

Year 3 Maths Overview

Term 1	Block 1 Place Value (4 Weeks)	NSM – Make 10 and then	Block 2 Addition and Subtraction (5 Weeks)	NSM - calculating	Block 3 Multiplication and Division (4 Weeks)	NSM – strategy selection Fractions
	Wider Curriculum					
Term 2	Block 4 Fractions (5 Weeks)	NSM - Doubles Length	Block 5 Length and Perimeter (2 Weeks)	NSM – 2 x tables Mass and Capacity	Block 6 Mass and Capacity (4 Weeks)	NSM – 2 x tables & square times tables Angles
	Block 7 Four operations application	NSM – square tables Line and Shape				
Wider Curriculum						
Term 3	Block 8 Shape (3 weeks)	NSM – 5 x table Money	Block 9 Money (3 Weeks)	NSM – 5 x table Time	Block 10 Time (2 Weeks)	NSM – 3 x table Revisit based on AfL
	Block 11 AfL (from assessment)					
NSM – 4 x table Revisit based on AfL						
Wider Curriculum						

NB. There will be an assessment week within each term as well.

Declarative knowledge – highlight is new knowledge that year

Year 3: Block 1 (Place Value)

Declarative Knowledge

Make ten and then: Addition

Make ten and then: subtraction

More doubles and Near doubles

Adjusting

Count in 50's

Count in 100's

Place Value Objectives (Small Steps)

- 1) Represent and Partition numbers to 100
- 2) Number line to 100
- 3) Represent and partition numbers to 1000
- 4) Hundreds, tens and ones
- 5) Find 1, 10 or 100 more or less
- 6) Estimate on a number line to 1000
- 7) Compare and Order numbers to 1000
- 8) Reasoning and problem solving within place value (1 week)**

Links to Wider Curriculum

Year 3: Block 2 (Addition and Subtraction)

Declarative Knowledge

Make ten and then: Subtraction Part 2

Strategy selection

Calculating with multiples of 10

Calculating with ones

Calculating with tens

Make the next 10 and then make the previous 10

Addition and Subtraction Objectives

- 1) Add two numbers (no exchange)
- 2) Add two numbers (across a 10)
- 3) Add two numbers (across a 100)
- 4) Add two and three digit numbers
- 5) Subtract two numbers (no exchange)
- 6) Subtract two numbers (across a 10)
- 7) Subtract two numbers (across a 100)
- 8) Subtract a two digit number from a three digit number
- 9) Inverse operations
- 10) Reasoning and problem solving within addition and subtraction (1 week)

Links to Wider Curriculum

Year 3: Block 3 (Multiplication and Division)

Declarative Knowledge

Strategy selection

A fraction is an equal part of a whole

I know that a numerator shows how many parts of the whole are needed

I know that a denominator is how many equal parts are in the whole

A unit fraction is a fraction where the numerator is 1

A non-unit fraction is a fraction where the numerator is greater than 1

Equivalent fractions are 2 or more fractions that are all equal even though they have different numerators and denominators

Multiplication and Division Objectives

- 1) Multiplication – equal groups and arrays
- 2) Sharing and grouping
- 3) Multiples of 10 & Related calculations
- 4) Multiply a 2-digit number by a 1-digit number – no exchange
- 5) Multiply a 2-digit numbers with 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 – with remainders.
- 9) Reasoning and problem solving within multiplication and division inc. Scaling (1 week)

Links to Wider Curriculum

Year 3: Block 4 (Fractions)

Declarative Knowledge

Doubles

I know that there are 10mm in 1cm.

I know that there are 100cm in 1m.

I know that perimeter is the total distance around a 2D shape

Fractions Objectives

- 1) Understand the denominators of unit fractions.
- 2) Compare and order unit fractions
- 3) Understand the numerator of non-unit fractions
- 4) Understand the whole
- 5) Compare and order non-unit fractions
- 6) Fractions on a number line
- 7) Count in fractions on a number line
- 8) Equivalent fractions on a number line
- 9) Add & Subtract fractions including partition the whole
- 10) Unit fractions of a set of objects
- 11) Non-unit fractions of a set of objects
- 12) Reasoning and problem solving within fractions (1 week)

Links to Wider Curriculum

Year 3: Block 5 (Length and Perimeter)

Declarative Knowledge

2 times tables (8 facts)

Capacity is the total amount of fluid that can be contained in a container.

Capacity can be measured in millilitres or litres.

I know that 1000 millilitres is equal to 1 litre.

Mass is the measure of an amount of matter in a substance or object.

Mass can be measured in grams or kilograms.

I know that 1000 grams are equal to 1 kilogram.

