## Maths Curriculum Map – Voyagers (Year 5 and 6)

## <u>Autumn Term</u>

	Place Value (3 weeks)	Add and Subtract ( 1 week)	Multiples, Factors, Cube and Squares (2 weeks)	Multiplication and division (2 weeks and 3 days)	Fractions A (2 weeks)	Fractions B (2 weeks)	Measure (1 week and 2 days)
Year 5	<ul> <li>Roman numerals to 1,000</li> <li>Numbers to 10,000</li> <li>Numbers to 1,000,000</li> <li>Numbers to 1,000,000</li> <li>Read and write numbers to 1,000,000</li> <li>Powers of 10</li> <li>Partition numbers to 1,000,000 Compare and order numbers to 1,000,000</li> <li>Compare and order numbers to 1,000,000</li> <li>Round to the nearest 10, 100 or 1,000</li> <li>Round within 100,000</li> <li>Negative numbers and solve problems</li> </ul>	<ul> <li>Mental strategies</li> <li>Add whole numbers with more than four digits</li> <li>Subtract whole numbers with more than four digits</li> <li>Inverse operations (addition and subtraction including missing digits)</li> <li>Multi-step addition and subtraction problems</li> <li>Use rounding to check</li> </ul>	<ul> <li>Multi-step addition and subtraction problems</li> <li>Common multiples</li> <li>Factors</li> <li>Common factors</li> <li>Prime numbers</li> <li>Square numbers</li> <li>Cube numbers</li> <li>X and divide by 10,100, 1000</li> </ul>	<ul> <li>Multiply up to a 4-digit number by a 1-digit number</li> <li>Multiply a 2-digit number by a 2-digit number</li> <li>Multiply a 3-digit number by a 2-digit number by a 2-digit number</li> <li>Short division</li> <li>Divide a 4-digit number by a 1-digit number</li> <li>Divide with remainders</li> <li>Solve problems with multiplication and division</li> <li>Efficient division</li> </ul>	<ul> <li>Find fractions         equivalent to a non-unit         fraction</li> <li>Find fractions         equivalent to a unit         fraction</li> <li>Compare and Order         fractions less than 1</li> <li>Add fractions within 1</li> <li>Subtract fractions</li> <li>Convert improper         fractions to mixed         numbers</li> <li>Convert mixed numbers         to improper fractions</li> <li>Compare and order         fractions greater than 1</li> </ul>	<ul> <li>Add fractions with total greater than 1</li> <li>Add to a mixed number</li> <li>Add two mixed numbers</li> <li>Subtract from a mixed number</li> <li>Subtract from a mixed number – breaking the whole</li> <li>Subtract two mixed numbers</li> <li>Multiply a non-unit fraction by an integer</li> <li>Calculate a fraction of a quantity</li> <li>Fraction of an amount</li> <li>Use fractions as operators</li> </ul>	<ul> <li>Kilograms and kilometres</li> <li>Millimetres and millilitres</li> <li>Convert units of length</li> <li>Convert between metric and imperial units</li> <li>Units of time and timetables</li> </ul>
Year 6	<ul> <li>Roman Numerals</li> <li>Numbers to 1,000,000</li> <li>Numbers to 10,000,000</li> <li>Read and write numbers to 10,000,000</li> <li>Powers of 10</li> <li>Number line to 10,000,000</li> <li>Compare and order any integers</li> <li>Round any integer</li> <li>Negative numbers</li> <li>Solve problems</li> </ul>	<ul> <li>Add and subtract integers up to 5 digits with multiples exchanges and carrying</li> <li>Inverse operations (addition and subtraction including missing digits)</li> <li>Multi-step addition and subtraction problems</li> <li>Use estimation to check</li> </ul>	<ul> <li>Multiples</li> <li>Common Multiples</li> <li>Factors</li> <li>Common Factors</li> <li>Primes to 100</li> <li>Square and cube numbers</li> <li>X and divide by 10,100, 1000</li> </ul>	<ul> <li>Multiply 3 and 4 digit by 1 digit</li> <li>Multiply 2 digit by 2 digit</li> <li>Multiply 3 and 4 digit by 2 digits</li> <li>Solve problems with multiplication</li> <li>Short division</li> <li>Introduction to long division</li> <li>Long division with remainders</li> <li>Solve problems with division</li> <li>Solve multi-step problems</li> <li>Order of operations</li> <li>Use estimation to check</li> </ul>	<ul> <li>Equivalent fractions and simplifying</li> <li>Improper and Mixed Fractions</li> <li>Equivalent fractions on a number line</li> <li>Compare and order (denominator)</li> <li>Compare and order (numerator)</li> <li>Add and subtract simple fractions</li> <li>Add and subtract any two fractions</li> <li>Understanding improper numbers</li> <li>Understanding mixed Numbers</li> </ul>	<ul> <li>Add mixed numbers</li> <li>Subtract mixed numbers</li> <li>Multiply fractions by integers</li> <li>Divide a fraction by an integer</li> <li>Fraction of an amount</li> <li>Fraction of an amount – find the whole</li> </ul>	<ul> <li>Metric measures</li> <li>Convert metric measures</li> <li>Calculate with metric measures</li> <li>Miles and kilometres</li> <li>Imperial measures</li> </ul>

