

## FOUNDATION MODULE 3 PROGRESS SHEET

### **CHAPTER 1: INTEGERS**

GRADE	I AM ABLE TO	R	A	G
<b>G</b>	<ul style="list-style-type: none"><li>• Understand positive and negative integers</li><li>• Find the factors of a number</li></ul>			
<b>F</b>	<ul style="list-style-type: none"><li>• Add and subtract negative integers</li></ul>			
<b>E</b>	<ul style="list-style-type: none"><li>• Multiply and divide negative integers</li></ul>			
<b>C</b>	<ul style="list-style-type: none"><li>• Recognise prime numbers</li><li>• Find the reciprocal of a number</li><li>• Find the least common multiple (LCM) of two simple numbers</li><li>• Find the highest common factor (HCF) of two simple numbers</li><li>• Write a number as a product of prime factors</li></ul>			

### **CHAPTER 2 : ROUNDING**

GRADE	I AM ABLE TO	R	A	G
<b>G</b>	<ul style="list-style-type: none"><li>• Round to the nearest integer</li><li>• Write an integer to the nearest 10 or the nearest 100</li><li>• Estimate answers to problems involving decimals</li></ul>			
<b>F</b>	<ul style="list-style-type: none"><li>• Estimate square roots</li><li>• Round numbers to given powers of 10 and to a given number of decimal places</li></ul>			
<b>E</b>	<ul style="list-style-type: none"><li>• Round a number to one significant figure</li></ul>			
<b>D</b>	<ul style="list-style-type: none"><li>• Estimate answers to calculations such as <math display="block">\frac{22.6 \times 18.7}{5.2}</math></li></ul>			
<b>C</b>	<ul style="list-style-type: none"><li>• Estimate answers to calculations such as <math display="block">\frac{22.6 \times 18.7}{0.52}</math></li><li>• Find minimum and maximum values</li></ul>			

### CHAPTER 3 : DECIMALS

GRADE	I AM ABLE TO	R	A	G
<b>F</b>	<ul style="list-style-type: none"> <li>Write down the place value of a digit such as the value of the 4 in the 0.24</li> <li>Order decimals, for eg, which is bigger, 0.24 or 0.3?</li> </ul>			
<b>E</b>	<ul style="list-style-type: none"> <li>Add and subtract decimals</li> </ul>			
<b>D</b>	<ul style="list-style-type: none"> <li>Multiply two decimals such as <math>2.4 \times 0.7</math></li> <li>Convert decimals to fractions and fractions to decimals</li> </ul>			
<b>C</b>	<ul style="list-style-type: none"> <li>Divide a number such as <math>1 \div 0.2</math> and <math>2.8 \div 0.07</math></li> </ul>			

### CHAPTER 4 : FRACTIONS

GRADE	I AM ABLE TO	R	A	G
<b>G</b>	<ul style="list-style-type: none"> <li>Find equivalent fractions</li> </ul>			
<b>F</b>	<ul style="list-style-type: none"> <li>Simplify fractions, such as <math>\frac{24}{36}</math></li> <li>Arrange fractions in order of size</li> </ul>			
<b>E</b>	<ul style="list-style-type: none"> <li>Work out fractions of quantities, such as <math>\frac{5}{8}</math> of £20</li> <li>Find one number as a fraction of another</li> <li>Do calculations with simple fractions involving addition and multiplication</li> <li>Convert fractions such as <math>\frac{3}{8}</math> to decimals</li> </ul>			
<b>D</b>	<ul style="list-style-type: none"> <li>Do calculations with simple fractions involving subtraction</li> </ul>			
<b>C</b>	<ul style="list-style-type: none"> <li>Do calculations with simple fractions involving division</li> <li>Do calculations with mixed numbers</li> </ul>			

### CHAPTER 5 : INDICES

GRADE	I AM ABLE TO	R	A	G
<b>F</b>	<ul style="list-style-type: none"> <li>Calculate squares and square roots (with and without the use of a calculator)</li> </ul>			
<b>E</b>	<ul style="list-style-type: none"> <li>Calculate cubes and cube roots (with and without the use of a calculator)</li> <li>Use function keys on a calculator for powers and roots</li> </ul>			
<b>D</b>	<ul style="list-style-type: none"> <li>Use the terms square, positive square root, negative square root, cube and cube root</li> <li>Recall integer squares from 2 x 2 to 15 x 15 and the corresponding square roots</li> <li>Recall the cubes of 2, 3, 4, 5 and 10</li> </ul>			
<b>C</b>	<ul style="list-style-type: none"> <li>Use index notation and index laws for positive and negative powers such as <math>w^3 \times w^5</math> and <math>\frac{w^3}{w^7}</math></li> </ul>			

### CHAPTER 6 : PERCENTAGES

GRADE	I AM ABLE TO	R	A	G
<b>F</b>	<ul style="list-style-type: none"> <li>Understand that percentage means out of 100</li> <li>Change a percentage to a fraction or a decimal and vice versa</li> </ul>			
<b>E</b>	<ul style="list-style-type: none"> <li>Compare percentages, fractions and decimals</li> <li>Work out a percentage of a given quantity</li> <li>Calculate simple interest</li> </ul>			
<b>D</b>	<ul style="list-style-type: none"> <li>Increase or decrease a quantity by a given percentage</li> <li>Express one quantity as a percentage of another</li> </ul>			
<b>C</b>	<ul style="list-style-type: none"> <li>Work out a percentage increase or decrease</li> </ul>			

### CHAPTER 7 : RATIO AND PROPORTION

GRADE	I AM ABLE TO	R	A	G
<b>D</b>	<ul style="list-style-type: none"> <li>Solve simple ratio and proportion problems, such as finding the ratio of teachers to students in a school</li> </ul>			
<b>C</b>	<ul style="list-style-type: none"> <li>Solve more complex ratio and proportion problems, such as sharing out money between two groups in the ratio of their numbers</li> <li>Solve ratio and proportion problems using the unitary method</li> </ul>			