Work as quickly and as carefully as you can.

If you need to do any working out, you can use the space around the question.

Some question have a method box like this:



For these questions, you may get a mark for showing your method.

If you cannot do one of the questions, **go on to the next one**.
You can come back to it later if you have time.

If you finish before the end, **go back and check your work**.

Marks

The number under each line at the side of the page tells you the maximum number of marks available for each question.

1 Write these numbers in order of value, starting with the **smallest**.

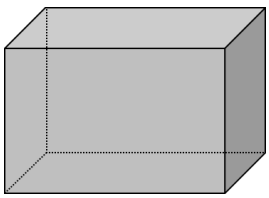
One is done for you.

543 ~~345~~ 534 435 453

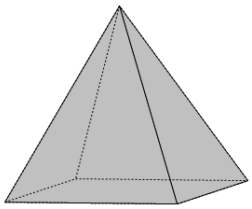
345				
smallest				

1 mark

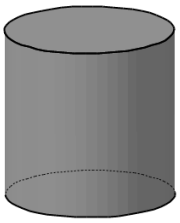
2 Look at these 3-D shapes.



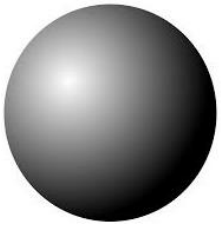
A



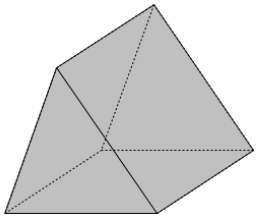
B



C



D



E

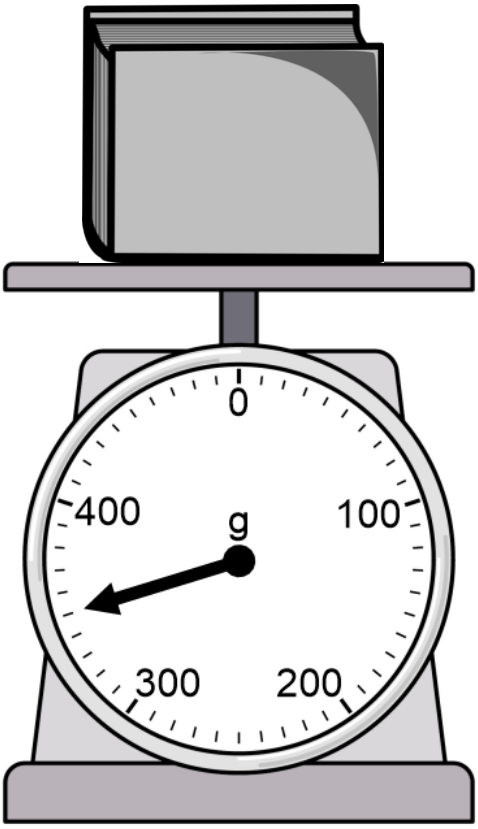
Write the **letter** of the shape that has:

9 edges ☐

5 vertices ☐

1 mark

3 What is the **mass** of this book?

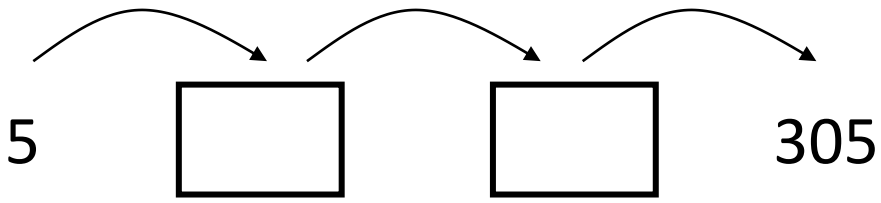


g

1 mark

4 The numbers in this sequence increase by the same amount each time.

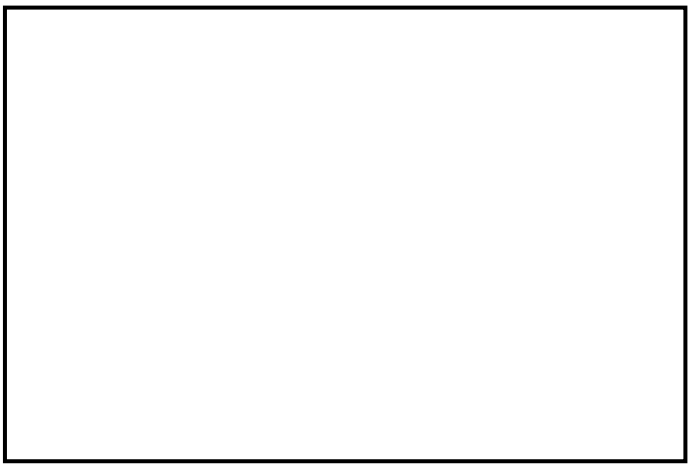
Write the two missing numbers.



