

National curriculum tests

Key Stage 2

Mathematics

Practice Paper 3-2: reasoning

First name						
Middle name						
Last name						
Date of birth	Day		Month		Year	
School name						
DfE number						

Time: 40 minutes.
No calculators allowed.
35 marks



Instructions

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

Questions and answers

You have **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 working out, you can use the space around the question.

Do not write over any barcodes.

Some questions have a method box like this:

Show your Method

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

If you cannot do a question, **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 box at the side of the page tells you the maximum number of marks for each question.

1 Look at the table showing factors.

Write one number in each box

One is done for you.

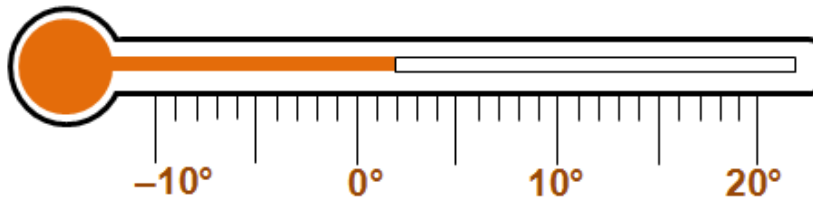
	factor of 36	not a factor of 36
factor of 24	12	
not a factor of 24		



2 marks

Ref: 5C5a

2 The thermometer shows the temperature on Tuesday.



The temperature on Monday is 5°C **colder** than Tuesday.
The temperature on Friday is 5°C **hotter** than Tuesday.

Write the temperature for Monday and Friday

Monday is °C

1 mark

Friday is °C

1 mark

Ref: 5N5

3

Look at this number :

21,304

Draw beads on the abacus to make the number



1 mark

Look at this number :

1.02345

Write the digit that is in the one thousandth place



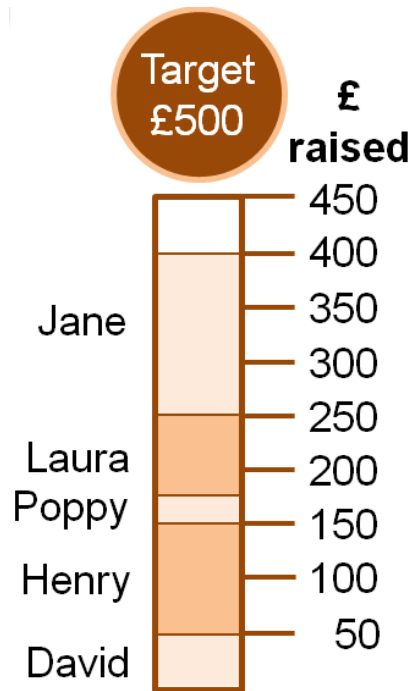
1 mark

Ref: 5N3a, 5F6b

4

Some people raised money for Children in Need.

This chart shows how much each person raised.



Write the names of the people who raised more than £60

1 mark

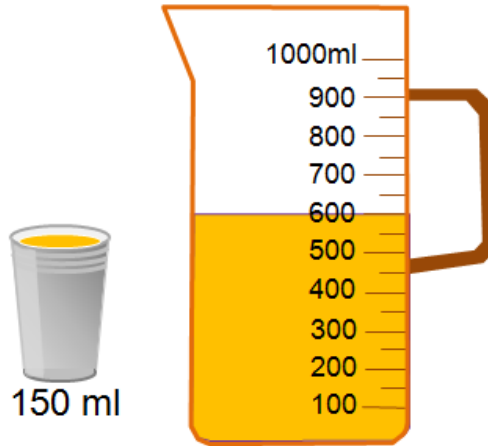
How much did Poppy and Laura raise **altogether**

