

National Curriculum Year 3	Ready to Progress	White Rose Workbook & Step	Curriculum Prioritisation	NCETM Spine
Number & Place Value				
Counting				
2.1a count from 0 in multiples of 4, 8, 50 and 100; find 10 or 100 more or less than a given number		Autumn 1 Place value 14 Count in 50s		
Represent				
2.1d identify, represent and estimate numbers using different representations		1 Represent numbers to 100 2 Partition numbers to 100 3 Number line to 100 4 Hundreds		
	3NPV-1 Know that 10 tens are equivalent to 1 hundred, and that 100 is 10 times the size of 10; apply this to identify and work out how many 10s there are in other three-digit multiples of 10	5 Represent numbers to 1,000 6 Partition numbers to 1,000 7 Flexible partitioning of numbers to 1,000 8 Hundreds, tens and ones		
2.1e read and write numbers up to 1,000 in numerals and in words				
Use Place Value & Compare				
2.1b recognise the place value of each digit in a 3-digit number (100s, 10s, 1s)	3NPV-2 Recognise the place value of each digit in three-digit numbers, and compose and decompose three-digit numbers using standard and non-standard partitioning	9 Find 1, 10 or 100 more or less 10 Number line to 1,000 11 Estimate on a number line to 1,000 12 Compare numbers to 1,000 13 Order numbers to 1,000	Unit 2 Numbers to 1,000	1.17 Composition and calculation: 100 and bridging 100 1.18 Composition and calculation: three-digit numbers
	3NPV-3 Reason about the location of any three-digit number in the linear number system, including identifying the previous and next multiple of 100 and 10. 3NPV-4 Divide 100 into 2, 4, 5 and 10 equal parts, and read scales/number lines marked in multiples of 100 with 2, 4, 5 and 10 equal parts			
2.1c compare and order numbers up to 1,000				
Problem solving & Rounding				
2.1f solve number problems and practical problems involving these ideas.			Unit 1 Adding and subtracting across 10	
Addition and subtraction				
Recall, Represent, Use				
2.2c estimate the answer to a calculation and use inverse operations to check answers		Autumn 2 Addition & subtraction		1.11 Addition and subtraction: bridging 10
Calculations				
2.2a add and subtract numbers mentally, including: a three-digit number and 1s a three-digit number and 10s a three-digit number and 100s	3NF-1 Secure fluency in addition and subtraction facts that bridge 10, through continued practice.	Autumn 2 Addition & subtraction 1 Apply number bonds within 10 2 Add and subtract 1s 3 Add and subtract 10s 4 Add and subtract 100s 5 Spot the pattern		