## Spring Term

	Decimals (2 Weeks)	Fractions, Decimals and Percentages (3 week)	Shape (2 weeks)	Measures, Area, Perimeter, Volume (3 weeks)	Position and Direction (1 weeks)	Statistics (1 week)
Year 5	<ul> <li>Decimals up to 2 decimal places</li> <li>Equivalent fractions and decimals (tenths)</li> <li>Equivalent fractions and decimals (hundredths)</li> <li>Thousandths as decimals</li> <li>Order decimals up to 3 places</li> <li>Begin to add and subtract decimals</li> <li>Begin to multiply decimals</li> <li>Round decimals to the nearest whole number or 1 decimal place</li> <li>Solving problems</li> </ul>	<ul> <li>Multiply by 10, 100</li> <li>Divide by 10, 100</li> <li>Understand         percentages</li> <li>Percentages as fractions</li> <li>Percentages as decimals</li> <li>Equivalent fractions,         decimals and         percentages</li> <li>Order fractions,         decimals and         percentages</li> <li>Begin to find         percentages of amount         (multiples of 10%)</li> </ul>	<ul> <li>Understand and use degrees</li> <li>Classify angles</li> <li>Measure angles up to 180°</li> <li>Calculate angles around a point</li> <li>Calculate angles on a straight line</li> <li>Draw lines and angles accurately</li> <li>Regular and irregular polygons</li> <li>3-D shapes</li> <li>Find missing lengths and angles</li> </ul>	<ul> <li>Recap on metric measures</li> <li>Perimeter of rectangles</li> <li>Perimeter of rectilinear shapes</li> <li>Perimeter of polygons</li> <li>Area of rectangles</li> <li>Area of irregular shapes</li> <li>Cubic Centimetres</li> <li>Compare Volume</li> <li>Estimate volume</li> <li>Solve problems</li> </ul>	<ul> <li>Read and plot coordinates in first quadrant</li> <li>Translation with coordinates</li> <li>Lines of symmetry</li> <li>Reflection in horizontal and vertical lines</li> <li>Solve problems with coordinates</li> </ul>	<ul> <li>Recap on all graph types</li> <li>Draw line graphs</li> <li>Read and interpret line graphs</li> <li>Read and interpret tables</li> <li>Solve problems linked to statistics – selecting key information</li> </ul>
Year 6	<ul> <li>Place value within 1 including thousandths</li> <li>Compare and order decimals up to 3dp</li> <li>Place value – integers and decimals</li> <li>Round decimals</li> <li>Add and subtract decimals</li> <li>Multiply and divide decimals in context</li> <li>Divide decimals by integers</li> <li>Solve problems</li> </ul>	<ul> <li>Multiply by 10, 100 and 1,000</li> <li>Divide by 10, 100 and 1,000</li> <li>Decimal and fraction equivalents</li> <li>Fractions as division</li> <li>Understand percentages</li> <li>Fractions to percentages</li> <li>Equivalent fractions, decimals and percentages</li> <li>Order fractions, decimals and percentages</li> <li>Percentage of an amount – one step</li> <li>Percentages – missing values</li> </ul>	<ul> <li>Measure and classify angles</li> <li>Calculate angles</li> <li>Vertically opposite angles</li> <li>Angles in a triangle – missing angles</li> <li>Angles in a quadrilateral</li> <li>Circles – radius and diameter</li> <li>Draw shapes accurately</li> <li>Nets of 3-D shapes</li> </ul>	<ul> <li>Recap on metric measures converting</li> <li>Shapes – same area</li> <li>Area and perimeter</li> <li>Area of a triangle – counting squares</li> <li>Area of any triangle</li> <li>Area of a right-angled triangle</li> <li>Area of a parallelogram</li> <li>Volume – counting cubes</li> <li>Volume of a cuboid</li> </ul>	<ul> <li>The first quadrant</li> <li>Read and plot points in four quadrants</li> <li>Solve problems with coordinates</li> <li>Translations</li> <li>Reflections</li> </ul>	<ul> <li>Line graphs</li> <li>Dual bar charts</li> <li>Read and interpret pie charts</li> <li>Pie charts with percentages</li> <li>Draw pie charts</li> <li>The mean</li> </ul>

## Summer Term

	Ratio and (3 days)	Algebra (3 days)	Revision (9 days)	SATS Week	Problem solving using four operations (1 weeks)	Position and Direction (1 week)	Consolidation of Measures (including time) (2 weeks)	Consolidation of Fractions, Decimals and percentage (2 weeks)	Consolidation (2-3 weeks)
Year 5 Year 6	<ul> <li>Ratio and fractions</li> <li>Scale drawing</li> <li>Ratio and proportion problems</li> <li>Recipes</li> <li>Unequal sharing and grouping using knowledge of fractions and multiples</li> </ul>	missing number	<ul> <li>Revision of Key skills and areas needed for development</li> <li>Problem Solving</li> <li>Arithmetic revision</li> </ul>		Thematic – linked with topic	Thematic – linked with topic	Timetables and time Metric measure investigations	Key skills in preparation for next year	