

MATHS				
YEAR 1				
ATTITUDES We want to develop...	KEY SKILLS We want all children to be able to:		STRATEGIES How we will teach it...	EVIDENCE FOR ASSESSMENT How we will decide they've achieved the skills...
Enthusiasm for number  Confidence and fluency in counting  Resilience for solving simple problems  Familiarity with shapes and measures they find in their own environments  Articulate and confident users of vocabulary	NUMBER & PLACE VALUE	<ul style="list-style-type: none"> <li>Count to and across 100, forwards and backwards, beginning with 0 or 1, or from any given number</li> <li>Count, read and write numbers to 100 in numerals; count in multiples of twos, fives and tens</li> <li>Given a number, identify one more and one less</li> </ul>	Singing songs/rhymes  Repetition of skills through varied activities within child initiated learning  Daily 5 minute numeracy activity outside of the maths lesson  Using real life examples  Using manipulatives (concrete representations of number, resources)  Presenting a range of problems so children can apply their skills in a range of contexts e.g. Talk it; solve it, Testbase, word problems e.t.c.  Using the calculation methods set out in the calculation policy	Teacher and TA observational assessment from focused teaching groups and carpet sessions  Recording children's progress on ipads against KPIs and year objectives using O-Track  Marking independent work from child initiated learning activities  Observing children working in pairs discussing their learning with each other  Tracking children's achievement towards Mental Maths stickers and badges  Use of Mymaths to set home learning activities
	ADDITION & SUBTRACTION	<ul style="list-style-type: none"> <li>Represent and use number bonds and related subtraction facts within 20</li> </ul>		
	MULTIPLICATION & DIVISION			
	FRACTIONS	<ul style="list-style-type: none"> <li>Recognise, find and name a half as one of two equal parts of an object, shape or quantity</li> </ul>		
	MEASUREMENT	<ul style="list-style-type: none"> <li><i>Compare, describe and solve practical problems for:</i> <ul style="list-style-type: none"> <li>* lengths and heights [for example, long/short, longer/shorter, tall/short, double/half];</li> <li>* mass/weight [for example, heavy/light, heavier than, lighter than];</li> <li>* capacity and volume [for example, full/empty, more than, less than, half, half full, quarter];</li> <li>* time [for example, quicker, slower, earlier, later]</li> </ul> </li> <li>Tell the time to the hour and half past the hour and draw the hands on a clock face to show these times</li> </ul>		
	GEOMETRY: PROPERTIES OF SHAPES	<ul style="list-style-type: none"> <li><i>Recognise and name common 2-D and 3-D shapes, including:</i> <ul style="list-style-type: none"> <li>* 2-D shapes [for example, rectangles (including squares), circles and triangles];</li> <li>* 3-D shapes [for example, cuboids (including cubes), pyramids and spheres]</li> </ul> </li> </ul>		
	GEOMETRY: POSITION & DIRECTION			
	STATISTICS			

MATHS				
YEAR 2				
ATTITUDES We want to develop...	KEY SKILLS We want all children to be able to:		STRATEGIES How we will teach it...	EVIDENCE FOR ASSESSMENT How we will decide they've achieved the skills...