Length and Perimeter Objectives

- 1) Metres, centimetres, millimetres
- 2) Equivalent lengths (m and cm)
- 3) Equivalent lengths (cm and mm)
- 4) Add and subtract lengths
- 5) Calculate perimeter
- 6) Measure perimeter (measure in millimetres and centimetres)

*Reasoning and problem solving covered following next block.

Links to Wider Curriculum

Year 3: Block 6 (Mass and Capacity)

Declarative Knowledge

2 times tables (8 facts)

Square times table (7 new facts)

I know that angles are created when two straight lines meet at a point or intersect.

I know that an acute angle is less than 90° .

I know that a right angle is 90° .

I know that an obtuse angle is an angle more than 90° but less than 180° .

Mass and Capacity Objectives

- 1) Use/understand Scales
- 2) Reading scales with grams and grams and kilograms
- 3) Compare mass
- 4) Add and subtract mass
- 5) Reading scales with volume in millilitres and litres
- 6) Compare Capacity and volume
- 7) Add and subtract capacity and volume
- 8) Reasoning and problem solving within length, perimeter, mass and capacity (1 week)

Links to Wider Curriculum

Year 3: Block 7 (Four Operations Revisit)

Declarative Knowledge

Square times tables (7 new facts)

I know that a horizontal line is parallel to the horizon.

I know that a vertical line is at right angles to the horizon.

I know that a parallel line is the same distance apart from another line.

I know that a perpendicular line is at right angle to another line or another object.

A 2D shape has 2 dimensions e.g. height and width

I know the properties of all 2D shapes up to an octagon (names, vertices and sides)

A regular polygon has equal sides and vertices.

An irregular polygon does not have equal sides and vertices.

A polygon is a flat 2D shape, with straight sides that is fully closed.

A 3D shape has 3 dimensions e.g. height, width and depth.

I know the properties of a range of 3D shapes (names, vertices, edges and faces)

A prism is a solid shape that is bound by all of its sides by flat faces.

A prism has identical bases at the top and bottom which is what it is named after.

A pyramid has one flat polygon face and all other faces are triangles that meet at a point.

Four Operations Revisit Objectives

Either;

Re-teaching following assessment analysis

Or;

Opportunity to apply within broader curriculum

Links to Wider Curriculum

Year 3: Block 8 (Shape)

Declarative Knowledge

5 times tables (6 new facts)

I know that there is 100 pence in £1

I know that different coins and notes represent different amounts of money (e.g. Coins - 1p, 2p, 5p, 10p, 20p, 50p, £1, £2. Notes - £5, £10, £20, £50)

I know that change can be given when paying for items in shops.

Shape Objectives

- 1) Recognise and describe 2D shapes (names, sides, vertices)
- 2) Recognise and describe 2D shapes (horizontal, vertical, perpendicular, parallel)
- 3) Recognise and describe 3D shapes (faces, edges, vertices)
- 4) Right angles (focused on turns)
- 5) Compare angles
- 6) Reasoning and problem solving within shape (1 week)

Links to Wider Curriculum

Year 3: Block 9 (Money)

Declarative Knowledge

5 times tables (6 new facts)

A minute is composed of 60 seconds

An hour is composed of 60 minutes

There are 24 hours in a day.

I know that AM is before midday

I know that PM is after midday

I know that an analogue clock has moving hands

I know that a digital clock displays numerals digitally

I know that there are 7 days in a week.

I know that there are 365 days in a year.

I know that there are 366 days in a leap year.

I know that there are 52 weeks in a year.

I know that there are 12 months in a year.

I know that there are 31 days in January, March, May, July, August, October and December.

I know that there are 30 days in April, June, September and November.

I know that there are either 28 or 29 days in February.

Money Objectives

- 1) Counting and representing pounds and pence
- 2) Convert pounds and pence
- 3) Add money
- 4) Subtract money
- 5) Reasoning and problem solving within money including 'giving change' (1 week)

Links to Wider Curriculum

Year 3: Block 10 (Time)

Declarative Knowledge

3 times tables (5 new facts)

Time Objectives

- 1) Telling the time to 5 minutes
- 2) Telling the time to nearest minute
- 3) Read time on a digital clock
- 4) Hours and minutes (start/end times & durations)
- 5) Reasoning and problem solving within time

Links to Wider Curriculum

Year 3: Block 11 – Based on assessment

Declarative Knowledge

4 times tables (4 new facts)

Objectives

Either;

Re-teaching following assessment analysis

Or;

Opportunity to apply within broader curriculum

Links to Wider Curriculum

Maths Objectives to be covered in the wider curriculum

The below objectives need to be taught or revisited at some point in the year through the Year 3 broader curriculum.

Teach

- Draw polygons (Art)
- Practical measuring (of all measures)
- Roman numerals (History) FROM YEAR 4
- Interpret and present data using bar charts, pictograms and tables

Revisit

- Money (enterprise project/DT)
- Time durations (science)
- Four operations (throughout)