1 mark

5 What is the perimeter of this oblong?

Use a ruler.



cm

1 mark

6 This glass contains 200ml of milk.

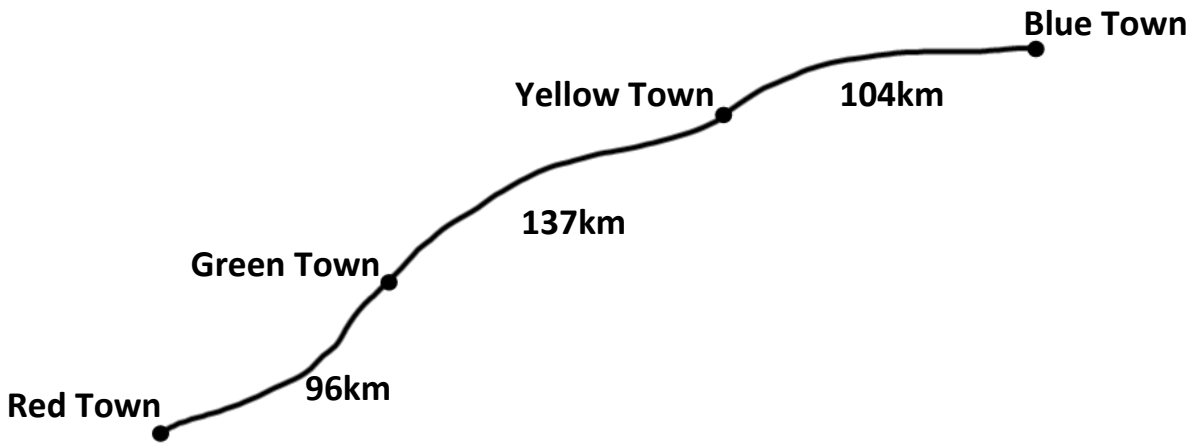
Sara drinks 95ml of milk from the glass.

How much milk is **left** in the glass?

