÷ × + −

Maths

At

Buckstones

Year 2

A Guide to Year 2 Expectations in Maths

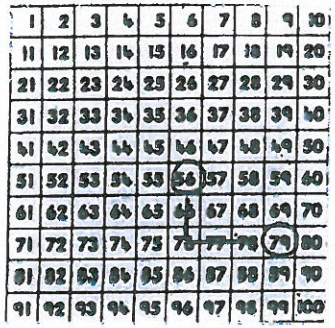
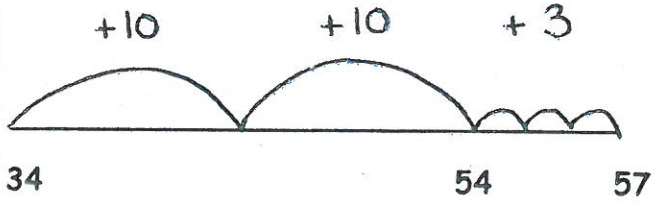
Following the changes in the National Curriculum, we are providing some information to support you with your child's learning.

Please use this guide to support your child with their maths homework throughout the course of the year.

The following calculation methods have been approved by the government. Your child will be expected to confidently and independently use and apply the majority of these skills by the end of the school year.

Crompton Buckstones Primary School - Written Calculations Policy 2014-2016

Addition

Year Group	Steps	How the method should look	
Year 2	using concrete objects and pictorial representations, including those involving numbers, quantities and measures Recording addition in columns supports place value and prepares for formal written methods with larger numbers.	**Use a hundred square** 56 + 23 = 79 Add the tens by jumping down, add the ones by sliding across.  **Use place value** 34 + 23 = 57 30 + 4 20 + 3 50 + 7 = 57 **Use a landmarked, then an unmarked numberline** 	**Use column method** T U 6 5 + 3 3 9 8

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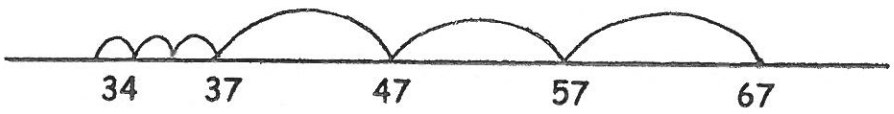
Subtraction

Year Group	Steps	How the method should look
Year 2	using concrete objects and pictorial representations, including those involving numbers, quantities and measures Recording subtraction in columns supports place value and prepares for formal written methods with larger numbers.	<u>Use a hundred square</u> 68 - 23 = 45 Subtract the tens by jumping up, subtract the ones by sliding across.  <u>Use place value</u> 74 - 23 = 51 70 4 20 3 50 1 Subtract ten and multiples of ten e.g 76-20 as 76, 66, 56 or in one hop 76-20=56. <u>Use landmarked and unmarked numberlines.</u> Subtract two 2 digit numbers by counting back in tens the ones e.g 67-33 as 67-30 (37) then count back 3 (34) 

<u>Use column method</u>

T	U
7	9 -
3	3
4	6

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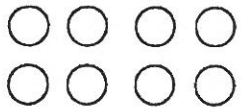
Multiplication		
Year Group	**Steps**	**How the method should look**
Year 2	solve problems involving multiplication and division, using materials, arrays, repeated addition, mental methods, and multiplication and division facts, including problems in contexts.	Understand multiplication as • **repeated addition:** for example 5 added together 3 times is 5 + 5 + 5, or 3 lots of 5, or 3 times 5, or 5 x 3 (or 3 x 5) • **Describing an array** e.g 4 x 2 = 8  2 x 4 = 8 Use arrays to find the answers to multiplication. Know that 3 x 4 can be interpreted as 3 lots of four things and that 6 x 5 is six steps in the 5 times table, as well as 6 lots of 5. Understand that 5 x 3 can be worked out as 3 5's or 5 3's.

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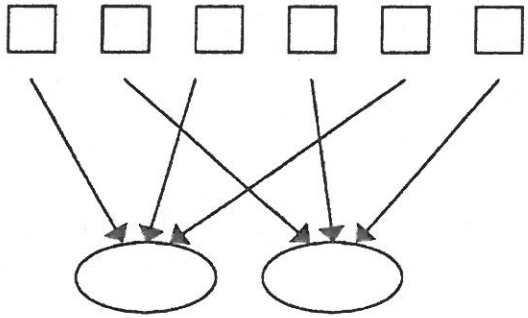
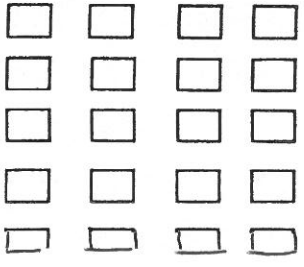
Division

