

KS2 MATHEMATICS ASSESSMENTS

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There are 3 papers over the week

- 1. Paper 1 Arithmetic
- 2. Paper 2 Reasoning
- 3. Paper 3 Reasoning

They will be tested on these over the week set in May: WC 11th May. They have not released the specific dates for the tests as of yet.

Arithmetic paper 1

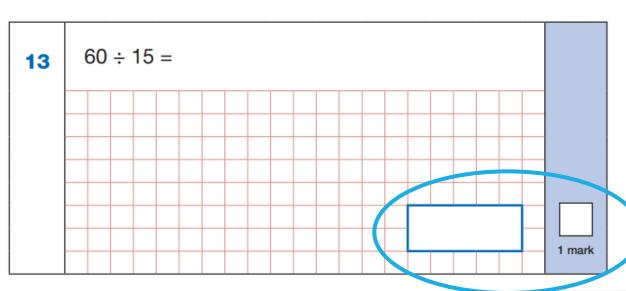
This test is timed- 30 minutes long

There will be 36 questions set for paper 1 with a total of 40 marks available.

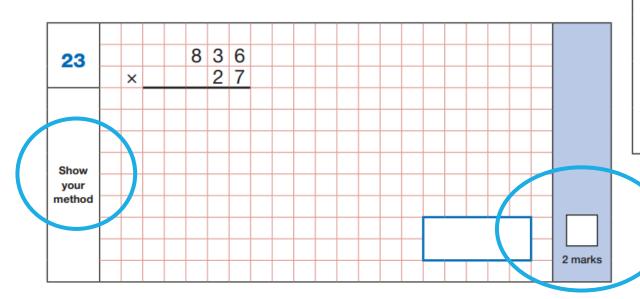
These will all be based around number, rather than word/reasoning problems- these will require a specific number answer.

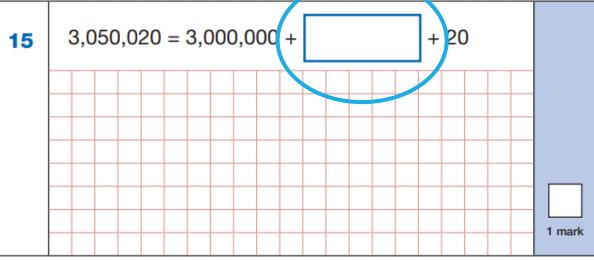
The paper will cover the 4 number operations, including calculations on fractions, decimals and percentages. The paper will also cover long multiplication and division.

There will be space for working out. Sometimes a blank box, other questions will have squared paper. It is important your child shows their working, there are extra marks available for this.



Paper 1 examples





Reasoning paper 2 and 3

This is a timed test- both tests are 40 minutes long.

Paper 2 and 3 have a total of 35 marks. There will be a range from 1 mark to 3 mark questions. It is important children show their thinking/working out to gain extra marks if the answer they write is incorrect.

The questions on these papers will be based on the whole KS2 Maths curriculum including: number, shape, measure, statistics and fractions.

There will be multiple choice, true and false questions, questions which as children to draw or complete and trial and error questions.

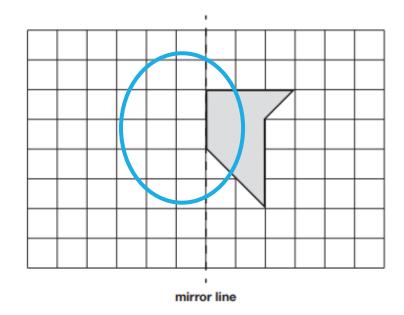
There is space for the children to work out and the children are awarded marks for methods they use, even if their answer is incorrect.

Paper 2 and 3 examples

1 Here is a shape on a grid.

Complete the design so that it is symmetrical about the mirror line.

Use a ruler.

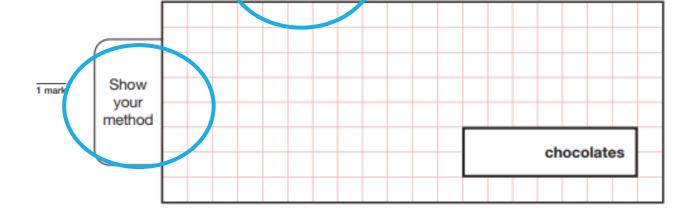


Each large box has 48 chocolates. Each small box has 24 chocolates.

Large
48
chocolates

Small
24
chocolates

How many chocolates did Ken buy altogether?