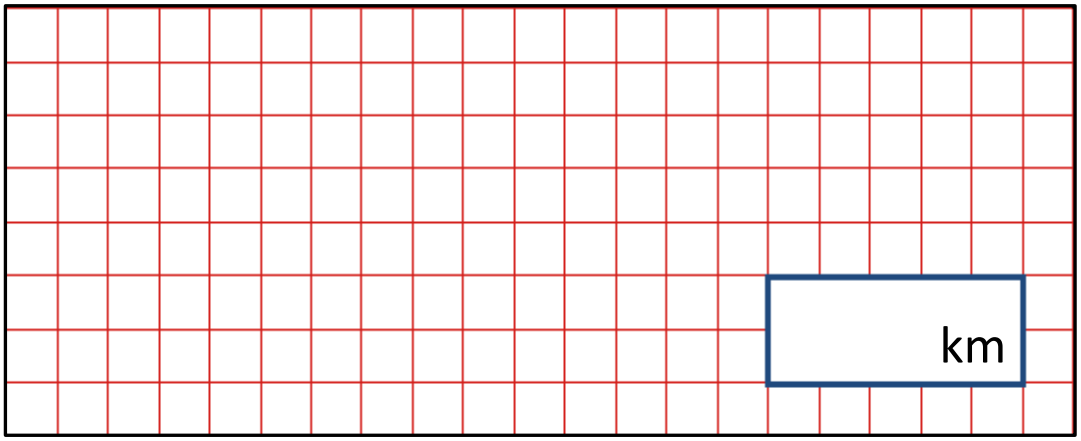
ml

1 mark

7 This diagram shows distances between different towns.

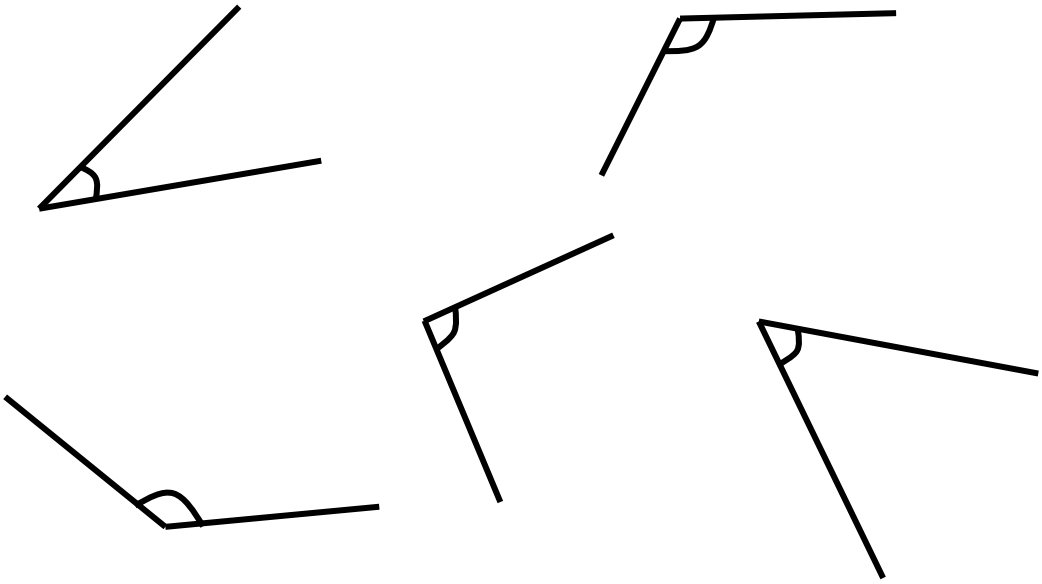


How many kilometres is it altogether from **Red Town** to **Blue Town**?



1 mark

8 Look at these angles.



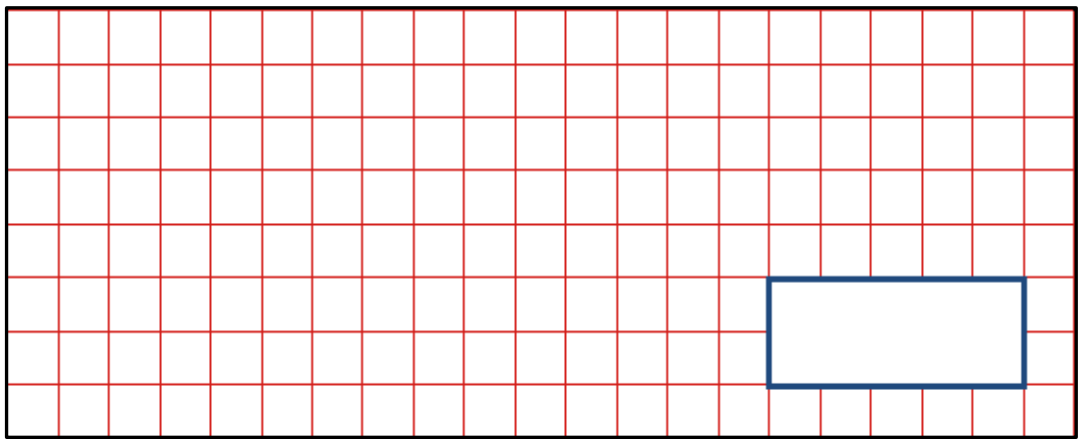
Tick **all** the angles that are **less** than a right angle.

1 mark

9 Ben thinks of a number.

He multiplies the number by 3 and the answer is 72.

What number is Ben thinking of?



1 mark

10 Look at this number line.

Write the number that the arrow is pointing to as a **fraction** and as a **decimal**.