Enthusiasm for number  Confidence and fluency in counting  Resilience for solving simple problems  Familiarity with shapes and measures they find in their own environments  Articulate and confident users of vocabulary	NUMBER & PLACE VALUE	<ul style="list-style-type: none"> <li>Count in steps of 2, 3, and 5 from 0, and in tens from any number, forward and backward</li> <li>Recognise the place value of each digit in a two-digit number (tens, ones)</li> <li>Compare and order numbers from 0 up to 100; use &lt;, &gt; and = signs</li> <li>Use place value and number facts to solve problems</li> </ul>	Singing songs/rhymes  Repetition of skills through varied activities within child initiated learning  Daily 5 minute numeracy activity outside of the maths lesson  Using real life examples  Using manipulatives (concrete representations of number, resources)  Presenting a range of problems so children can apply their skills in a range of contexts e.g. Talk it; solve it, Testbase, word problems e.t.c.  Using the calculation methods set out in the calculation policy	Teacher and TA observational assessment from focused teaching groups and carpet sessions  Recording children's progress on ipads against KPIs and year objectives using O-Track  Marking independent work in books and from child initiated learning activities  Observing children working in pairs discussing their learning with each other  Tracking children's achievement towards Mental Maths stickers and badges  Use of Mymaths to set home learning activities  End of Key Stage formal assessments set by the Government
	ADDITION & SUBTRACTION	<ul style="list-style-type: none"> <li><i>Solve problems with addition and subtraction:</i> *Using concrete objects and pictorial representations, including those involving numbers, quantities and measures; *Applying their increasing knowledge of mental and written methods</li> <li><i>Recall and use addition and subtraction facts to 20 and 100:</i> * fluently up to 20</li> </ul>		
	MULTIPLICATION & DIVISION	<ul style="list-style-type: none"> <li>Recall and use multiplication and division facts for the 2, 5 and 10 multiplication tables, including recognising odd and even numbers</li> <li>Solve problems involving multiplication and division, using materials, arrays, repeated addition, mental methods, and multiplication and division facts, including problems in contexts</li> </ul>		
	FRACTIONS	<ul style="list-style-type: none"> <li>Recognise, find, name and write fractions <math>\frac{1}{3}</math>, <math>\frac{1}{4}</math>, <math>\frac{2}{4}</math>, and <math>\frac{3}{4}</math> of a length, shape, set of objects or quantity</li> </ul>		
	MEASUREMENT	<ul style="list-style-type: none"> <li>Solve simple problems in a practical context involving addition and subtraction of money of the same unit, including giving change.</li> <li>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.</li> </ul>		
	GEOMETRY: PROPERTIES OF SHAPES	<ul style="list-style-type: none"> <li>Compare and sort common 2-D and 3-D shapes and everyday objects.</li> </ul>		
	GEOMETRY: POSITION & DIRECTION	<ul style="list-style-type: none"> <li>Use mathematical vocabulary to describe position, direction and movement, including movement 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)</li> </ul>		
	STATISTICS	<ul style="list-style-type: none"> <li>Ask and answer questions about totalling and comparing categorical data.</li> </ul>		

MATHS				
YEAR 3				
ATTITUDES We want to develop...	KEY SKILLS We want all children to be able to:		STRATEGIES How we will teach it...	EVIDENCE FOR ASSESSMENT How we will decide they've achieved the skills...
Enthusiasm for mathematics  Confidence and fluency in place value and calculation  Resilience and resourcefulness for solving problems  Confidence to apply understanding of concepts to their own lives  Independence to try different strategies  Articulate and confident users of vocabulary	NUMBER & PLACE VALUE	<ul style="list-style-type: none"> <li>Count from 0 in multiples of 4, 8, 50 and 100; find 10 or 100 more or less than a given number</li> <li>Recognise the place value of each digit in a three-digit number (hundreds, tens, ones)</li> <li>Solve number problems and practical problems involving these ideas</li> </ul>	Repetition of skills through varied activities within child initiated learning	Teacher and TA observational assessment from focused teaching groups and input sessions
	ADDITION & SUBTRACTION	<ul style="list-style-type: none"> <li><i>Add and subtract numbers mentally, including:</i> * a three-digit number and ones; * a three-digit number and tens; * a three-digit number and hundreds.</li> </ul>	Daily 5 minute numeracy activity outside of the maths lesson	Recording children's progress on ipads against KPIs and year objectives using O-Track
