QPS: Year 2 Mathematics end of year goals (based on statutory and non-statutory DFE mathematical guidance and the DFE Ready to Progress Criteria)

| Number and Place Value | Addition and Subtraction | Multiplication, Division | Fractions | Measurement | Geometry <br> Properties of Shape <br> Position, Direction \& Motion | Statistics |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Reasoning and problem solving | Reasoning and problem solving | Reasoning and problem solving | Reasoning and problem solving | Reasoning and problem solving | Reasoning and problem solving |  |
| Count in steps of 2 , <br> 3 , and 5 from 0 , and in tens from any number, forward and backward <br> Recognise the place value of each digit in a two-digit number (tens, ones) <br> Identify, represent and estimate numbers using different representations, including the number line <br> Compare and order numbers from 0 up to 100; use <, > and = signs. <br> Read and write numbers to at least 100 in numerals and in words. <br> Round any number to the nearest 10 . <br> Use place value and number facts to solve problems. | Solve problems with addition and subtraction: using concrete objects and pictorial representations, including those involving numbers, quantities and measures <br> applying their increasing knowledge of mental and written methods <br> Recall and use addition and subtraction facts to 20 fluently, and derive and use related facts up to 100 <br> Add and subtract numbers using concrete objects, pictorial representations, and mentally, including: <br> a two-digit number and ones <br> a two-digit number and tens <br> two two-digit numbers adding three one-digit numbers <br> Show that addition of two numbers can be done in any order (commutative) and subtraction of one number from another cannot <br> Recognise and use the inverse relationship between addition and subtraction and use this to check calculations and solve missing number problems. | Recall and use multiplication and division facts for the 2, 5 and 10 multiplication tables, including recognising odd and even numbers <br> Count in $3 \mathrm{~s}, 4 \mathrm{~s}$ and 8 s <br> Calculate mathematical statements for multiplication and division within the multiplication tables and write them using the multiplication (x), division ( $\div$ ) and equals (=) signs <br> Show that multiplication of two numbers can be done in any order (commutative) and division of one number by another cannot <br> Solve problems involving multiplication and division, using materials, arrays, repeated addition, mental methods, and multiplication and division facts, including problems in contexts. <br> Double and halve numbers 1 20. <br> Introduce the concept of remainders. <br> Begin to relate multiplication and division to fractions. | Recognise, find, name and write fractions $1 / 3,1 / 4,2 / 4$, and $3 / 4$ of a length, shape, set of objects or quantity <br> Write simple fractions for example, $1 / 2$ of $6=3$ and recognise the equivalence of $2 / 4$ and $1 / 2$. <br> Order simple fractions on a numberline. <br> Use <> with simple fractions. <br> Count in halves, quarters and thirds up to 10. <br> Add quarters <br> eg: $1 / 4+2 / 4=3 / 4$. <br> Add thirds <br> Eg: $1+1 / 3+1 / 3=$ <br> 1 and $2 / 3$ <br> Find fractions of amounts and simple measures. <br> $\mathrm{Eg}: 1 / 2$ of $£ 20$ <br> Shade $1 / 3$ of the shape | Choose and use appropriate standard units to estimate and measure length/height in any direction (m/cm); mass (kg/g); temperature ( ${ }^{\circ} \mathrm{C}$ ); capacity (litres/ml) to the nearest appropriate unit, using rulers, scales, thermometers and measuring vessels <br> Compare and order lengths, mass, volume/capacity and record the results using >, < and $=$ <br> Recognise and use symbols for pounds ( $£$ ) and pence (p); combine amounts to make a particular value <br> Find different combinations of coins that equal the same amounts of money <br> Solve simple problems in a practical context involving addition and subtraction of money of the same unit, including giving change <br> Compare and sequence intervals of time <br> 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 <br> Know the number of minutes in an hour and the number of hours in a day. | Identify and describe the properties of 2-D shapes, including the number of sides and symmetry in a vertical line. <br> Identify and describe the properties of 3-D shapes, including the number of edges, vertices and faces <br> Identify 2-D shapes on the surface of 3-D shapes, [for example, a circle on a cylinder and a triangle on a pyramid] <br> Compare and sort common 2-D and 3-D shapes and everyday objects. <br> order and arrange combinations of mathematical objects in patterns and sequences <br> 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). | Interpret and construct simple pictograms, tally charts, block diagrams and simple tables <br> Ask and answer simple questions by counting the number of objects in each category and sorting the categories by quantity <br> Ask and answer questions about totalling and comparing categorical data. |