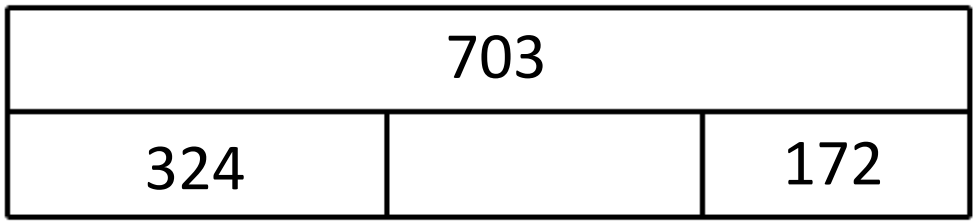
fraction ☐ ☐

1 mark

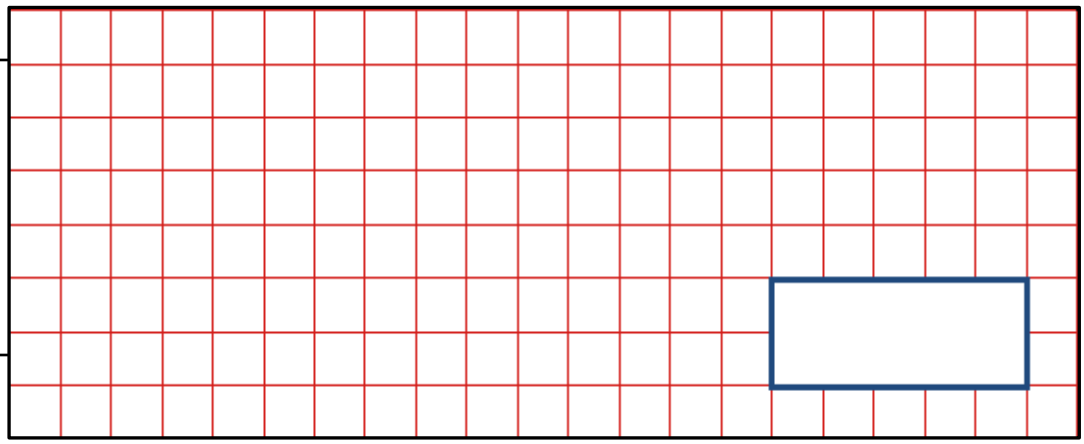
decimal ☐ ☐

1 mark

11 Calculate the missing number in the following bar model.



Show your method



☐

2 marks

12 Ben is baking a cake. He puts the cake into the oven at **9:40am**.

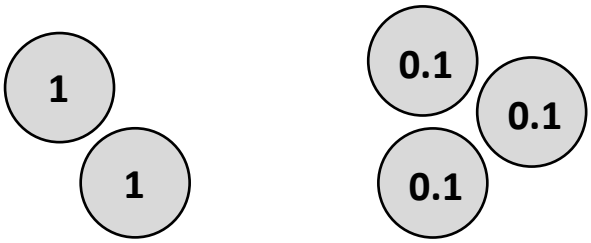
It needs to bake for **35 minutes**.

At what time does Ben need to take the cake out of the oven?

