## How to access independent learning on SPARX Maths

Step 1) Sign in to SPARX Maths in the normal way


Step 3) Type in your selected SPARX Code and select


Step 4) Make sure to start on the Strengthen Questions, if you then struggle move to Introduce and if you do well then move onto the Deepen Questions

Independent learning Number Fractions and mixed numbers
Finding fractions of shapes - M158
Level 2 $\checkmark$ 直
$\checkmark$ Show building blocks


Finding fractions of shapes



| Question 1 | Question 2 | Question 3 |
| :--- | :--- | :--- |
| $\begin{array}{ll}\text { Answer } & \text { Answer }\end{array} \quad$ Answer | Answer |  |


| Year 7 End of Year Assessment Topics |  | Sparx Codes | RAG* | Done |
| :---: | :---: | :---: | :---: | :---: |
| Numerical Skills | Understand and use place value for decimals. Calculations with negative numbers. Estimate calculations by rounding. | $\begin{aligned} & \hline \text { M763, M704, } \\ & \text { M522, M527, } \\ & \text { M135, M111, } \\ & \text { M431, M878 } \end{aligned}$ |  |  |
| Order of operations | Solve calculations requiring understanding of B-I-DM-AS (know that the inverse of squaring is 'square rooting') | M521 |  |  |
| Introduction to Algebra | Introduce the concept of algebra, simplify expressions, manipulate expressions through simple one step rearranging, substitute positive and negative integers into expressions, solve simple one step equations. Substitute and solve. | M106, M830, M813, M795, M531, M417, M327, M208, M979 |  |  |
| Primes, Factors and Multiples | Use the concepts and vocabulary of prime numbers, factors (or divisors), multiples, common factors, common multiples, highest common factor, lowest common multiple | $\begin{aligned} & \text { M227, M823, } \\ & \text { M698, M322, } \\ & \text { M829 } \end{aligned}$ |  |  |
| Expanding and Factorising 1 | Simplify and manipulate algebraic expressions to maintain equivalence by multiplying a single term over a bracket or by taking out common factors | $\begin{aligned} & \text { M288, M237, } \\ & \text { M792, M100 } \end{aligned}$ |  |  |
| Addition and Subtraction | Use Addition and Subtraction, including formal written methods, applied to integers, decimals | $\begin{aligned} & \text { M928, M429, } \\ & \text { M347, M152, } \\ & \text { M899 } \end{aligned}$ |  |  |
| Perimeter | Calculate and solve problems involving perimeters of rectangles and compound shapes (not circles). Converting metric units of length. | $\begin{aligned} & \text { M920, M635, } \\ & \text { M690 } \end{aligned}$ |  |  |
| Mean | Describe, interpret and compare observed distributions of a single variable through the use of the mean | M940 |  |  |
| Multiplication and Division | Use Multiplication and Division, including formal written methods, applied to integers, decimals | M113, M911, <br> M187, M803, <br> M462, M354, <br> M873, M262 |  |  |
| Area of triangles and quadrilaterals | Derive and apply formulae to calculate and solve problems involving area of triangles and quadrilaterals. Converting metric units of area. | $\begin{aligned} & \hline \text { M900, M390, } \\ & \text { M291, M610, } \\ & \text { M269, M996 } \end{aligned}$ |  |  |
| Fraction Manipulation | Express one quantity as a fraction of another, where the fraction is less than 1 and greater than 1 | M158, M410, M671, M939, M601 |  |  |
| Adding and Subtracting Fractions | Use addition and subtraction, including formal written methods, applied to proper and improper fractions, and mixed numbers | M835, M931 |  |  |
| Comparing and Ordering Fractions | Compare and order fractions by creating common denominators | M335, M958 |  |  |
| Fractions of amounts | Interpret fractions as operators | M695 |  |  |
| Polygons | Derive, describe, and illustrate properties of triangles, quadrilaterals and other plane figures. Describe, sketch, and draw regular polygons, and other polygons that are reflectively and rotationally symmetric example, equal lengths and angles using appropriate language and technologies | M276, M523 |  |  |


| Angles | Apply the properties of angles at a point, angles at a <br> point on a straight line, vertically opposite angles | M502, M541, <br> M780, M331, <br> M818, M351, <br> M679, M319 |  |  |
| :---: | :--- | :--- | :--- | :--- |
|  | Read and plot coordinates in all 4 quadrants. <br> Coordinates and developing algebraic relationships. <br> Find midpoints. Understand how coordinates link to <br> basic graphs of $\mathrm{y}=\mathrm{a}, \mathrm{x}=\mathrm{a}, \mathrm{y}=\mathrm{x}$ and $\mathrm{y}=-\mathrm{x}$ | M618 |  |  |

* RAG stands for Red Amber Green - Red being topics you know you struggle with, Amber those you need to practice and Green ones that you are confident and secure on


## Key areas of Revision:

## Questions to ask my teacher