		6 Add 1s across a 10 7 Add 10s across a 100 8 Subtract 1s across a 10		
2.2b add and subtract numbers with up to 3 digits, using formal written methods of columnar addition and subtraction	3AS-1 Calculate complements to 100. 3AS-2 Add and subtract up to three-digit numbers using columnar methods.	9 Subtract 10s across a 100 10 Make connections 11 Add two numbers (no exchange) 12 Subtract two numbers (no exchange) 13 Add two numbers (across a 10) 14 Add two numbers (across a 100) 15 Subtract two numbers (across a 10) 16 Subtract two numbers (across a 100)	Unit 5 Column addition Unit 6 Column subtraction	1.20 Algorithms: column addition 1.21 Algorithms: column subtraction
Problem solving				
2.2e solve problems, including missing number problems, using number facts, place value, and more complex addition and subtraction.	3AS-3 Manipulate the additive relationship: Understand the inverse relationship between addition and subtraction, and how both relate to the part-part-whole structure. Understand and use the commutative property of addition and understand the related property for subtraction.	17 Add 2-digit and 3-digit numbers 18 Subtract a 2-digit number from a 3-digit number 19 Complements to 100 20 Estimate answers 21 Inverse operations 22 Make decisions		
Multiplication and Division				
Recall, Represent, Use				
2.3a recall and use multiplication and division facts for the 3, 4 and 8 multiplication tables	3NF-2 Recall multiplication facts, and corresponding division facts, in the 10, 5, 2, 4 and 8 multiplication tables, and recognise products in these multiplication tables as multiples of the corresponding number. 3NF-3 Apply place-value knowledge to known additive and multiplicative number facts (scaling facts by 10). 3MD-1 Apply known multiplication and division facts to solve contextual problems with different structures, including quotative and partitive division.	Autumn 3 Multiplication & division A 1 Multiplication – equal groups 2 Use arrays 3 Multiples of 2 4 Multiples of 5 and 10 5 Sharing and grouping 6 – 8 The 3 times-table 9 - 11 The 4 times-table 12 - 14 The 8 times-table 15 The 2, 4 and 8 times-tables	Unit 6 - 2, 4, 8 times table	2.7 Times tables: 2, 4 and 8 and the relationship between them
Calculations				
2.3b write and calculate mathematical statements for multiplication and division using the multiplication tables that they know, including for two-digit numbers times by one-digit numbers, using mental and progressing to formal written methods		Spring 1 Multiplication & division B 1 Multiples of 10 2 Related calculations 3 Reasoning about multiplication 4 Multiply a 2-digit number by a 1-digit number – no exchange 5 Multiply a 2-digit number by a 1-digit number – with exchange 6 Link multiplication and division 7 Divide a 2-digit number by a 1-digit number – no exchange 8 Divide a 2-digit number by a 1-digit number – flexible partitioning		
Solve Problems				
2.3c solve problems, including missing number problems, involving multiplication and division, including positive integer scaling problems and correspondence problems in which n objects are connected to m objects.		9 Divide a 2-digit number by a 1-digit number – with remainders 10 Scaling 11 How many ways?		

Fractions (including decimals & percentages)				
Recognise and Write				
2.4a count up and down in tenths ; recognise that tenths arise from dividing an object into 10 equal parts and in dividing one-digit numbers or quantities by 10	3F-1 Interpret and write proper fractions to represent 1 or several parts of a whole that is divided into equal parts.	Spring 3 Fractions A 1 Understand the denominators of unit fractions 2 Compare and order unit fractions 3 Understand the numerators of non-unit fractions 4 Understand the whole	Unit 8 Unit fractions Unit 9 Non-unit fractions	3.1 Preparing for fractions: the part-whole relationship
2.4b recognise, find and write fractions of a discrete set of objects: unit fractions and non-unit fractions with small denominators	3F-2 Find unit fractions of quantities using known division facts (multiplication tables fluency).	Summer 1 Fractions B 4 Unit fractions of a set of objects 5 Non-unit fractions of a set of objects 6 Reasoning with fractions of an amount	Unit 8 Unit fractions Unit 9 Non-unit fractions	
2.4c recognise and use fractions as numbers: unit fractions and non-unit fractions with small denominators			Unit 8 Unit fractions Unit 9 Non-unit fractions	3.2 Unit fractions: identifying, representing and comparing 3.3 Non-unit fractions: identifying, representing and comparing
Comparing fractions				
2.4d recognise and show, using diagrams, equivalent fractions with small denominators		Spring 3 Fractions A 9 Equivalent fractions on a number line 10 Equivalent fractions as bar models		
2.4f compare and order unit fractions, and fractions with the same denominators	3F-3 Reason about the location of any fraction within 1 in the linear number system.	5 Compare and order non-unit fractions 6 Fractions and scales 7 Fractions on a number line 8 Count in fractions on a number line		
Calculations				
2.4e add and subtract fractions with the same denominator within one whole	3F-4 Add and subtract fractions with the same denominator, within 1	Summer 1 Fractions B 1 Add fractions 2 Subtract fractions 3 Partition the whole	Unit 8 Unit fractions Unit 9 Non-unit fractions	3.4 Adding and subtracting within one whole
Solve Problems				
2.4g solve problems that involve all of the above.				
Measurement				
Using Measures				
3.1a measure, compare, add and subtract: mass (kg/g); volume/capacity (l/ml)		Spring 4 Capacity & temperature 1 Use scales 2 Measure mass in grams 3 Measure mass in kilograms and grams 4 Equivalent masses (kg and grams) 5 Compare mass 6 Add and subtract mass		
3.1a measure, compare, add and subtract: capacity (l/ml)		7 Measure capacity and volume in ml 8 Measure capacity and volume in l and ml 9 Equivalent capacities and volumes 10 Compare capacity and volume 11 Add and subtract capacity and volume		
3.1a measure, compare, add and subtract: lengths (m/cm/mm);		Spring 2 Length & perimeter 1 Measure in metres and centimetres 2 Measure in millimetres 3 Measure in centimetres and millimetres 4 Metres, centimetres, and millimetres		