am

1 mark

13 Lin has made a number using place value counters.

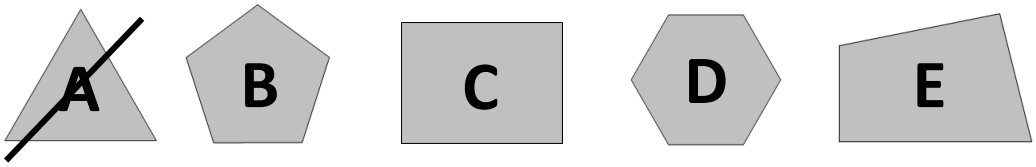


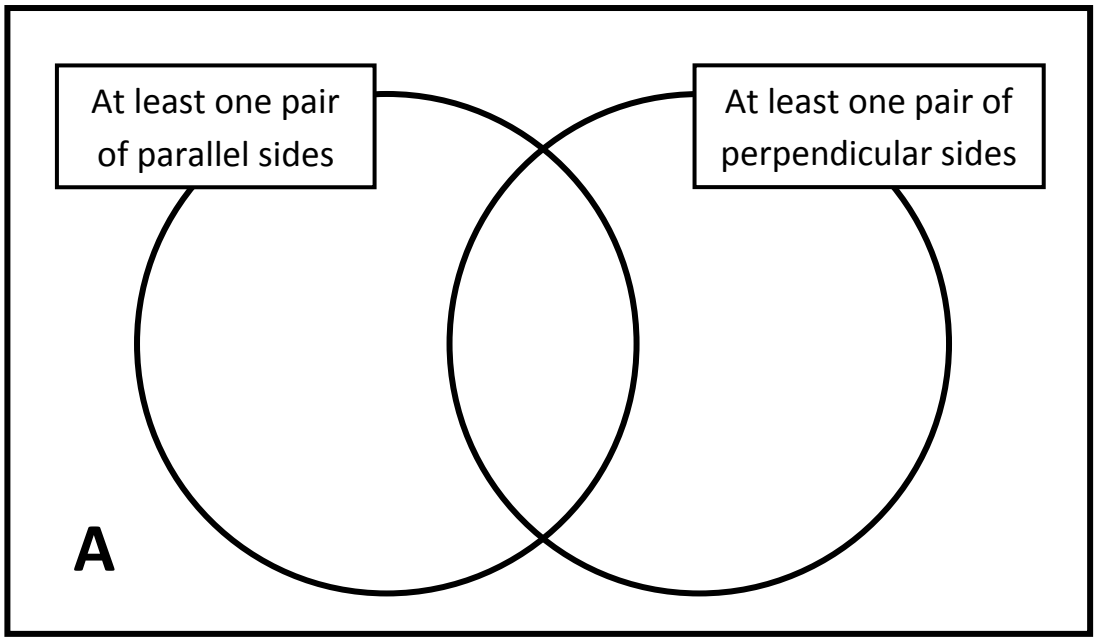
What is the number that Lin has made?

1 mark

14 Write the letter of each 2-D shape in the correct place on the diagram.

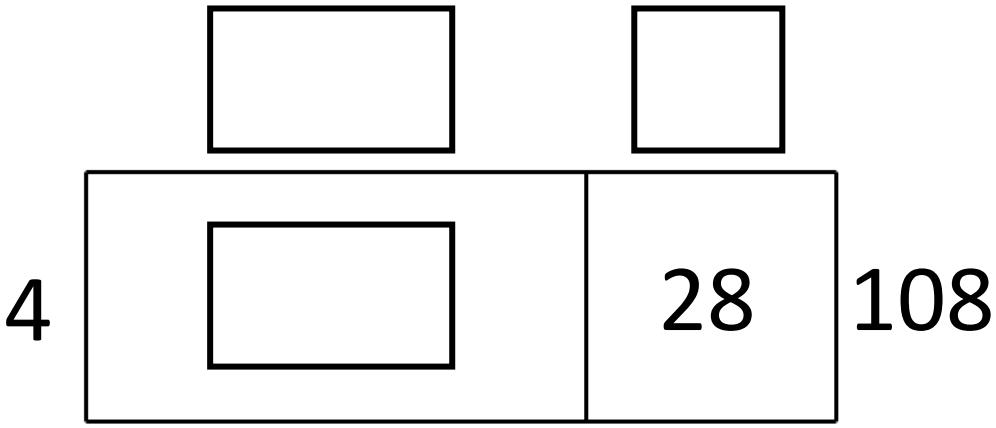
One has been done for you.





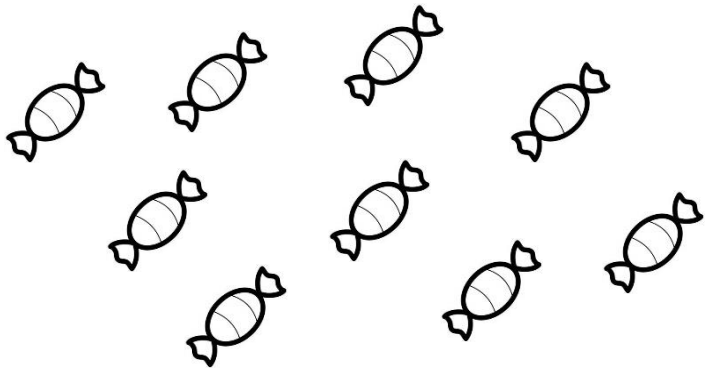
2 marks

15 Write the missing numbers in the following multiplication.



2 marks

16 Sara has nine sweets.



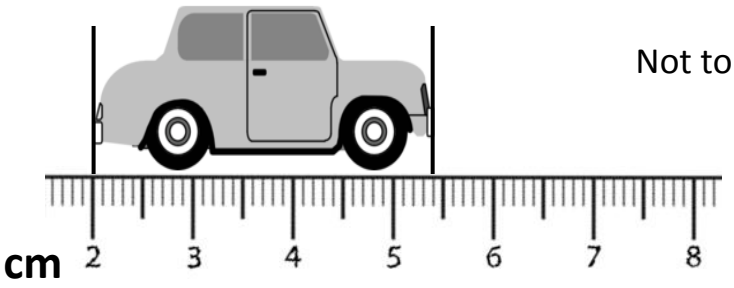
She eats three sweets and gives two sweets to her friend.