	MULTIPLICATION & DIVISION	<ul style="list-style-type: none"> <li>Recall and use multiplication and division facts for the 3x table</li> <li>Recall and use multiplication and division facts for the 4x table</li> <li>Recall and use multiplication and division facts for the 8x table</li> <li>Write and calculate mathematical statements for multiplication and division using the multiplication tables that they know, including for two-digit numbers times one-digit numbers, using mental and progressing to formal written methods</li> </ul>	Using real life examples  Using manipulatives (concrete representations of number, resources)	Marking independent work in books and from child initiated learning activities  Observing children working in pairs discussing their learning with each other
	FRACTIONS	<ul style="list-style-type: none"> <li>Count up and down in tenths; recognise that tenths arise from dividing an object into 10 equal parts and in dividing one-digit numbers or quantities by 10</li> <li>Recognise, find and write fractions of a discrete set of objects: unit fractions and non-unit fractions with small denominators</li> <li>Recognise and show, using diagrams, equivalent fractions with small denominators</li> </ul>	Presenting a range of problems so children can apply their skills in a range of contexts e.g. Talk it; solve it, Testbase, word problems e.t.c.	Tracking children's achievement towards Mental Maths stickers and badges
	MEASUREMENT	<ul style="list-style-type: none"> <li>Measure, compare, add and subtract lengths (m/cm/mm)</li> <li>Measure, compare, add and subtract mass (kg/g)</li> <li>Measure, compare, add and subtract volume/capacity (l/ml)</li> <li>Add and subtract amounts of money to give change, using both £ and p in practical contexts</li> <li><i>Tell and write the time from:</i> *an analogue clock and 12-hour and 24-hour clocks</li> </ul>	Using the calculation methods set out in the calculation policy	Use of Mymaths to set home learning activities
	GEOMETRY: PROPERTIES OF SHAPES			
	GEOMETRY: POSITION & DIRECTION	<ul style="list-style-type: none"> <li>Identify right angles, recognise that two right angles make a half-turn, three make three quarters of a turn and four a complete turn; identify whether angles are greater than or less than a right angle</li> </ul>		
	STATISTICS	<ul style="list-style-type: none"> <li>Interpret and present data using bar charts, pictograms and tables</li> </ul>		

MATHS				
YEAR 4				
ATTITUDES We want to develop...	KEY SKILLS We want all children to be able to:		STRATEGIES How we will teach it...	EVIDENCE FOR ASSESSMENT How we will decide they've achieved the skills...
<p>Enthusiasm for mathematics</p> <p>Confidence and fluency in place value and calculation</p> <p>Resilience and resourcefulness for solving problems</p> <p>Confidence to apply understanding of concepts to their own lives</p> <p>Independence to try different strategies</p> <p>Articulate and confident users of vocabulary</p>	NUMBER & PLACE VALUE	<ul style="list-style-type: none"> <li>Count in multiples of 6, 7, 9, 25 and 1000.</li> <li>Count backwards through zero to include negative numbers</li> <li>Recognise the place value of each digit in a four-digit number (thousands, hundreds, tens, and ones)</li> <li>Order and compare numbers beyond 1000</li> <li>Round any number to the nearest 10, 100 or 1000</li> </ul>	Streaming the children into one higher ability group and two mixed and lower ability groups	<p>Teacher and TA observational assessment from focused teaching groups and input sessions</p> <p>Recording children's progress on ipads against KPIs and year objectives using O-Track</p> <p>Marking independent work in books and from child initiated learning activities</p> <p>Observing children working in pairs discussing their learning with each other</p> <p>Tracking children's achievement towards Mental Maths stickers and badges</p> <p>Use of Mymaths to set home learning activities</p> <p>Conversations with children about their learning</p>
	ADDITION & SUBTRACTION	<ul style="list-style-type: none"> <li>Solve addition and subtraction two-step problems in contexts, deciding which operations and methods to use and why</li> </ul>	Repetition of skills through varied activities within child initiated learning	
	MULTIPLICATION & DIVISION	<ul style="list-style-type: none"> <li>Recall multiplication and division facts for multiplication tables up to 12 x 12</li> </ul>	Daily 5 minute numeracy activity outside of the maths lesson	
	FRACTIONS	<ul style="list-style-type: none"> <li>Recognise and show, using diagrams, families of common equivalent fractions</li> <li>Count up and down in hundredths; recognise that hundredths arise when dividing an object by one hundred and dividing tenths by ten</li> <li>Round decimals with one decimal place to the nearest whole number</li> <li>Solve simple measure and money problems involving fractions and decimals to two decimal places</li> </ul>	Using real life examples	
	MEASUREMENT	<ul style="list-style-type: none"> <li>Convert between different units of measure</li> </ul>	Using manipulatives (concrete representations of number, resources)	
	GEOMETRY: PROPERTIES OF SHAPES	<ul style="list-style-type: none"> <li>Compare and classify geometric shapes, including quadrilaterals and triangles, based on their properties and sizes</li> <li>Identify lines of symmetry in 2-D shapes presented in different orientations</li> </ul>	Presenting a range of problems so children can apply their skills in a range of contexts e.g. Talk it; solve it, Testbase, word problems e.t.c.	
