Year 2 Maths Attainment and Progress Grid:

Content domain	Autumn	Assessment task	Spring	Assessment task	Summer	Assessment task
Number & Place Value	• Identify, represent and estimate numbers using different representations. • Represent numbers using a number line. • **Recognise and represent the place value of 2-digit numbers.** • **Know and use these symbols (>,<,=) to order numbers up to 100.** • **Count from 0 in 2, 3 ,5 forwards and backwards.**	EXS: 1. 2. 2M11/3 3. 2M10/1 4. 2M11/4 2M14/3 5. GDS: 1. 2. 2MGD11/3 3. 2MGD10/1 4. 2MGD11/4 2MGD14/3 5.		EXS: GDS:	• **Use a 100 square with confidence and fill missing numbers** • **represent numbers in a variety of different ways using concrete and pictorial representations.** • **Solve missing numbers equations using place value to support understanding.** • **Solve worded problems using mental methods, pictorial and concrete resources to support or show understanding.** • **Use a simple number line and identify the missing numbers and intervals.**	EXS: 1. 2M10/2 2. 3. 4. 5. 2M11/3 GDS: 1. 2MGD10/2 2. 3. 4. 2MGD9/1 5. 2MGD11/3
Addition & Subtraction	• **Know the commutative law of addition.** • **Use number lines, 10's frames and part-part whole to check number facts and complete simple addition and subtraction.** • Make number bonds up to 100. • **Add and subtract 1's and 10's from a 2 digit number.** • **Complete subtraction of a 1 digit number from a 2 digit number using mental methods, tens frames, part/wholes and number-lines, not formal methods.** • Complete subtraction of a 2 digit number from a 2 digit number using mental methods, tens frames, part/wholes and number-lines, not formal methods. • **Complete simple addition and subtraction using formal column method.** • Add three 1 digit numbers. • Identify and complete the separate parts of a bar model.	EXS: 1) 2M13/1, 2M15/1 2) 2M13/3 3) 2M14/1 4) 5) 6) 2M14/2 7) 8) 9) 2M15/1+2 GDS: 1) 2MGD13/1, 2MGD15/1 2) 2MGD13/3 3) 2MGD14/1 4) 5) 6) 2MGD14/2 7) 8)2MGD13/2, 2MGD14/1 9) 2MGD15/1+2		EXS: GDS:	• **Identify the link between addition and subtraction and see how they are linked as well as understand that they are the inverse of each other.**	EXS: GDS:

Multiplication and Division	• **Count in steps of 10 from any number.** • Multiply equal groups of an amount. • **Construct and use arrays to show equal groups.** • **Use the x/=/÷ accurately in number sentences.**	EXS: 1) 2) 2M17/2 3) 2M17/3 4) 2M18/1 GDS: 1) 2) 2MGD17/2 3) 2MGD17/3 4) 2MGD18/1	• **Divide by 2 and understand the link between this and halving.** • **Demonstrate awareness of even and odd numbers and what makes them different by understanding halving and that you can halve even numbers evenly.** • **Divide simple numbers by 5 and 10 and see the link with the 5 and 10 times table.** • Label and identify the parts and whole of bar models related to division and multiplication.	EXS: 1) 2) 2M13/3 3) 4) 2M18/2, 2M18/3. GDS: 1) 2) 2MGD13/3 3) 4) 2MGD18/2, 2MGD18/3.		EXS: GDS:
Fractions		EXS: GDS:	• **Recognise, find, name and write fractions 1/3, 1/4, 2/4 and 3/4 of a length, shape, set of objects or quantity.** • Count up in quarters and halves. • **Understand what the wholes and parts of a fraction represents.** • Understand the connection between 2 quarters and a half. • Recognise and find a half and quarter of an object, shape of quantity.	EXS: 1) 2M19/1 2) 2M21/1 3) 2M21/3 4) 2M22/1 5) 2M21/2, 2M20/2 GDS: 1) 2MGD19/1 2) 2MGD21/1 3) 2MGD21/3 4) 2MGD22/1 5) 2MGD21/2, 2MGD20/2		EXS: GDS:
Measurement	• **Count and identify the value of all common notes and coins.** • Show the same denomination of money in different ways. • **Find the total amount of money and compare it to another amount of money.** • Solve simple practical problems that involve finding the change from an amount.	EXS: 1) 2) 2M24/2 3) 4) 2M18/2, 2M23/1 + 2, GDS: 1) 2) 2MGD24/2 3) 4) 2MGD18/2	• **Select the appropriate units to measure somethings length or height (cm/m).** • **Measure lengths accurately.** • Compare and order lengths. • Estimate the length of an object in cm/m.	EXS: 1) 2) 2M25/2 3) 4) GDS: 1) 2) 2M25/2 3) 2MGD25/2 4)	• **Tell and write the time to five minutes, including quarter past/to the hour and draw the hands on a clock face to show these times.** • **Know how many hours in a day and how many minutes in an hour.** • Find the duration of simple times across the hour and work out simple worded problems involving time. • **Accurately measure in gs and kg and know which one is appropriate to measure in.** • Order and compare weights using these symbols: <,>,=. • **Use measuring vessels to measure volume accurately and select the appropriate measurement (ml, l).** • Order and compare volume using these symbols: <,>,=. • Measure and record temperature using a thermometer.	EXS: 1) 2M26/2 2) 3) 4) 5) 2M25/1 6) 2M26/1 7) 8) GDS: 1) 2MGD26/2 2) 3) 4) 5) 2M25/1 6) 2MGD26/1 7) 8)