		5 Equivalent lengths (m and cm) 6 Equivalent lengths (cm and mm) 7 Compare lengths 8 Add lengths 9 Subtract lengths		
Money				
3.1c add and subtract amounts of money to give change, using both £ and p in practical contexts	3AS-1 Calculate complements to 100. 3AS-2 Add and subtract up to three-digit numbers using columnar methods.	Summer 2 Money 1 Pounds and pence 2 Convert pounds and pence 3 Add money 4 Subtract money 5 Find change		
Time				
3.1d tell and write the time from an analogue clock , including using Roman numerals from I to XII, and 12-hour and 24-hour clocks		Summer 3 Time 1 Roman numerals to 12 2 Tell the time to 5 minutes 3 Tell the time to the minute 4 Read time on a digital clock	Unit 11 Time	
3.1e estimate and read time with increasing accuracy to the nearest minute ; record and compare time in terms of seconds, minutes and hours; use vocabulary such as o'clock, am/pm, morning, afternoon, noon and midnight		5 Use am and pm 6 Years, months and days 7 Days and hours 8 Hours and minutes – use start and end times 9 Hours and minutes - use durations		
3.1f know the number of seconds in a minute and the number of days in each month, year and leap year		10 Minutes and seconds 11 Units of time		
3.1g compare durations of events		12 Solve problems with time		
Perimeter, Area, Volume				
3.1b measure the perimeter of simple 2-D shapes		Spring 2 Length & perimeter 10 What is perimeter? 11 Measure perimeter 12 Calculate perimeter		
Geometry				
2-D Shapes				
3.2a draw 2-D shapes ...	3G-2 Draw polygons by joining marked points, and identify parallel and perpendicular sides.	Summer 4 Shape 7 Recognise and describe 2-D shapes 8 Draw polygons	Unit 10 Parallel & perpendicular sides in polygons	
3-D Shapes				
3.2a ... make 3-D shapes using modelling materials; recognise 3-D shapes in different orientations and describe them		Summer 4 Shape 9 Recognise and describe 3-D shapes 10 Make 3-D shapes		
Angles and Lines				
3.2b recognise angles as a property of shape or a description of a turn		Summer 4 Shape 1 Turns and angles		
3.2c identify right angles , recognise that 2 right angles make a half-turn, 3 make three quarters of a turn and 4 a complete turn; identify whether angles are greater than or less than a right angle	3G-1 Recognise right angles as a property of shape or a description of a turn and identify right angles in 2D shapes presented in different orientations.	Summer 4 Shape 2 Right angles 3 Compare angles 4 Measure and draw accurately	Unit 3 Right angles	
3.2d identify horizontal and vertical lines and pairs of perpendicular and parallel lines.	3G-2 Draw polygons by joining marked points, and identify parallel and perpendicular sides.	Summer 4 Shape 5 Horizontal and vertical 6 Parallel and perpendicular	Unit 10 Parallel & perpendicular sides in polygons	

Statistics				
Present and Interpret				
4.1a interpret and present data using bar charts, pictograms and tables		Summer 5 Statistics 1 Interpret pictograms 2 Draw pictograms 3 Interpret bar charts 4 Draw bar charts		
Solve Problems				
4.1b solve one-step and two-step questions using information presented in scaled bar charts and pictograms and tables.		Summer 5 Statistics 5 Collect and represent data 6 Two-way tables		