Mathematics Scheme of Work

| Unit | Hours | Learning | Essential knowledge |
| :---: | :---: | :---: | :---: |
| Autumn 1 |  | - |  |
| Numbers and the number system | 8 | - Identify multiples and factors of a number <br> - Count forwards and backwards through zero <br> - Round to one decimal place <br> - Use columnar addition and subtraction with numbers of any size <br> - Multiply a three- or four-digit number by a two-digit number using long multiplication <br> - Divide numbers up to four-digits by a single-digit number using short division and interpret the remainder <br> - Add and subtract fractions with denominators that are multiples of the same number <br> - Write decimals as fractions <br> - Understand that per cent relates to number of parts per hundred <br> - Convert between adjacent metric units of measure for length, capacity and mass <br> - Measure and draw angles <br> - Calculate the area of rectangles <br> - Distinguish between regular and irregular polygons | - Know the place value headings up to millions <br> - Recall primes to 19 <br> - Know the first 12 square numbers <br> - Know the Roman numerals I, V, X, L, C, D, M <br> - Know the \% symbol <br> - Know percentage and decimal equivalents for $1 / 2,1 / 4,1 / 5,2 / 5,4 / 5$ <br> - Know rough conversions between metric and Imperial units <br> - Know that angles are measured in degrees <br> - Know angles in one whole turn total $360^{\circ}$ <br> - Know angles in half a turn total $180^{\circ}$ <br> - Know that area of a rectangle $=$ length $\times$ width |
| Counting and comparing | 8 |  |  |
| Calculating: addition and subtraction | 8 |  |  |
| End of term test |  |  |  |
| Autumn 2 |  |  |  |
| Calculating: multiplication and division | 12 |  |  |
| Presentation of data | 8 |  |  |
| Investigating properties of shapes | 4 |  |  |
| End of term test |  |  |  |
| Spring 1 |  |  |  |
| Visualising and constructing | 4 |  |  |
| Exploring time | 4 |  |  |
| Exploring fractions, decimals and percentages | 12 |  |  |
| End of term test |  |  |  |
| Spring 2 |  |  |  |
| Patterns | 4 |  |  |
| Measuring space | 8 |  |  |
| Investigating angles | 8 |  |  |
| End of term test |  |  |  |
| Summer |  |  |  |
| Calculating fractions, decimals and percentages | 12 |  |  |
| Calculating space | 8 |  |  |
| Checking, approximating and estimating | 4 |  |  |
| Mathematical movement | 8 |  |  |
| End of year test |  |  |  |