What **fraction** of the sweets does Sara **have left**?

1 mark

17 What is the length of the toy car in **millimetres**?

Do not use a ruler.



Not to scale

mm

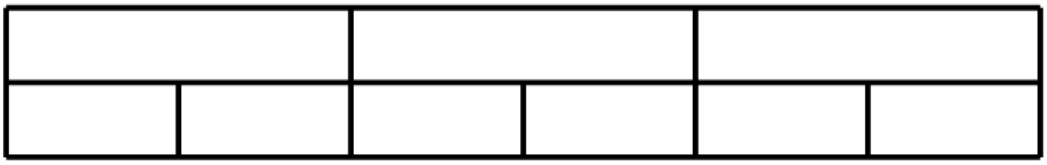
1 mark

18 Write the missing digits in this **addition**.

$$\begin{array}{r} \square\ 3\ 4 \\ +\ 2\ \square\ 8 \\ \hline 3\ 7\ 2 \\ \hline \end{array}$$

2 marks

19 Here is part of a fraction wall.



Use the fraction wall to identify the missing numbers in the following **equivalent fractions**.

$$\frac{\square}{3} = \frac{4}{\square}$$

$\square$

1 mark

20 Lin wants to make these scales balance using 100g and 10g masses.

How many 100g and 10g masses does Lin need to make the scales **balance**?

100g masses

1 mark

10g masses

1 mark

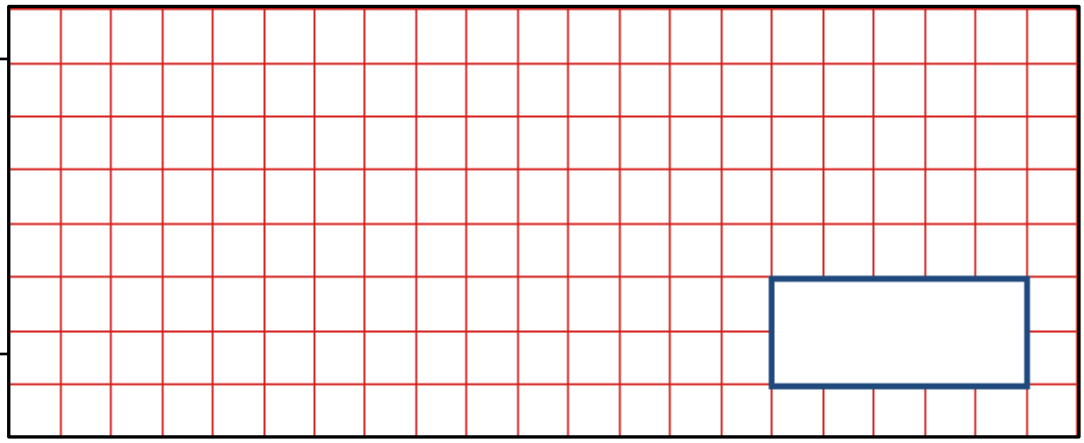
21 Here is part of a menu from a café.

Tea	£1.80	Toast	£1.50
Coffee	£2.10	Biscuit	60p
Juice	£1.20	Muffin	80p

Sara buys a tea and a muffin. She pays with a £5 note.

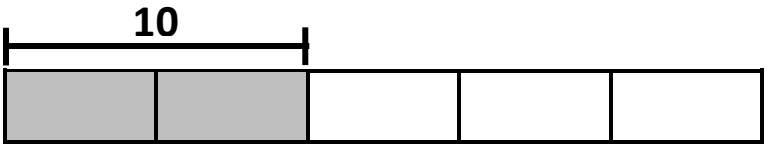
How much **change** does Sara get?