	GEOMETRY: POSITION & DIRECTION	<ul style="list-style-type: none"> <li>Plot specified points and draw sides to complete a given polygon</li> </ul>	Using the calculation methods set out in the calculation policy	
	STATISTICS	<ul style="list-style-type: none"> <li>Solve comparison, sum and difference problems using information presented in bar charts, pictograms, tables and other graphs</li> </ul>		

MATHS				
YEAR 5				
ATTITUDES We want to develop...	KEY SKILLS We want all children to be able to:		STRATEGIES How we will teach it...	EVIDENCE FOR ASSESSMENT How we will decide they've achieved the skills...
Enthusiasm for mathematics  Efficiency in calculation  Resilience and resourcefulness for solving problems  Confidence to apply understanding of concepts to their own lives  Independence to select appropriate strategies  Articulate and confident users of vocabulary	NUMBER & PLACE VALUE	<ul style="list-style-type: none"> <li>Read, write, order and compare numbers to at least 1 000 000 and determine the value of each digit</li> <li>Interpret negative numbers in context, count forwards and backwards with positive and negative whole numbers, including through zero</li> </ul>	Streaming the children into one higher ability group and two mixed and lower ability groups	Teacher and TA observational assessment from focused teaching groups and input sessions
	ADDITION & SUBTRACTION	<ul style="list-style-type: none"> <li>Add and subtract whole numbers with more than 4 digits</li> <li>Add and subtract numbers mentally with increasingly large numbers (<i>example, 12 462 – 2300 = 10 162</i>)</li> </ul>	Repetition of skills through varied activities within child initiated learning	Recording children's progress on ipads against KPIs and year objectives using O-Track
	MULTIPLICATION & DIVISION	<ul style="list-style-type: none"> <li>Identify multiples and factors, including finding all factor pairs of a number, and common factors of two numbers</li> <li>Solve problems involving multiplication and division including using their knowledge of factors and multiples, squares and cubes</li> <li>Solve problems involving multiplication and division, including scaling by simple fractions and problems involving simple rates</li> </ul>	Daily 5 minute numeracy activity outside of the maths lesson	Marking independent work in books and from child initiated learning activities
	FRACTIONS	<ul style="list-style-type: none"> <li>Compare and order fractions whose denominators are all multiples of the same number</li> <li>Read and write decimal numbers as fractions</li> <li>Read, write, order and compare numbers with up to three decimal places</li> <li>Solve problems which require knowing percentage and decimal equivalents of 1/2, 1/4, 1/5, 2/5, 4/5 and those fractions with a denominator of a multiple of 10 or 25</li> </ul>	Using real life examples  Using manipulatives (concrete representations of number, resources)	Observing children working in pairs discussing their learning with each other  Tracking children's achievement towards Mental Maths stickers and badges
	MEASUREMENT	<ul style="list-style-type: none"> <li>Convert between different units of metric measure (for example, kilometre and metre; centimetre and metre; centimetre and millimetre; gram and kilogram; litre and millilitre)</li> <li>Measure and calculate the perimeter of composite rectilinear shapes in centimetres and metres</li> <li>Calculate and compare the area of rectangles (including squares), and including using standard units, square centimetres (cm<sup>2</sup>) and square metres (m<sup>2</sup>)</li> </ul>	Presenting a range of problems so children can apply their skills in a range of contexts e.g. whole class investigations, Talk it; solve it, Testbase, word problems e.t.c.	Use of Mymaths to set home learning activities  Conversations with children about their learning
	GEOMETRY: PROPERTIES OF SHAPES	<ul style="list-style-type: none"> <li>Draw given angles, and measure them in degrees (°)</li> <li>Distinguish between regular and irregular polygons based on reasoning about equal sides and angles</li> </ul>	Using the calculation methods set out in the calculation policy	
	GEOMETRY: POSITION & DIRECTION			
	STATISTICS	<ul style="list-style-type: none"> <li>Complete, read and interpret information in tables, including timetables</li> </ul>		

MATHS				
YEAR 6				
ATTITUDES We want to develop...	KEY SKILLS We want all children to be able to:		STRATEGIES How we will teach it...	EVIDENCE FOR ASSESSMENT How we will decide they've achieved the skills...