Year Group	Steps	How the method should look
Year 2	recall and use multiplication and division facts for the 2, 5 and 10 multiplication tables, including recognising odd and even numbers calculate mathematical statements for multiplication and division within the multiplication tables and write them using the multiplication (×), division (÷) and equals (=) signs show that multiplication of two numbers can be done in any order (commutative) and division of one number by another cannot solve problems involving division, using materials, arrays, repeated addition, mental methods, and multiplication and division facts, including problems in contexts.	Understand the operation of division as: **sharing equally**: for example, 6 sweets are shared equally between 2 people. How many sweets does each one get?  **grouping** :relate division to multiplication by arrays or towers of cubes to find answers to division e.g how many towers of five cubes can I make from 20 cubes as □ x 5 = 20 and 20 ÷ 5 = □ 	**Using a number line for repeated subtraction:** 12 ÷ 3 = 4 

End of Year Maths Expectations for Year 2

Number and Place Value

Read and write numbers to at least 100 in numerals

Read and write numbers to at least 100 in words

Recognise odd and even numbers to 100

Count forwards in steps of 2, 3 and 5 from 0

Count backwards in steps of 2, 3 and 5

Recognise place value of each digit in 2-digit numbers (tens, ones)

Identify, represent and estimate numbers using different representations, including the number line

Compare and order numbers from 0 to 100 using the >; <; and = signs

Addition and Subtraction

Add and subtract numbers mentally including

Recall and use addition and subtraction facts to 20 fluently, and derive and use related facts up to 100 e.g 30+70

Add two1-digit; 2-digit and a 1 digit; 2-digit and 10s; two 2-digit and three 1-digit numbers

Subtract: two1-digit; 2-digit and a 1 digit; 2-digit and 10s; two 2-digit and three 1-digit numbers (without column decomposition)

Solve problems with addition and subtraction using concrete objects and pictorial representations, including those involving numbers, quantities and measures

Solve problems with addition and subtraction applying their increasing knowledge of mental and written methods

Show that addition of two numbers can be done in any order (commutative) and subtraction of one number from another cannot

Recognise and use the inverse relationship between addition and subtraction and use this to check calculations and missing number problems

Multiplication and Division

Calculate mathematical statements for multiplication within the multiplication tables and write them using the multiplication and equals signs

Recall and use multiplication facts for the 2, 5 and 10x multiplication tables

Recall and use division facts for the 2,5 and 10x multiplication tables

Calculate mathematical statements for division within the multiplication tables and write them using the division and equals signs

Show that multiplication of two numbers can be done in any order (commutative) and division of one number by another cannot

Solve problems involving multiplication, using materials, arrays ,

Solve repeated addition, mental methods, and multiplication facts, including problems in contexts

Solve problems involving multiplication, using materials, arrays, repeated addition, mental methods, and division facts, including problems in contexts

Fractions

Recognise, find, name and write fractions,1/3 1/4, 1/2, and 3/4 of a length, shape, set of objects or quantity

Write simple fractions e.g. 1/2 of 6 = 3 and recognize the equivalence of 2/4 and $\frac{1}{2}$

Measurement

Choose and use appropriate standard units to estimate length (m/cm); mass (kg/g); temperature and capacity (litres/ml) to the nearest appropriate unit, using rulers, scales, thermometers and measuring vessels

Compare and order lengths, mass, volume/capacity and record the results using >; <

Recognise and use symbols for pounds (£) and pence (p); combine amounts to make a particular value

Find different combinations of coins that equal the same amounts of money

Solve simple problems in a practical context involving addition and subtraction of money of the same unit

Solve simple problems in a practical context involving addition and subtraction of money of the same unit, including giving change

Compare and sequence intervals of time

Tell and write the time to 5 minute intervals, including quarter past/to the hour

Draw hands on a clock face to show the time to 5 minute intervals, including quarter past/to the hour

Know the number of minutes in an hour and the number of hours in a day

Geometry: Shape

Identify and describe the properties of 2D shapes, including the number of sides and symmetry in a vertical line as in Year 1 and quadrilateral and polygon

Identify and describe the properties of 3D shapes, including the number of edges, vertices and faces, as in year 1 and cuboid, prism, cone

Identify 2D shapes on the surface of 3D shapes, for example a circle on a cylinder

Compare and sort common 2D and 3D shapes and everyday objects

Order and arrange combinations of mathematical objects in patterns and sequences

Geometry:Position

Use mathematical vocabulary to describe position, direction and movement including in a straight line and distinguishing between rotation as a turn and in terms of right angles for quarter, half and three-quarter turns (clockwise and anti-clockwise)

Data

Interpret and construct simple pictograms, tally charts, block diagrams and simple tables

Ask and answer simple questions by counting the number of objects in each category and sorting the categories by quantity

Ask and answer each question about totalling and comparing categorical data