Show your method



2 marks

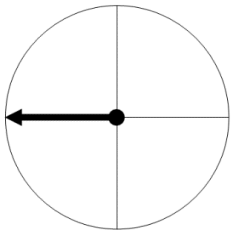
22 Identify the missing number in the following calculation.



$$\frac{2}{5} \text{ of } \square = 10$$

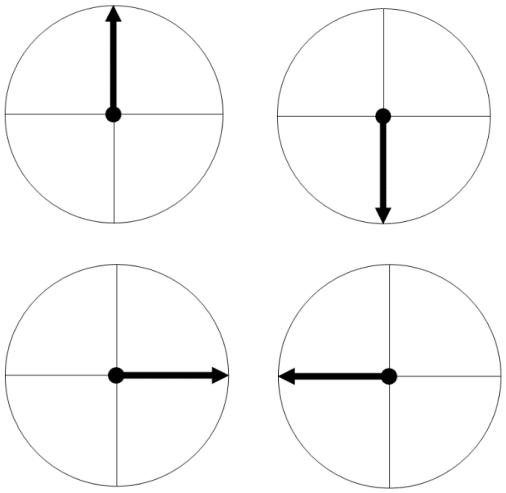
1 mark

23 Here is a picture with an arrow.



Ben turns the arrow **three right angles clockwise**.

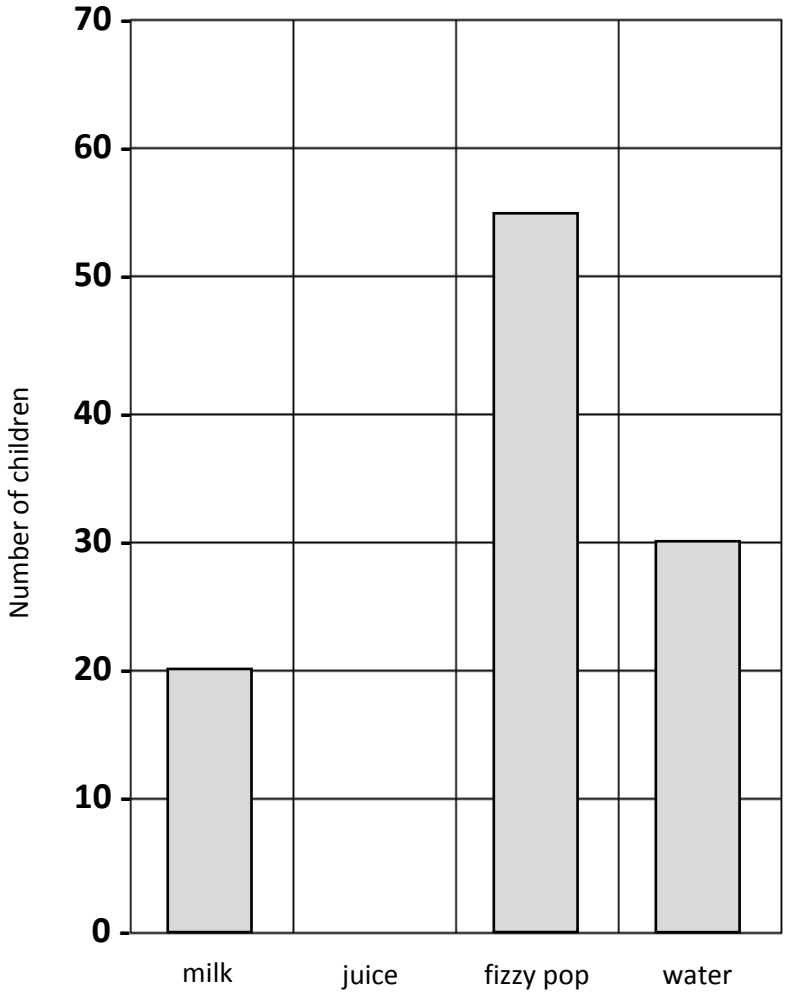
Tick the picture that shows the new position of the arrow.



1 mark

24 Lin asked **150 children** what their favourite drink was.

She put the information into the following graph.



The bar that represents juice is missing.

How many children chose **juice** as their favourite drink?

Show your method

2 marks

25 Lin has 5 red marbles, 2 blue marbles and 1 green marble.

Lin says, '**One quarter** of the marbles are blue.'

Lin is **correct**.

Explain how you know.

1 mark

END OF TEST