2 marks

The list below shows the years in which the Cricket World Cup was held since 1992:

1992, 1996, 1999, 2003, 2007, 2011, 2015

Adam says,

The Cricket World Cup has been held every four years since 1992. Adam is not correct. Explain how you know.

10

1 mark







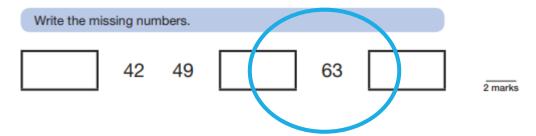
Write the correct symbol in each box to make the statements correct.

$$11 \times 12$$
 15×10
 $90 \div 30$
 $60 \div 20$
 $120 \div 4$
 $160 \div 8$
 30×8
 100×10

2 marks

Paper 2 and 3 examples

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

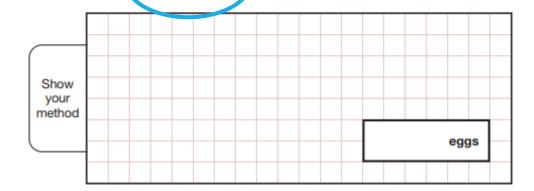


In March, Ken collects 2, 3 or 4 eggs each day from his hens.

In the first 20 days, Ken collects 57 eggs altogether.

There are 31 days in March.

What is the **greatest** number of eggs Ken can collect in March?



A box contains 2.6 kg of washing powder.

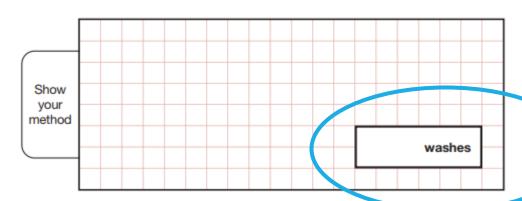


Jack uses 65 grams of powder for each wash.

He uses all the powder.

2 marks

How many washes did Jack do?



2 marks

These Frameworks set out the standards a pupil will be assessed against in maths.

Working at the expected standard

 The pupil can demonstrate an understanding of place value, including large numbers (e.g. what is the value of the '7' in 276,541?;

find the difference between the largest and smallest whole numbers that can be

28.13 = 28 + + + 0.03).

- The pupil can calculate mentally, using efficient strategies such as manipulating expressions using commutative and distributive properties to simplify the calculation $20 \times 7 \times 5 = 20 \times 5 \times 7 = 100 \times 7 = 700;$

$$20 \times 7 \times 5 = 20 \times 5 \times 7 = 100 \times 7 = 700;$$

 $53 \div 7 + 3 \div 7 = (53 + 3) \div 7 = 56 \div 7 = 8).$
pupil can use formal as at

The pupil can use formal methods to solve multi-step problems

(e.g. find the change from £20 for three items that cost £1.24, £7.92 and £2.55;

a roll of material is 6m long: how much is left when 5 pieces of 1.15m are cut

a bottle of drink is 1.5 litres, how many cups of 175ml can be filled from the bottle,

- The pupil can recognise the relationship between fractions, decimals and percentages
 - (e.g. one piece of cake that has been cut into 5 equal slices can be expressed as $\frac{1}{5}$ or 0.2
- The pupil can calculate using fractions, decimals or percentages (e.g. knowing that 7 divided by 21 is the same as $\frac{7}{21}$ and that this is equal to $\frac{1}{3}$.

0.8 x 70).

- The pupil can substitute values into a simple formula to solve problems (e.g. perimeter of a rectangle or area of a triangle).
- The pupil can calculate with measures

(e.g. calculate length of a bus journey given start and end times; convert 0.05km

- The pupil can use mathematical reasoning to find missing angles
 - (e.g. the missing angle in an isosceles triangle when one of the angles is given; the missing angle in a more complex diagram using knowledge about angles at a point and vertically opposite angles).

2016 national curriculum assessments

Scaled scores

- The tests at the end of KS2 will report in the form of a scaled score in their end of year school reports.
- The 'expected standard' will always be set at a scaled score of 100.
- Raw scores in the test will be converted into scaled scores.
- The 'raw score' that equates to 100 might be different each year.
- Pupils who score a scaled score of 100 or more will have met the 'expected standard'.
- Pupils who score below 100 will not have met the 'expected standard'.

How can you help?

- Support with mental maths and recall of facts- including times tables
- Times table rockstars app practice at home
- Revision booklets (post 2014 curriculum)
- Completing the Termly PIXL homework packs- usually come out at Christmas and Easter
- Practise explaining answers/methods in full sentences and writing these down (reasoning).
- Make sure your child gets lots of brain breaks and fresh air too.