Geometry		EXS: GDS:	• Compare and sort 2d and 3d shapes based upon their components. • **Identify the vertices, faces and edges of shapes.** • **Sort 2d and 3d shapes into different categories and describe the categories.** • **Identify lines of symmetry on shapes.**	EXS: 1) 2M28/1 2) 2M29/1 3) 4) GDS: 1) 2MGD28/1 2) 2MGD27/1 3) 2MGD29/1 4)	• Use mathematical vocabulary to describe position, direction and movement. • **Distinguishing between rotation as a turn and in terms of right angles for quarter, half and three quarter turns (clockwise and anti-clockwise).**	EXS: 1) 2) GDS: 1) 2)
Statistics		EXS: GDS:	• **Count amounts using a tally and interpret how much of something there is based on a tally.** • Interpret and construct simple pictograms and block diagrams.	EXS: 1) 2MGD30/1, 2M30/1 2) 2M30/1 GDS: 1) 2MGD30/1, 2M30/1 2) 2MGD31/1		EXS: GDS:
An expected year 2 mathematician at the end of the year has continued to build fluency in number especially with the relationships between 1's and 10's with other numbers. This allows them to construct a base knowledge of the relationships found in a number square and use this mentally build upon a solid foundation of concrete scaffolding. Children are able to use base 10 independently and accurately to demonstrate knowledge. However, they can also select and use a variety of different resources to call upon to build their knowledge of number and calculation. At this point in their learning, the child should have a solid understanding of addition and subtraction of numbers using mental methods as well as different resources and number lines. They also know the relationship between addition and subtraction and can use the commutative law to check understanding and accuracy. The child can also use and create simple bar models to demonstrate understanding of a question before attempting it. During more difficult or worded problems, they have begun to discuss ways of solving with their partners that involves the concrete resources and their own knowledge of number.						
A Year 2 mathematician working at greater depth is able to do all the above but with more speed in fluency of times tables and number facts within the 100 square. When given an unknown or difficult word problem, they can clearly see a line of enquiry to follow and quickly calling upon the number facts known and what resources are around them in order to answer it. Not only this, but when asked the child is able to explain in simple terms and using the correct vocabulary from memory why that method was chosen. If the child is asked to show in a different way – either a number, answer or a calculation – they would be able to show several and with different resources showing the mailability of their knowledge of maths.						

https://www.ncetm.org.uk/media/dnobtk14/mastery_assessment_yr2.pdf

The codes in the assessment tasks relate to the above document. Each code to the side of each area of study relates to an assessment task to be completed by the teacher to assess the proficiency of the class in different areas of maths. This could be done at the end of a lesson, as a small group as a test as a discussion: it's the teacher's choice. However, these should be completed at regular intervals as you teach different areas of the curriculum as they will help inform you of what your children need (support with certain areas) and these do not replace the reasoning and problem solving that should be present in every maths lesson. It also needs to be evidence in some way so that assessment can be moderated. Some statements do not have an activity number, this is due to it not being overtly shown in the booklet however all skills can be found in other tasks but may not be the main skill of the task.

The code is as below:

2M12/1 – The first number is the year group booklet the task is from. The letter is if it's mastery or mastery with greater depth column. The next number is the page and the final number is which activity it is on the page.

This one would be: year 2 booklet, Mastery column, page 12, 1st activity on the page.

6MGD19/4 – Year 6 booklet, Mastery with greater depth column, Page 19, 4th activity down.