Enthusiasm for mathematics  Efficiency in calculation  Resilience and resourcefulness for solving problems  Confidence to apply understanding of concepts to their own lives  Independence to select appropriate strategies  Articulate and confident users of vocabulary	NUMBER & PLACE VALUE	<ul style="list-style-type: none"> <li>Round any whole number to a required degree of accuracy</li> <li>Use negative numbers in context, and calculate intervals across zero</li> </ul>	Streaming the children into one higher ability group and two mixed and lower ability groups	Teacher and TA observational assessment from focused teaching groups and input sessions
	ADDITION, SUBTRACTION, MULTIPLICATION & DIVISION	<ul style="list-style-type: none"> <li>Multiply multi-digit numbers up to 4 digits by a two-digit whole number</li> <li>Divide numbers up to 4 digits by a two-digit number and interpret remainders as whole number remainders, fractions, or by rounding, as appropriate for the context</li> <li>Solve addition and subtraction multi-step problems in contexts, deciding which operations and methods to use and why</li> <li>Use estimation to check answers to calculations and determine, in the context of a problem, an appropriate degree of accuracy</li> </ul>	Repetition of skills through varied activities within child initiated learning  Daily 5 minute numeracy activity outside of the maths lesson	Recording children's progress on ipads against KPIs and year objectives using O-Track  Marking independent work from child initiated learning activities
	FRACTIONS INCLUDING DECIMALS & PERCENTAGES	<ul style="list-style-type: none"> <li>Use written division methods in cases where the answer has up to two decimal places</li> <li>Solve problems which require answers to be rounded to specified degrees of accuracy</li> <li>Recall and use equivalences between simple fractions, decimals and percentages, including in different contexts</li> </ul>	Using real life examples	Observing children working in pairs discussing their learning with each other
	RATIO & PROPORTION	<ul style="list-style-type: none"> <li>Solve problems involving the calculation of percentages and the use of percentages for comparison</li> <li>Solve problems involving unequal sharing and grouping using knowledge of fractions and multiples</li> </ul>	Using manipulatives (concrete representations of number, resources)	Tracking chn's achievement towards Mental Maths stickers and badges
	ALGEBRA	<ul style="list-style-type: none"> <li>Use simple formulae</li> </ul>	Presenting a range of problems so children can apply their skills in a range of contexts e.g. whole class investigations, Talk it; solve it, Testbase, word problems e.t.c.	Use of Mymaths to set home learning activities
	MEASUREMENT	<ul style="list-style-type: none"> <li>Use, read, write and convert between standard units, converting measurements of length, mass, volume and time from a smaller unit of measure to a larger unit, and vice versa, using decimal notation to up to three decimal places</li> </ul>		Conversations with children about their learning
	GEOMETRY: PROPERTIES OF SHAPES	<ul style="list-style-type: none"> <li>Compare and classify geometric shapes based on their properties and sizes and find unknown angles in any triangles, quadrilaterals, and regular polygons</li> </ul>	Using the calculation methods set out in the calculation policy	End of Key Stage formal assessments set by the Government
	GEOMETRY: POSITION & DIRECTION	<ul style="list-style-type: none"> <li>Describe positions on the full coordinate grid (all four quadrants)</li> </ul>		
	STATISTICS	<ul style="list-style-type: none"> <li>Interpret pie charts and line graphs and use these to solve problems</li> <li>Calculate and interpret the mean as an average</li> </ul>		