£

1 mark

Ref: 4S1

5 Henry added the cup of juice to the jug.



What is the new level of juice in the jug

ml



1 mark

Ref: 3M9

6 Here are six cards

$\times 10$

$\times 100$

$\times 1000$

$\div 10$

$\div 100$

$\div 1000$

Use a card to complete each calculation

$$123.4 \quad \boxed{} = 123400$$

$$123.4 \quad \boxed{} = 0.1234$$

$$123.4 \quad \boxed{} = 12.34$$


2 marks

Ref: 5C6b

7

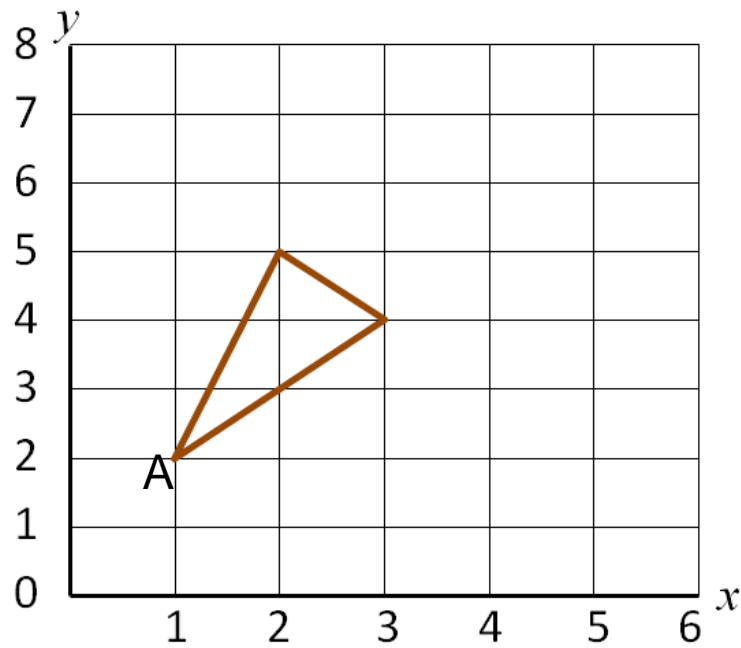
Write the number 98, 754 in words


1 mark

Ref: 5M2

8

Translate this shape 3 units up and 2 units right



What are the co-ordinates of A *after* the translation?

2 mark

Ref: 6P2

12

Write the missing digits to make this **addition** correct.

$$\begin{array}{r} \boxed{1} \boxed{2} \boxed{3} \boxed{4} \\ + \quad \boxed{8} \boxed{7} \boxed{5} \\ \hline \boxed{2} \boxed{1} \boxed{0} \boxed{9} \end{array}$$

1 mark

Write the missing digits to make this **subtraction** correct.

$$\begin{array}{r} \boxed{1} \boxed{4} \boxed{6} \boxed{7} \\ - \quad \boxed{9} \boxed{7} \boxed{5} \\ \hline \boxed{4} \boxed{9} \boxed{2} \end{array}$$

1 mark

Ref: 4C2

- 13** Coventry is 7.86 km west of Poppy's house.
Nuneaton is 5.69 km east of Poppy's house.

C ← P → N

How far apart are Coventry and Nuneaton?

km



1 mark

Ref: 5F10

14 Look at the fraction cards.

$$\frac{2}{3}$$

$$\frac{5}{6}$$

$$\frac{7}{9}$$

$$\frac{9}{12}$$

Use any **three** of the cards to make this correct

$$\square < \square < \square$$



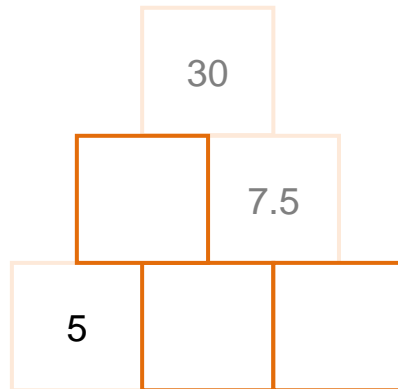
1 mark

Ref: 5F3

15 Look at the number pyramid

The number in a box is the product of the two numbers below it.

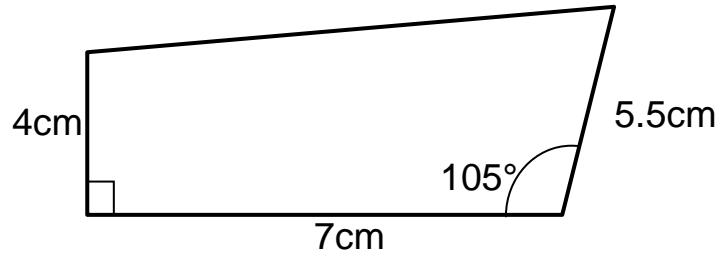
Write the missing numbers



2 marks

Ref: 6F9

16 Here is quadrilateral, not drawn to scale.



Draw the quadrilateral accurately below. Use a protractor and ruler.

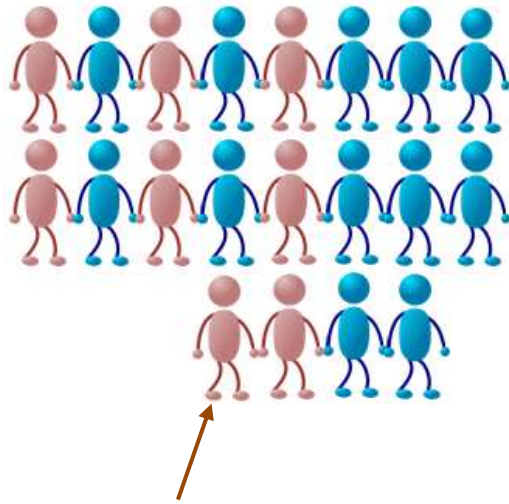


1 mark

Ref: 6G3a

17

There are 20 children in a class.



Girls are shown as pink.

What percentage of girls are there in the class

 %

1 mark

Ref: 5F12

