Maths

Curriculum Overview

Foundation Stage 1

Oneness of One
Subitise amounts to 3
Recite number past 5
Explore and talk about 2D shapes
Talk about and create patterns

Learning objective	Birth to 3 – Development Matters links	3–4 years – Development Matters links
Oneness of One	React to changes of amount in a group of up to three items; take part in finger rhymes with numbers; develop counting-like behaviour such as saying some numbers in sequence.	Say one number for each item in order; know that the last number reached when counting tells you how many there are (cardinal principle).
Subitise amounts to 3	React to changes in small quantities up to three; notice differences in amounts without counting.	Develop fast recognition of up to 3 objects without counting individually (subitising).
Recite number past 5	Develop counting-like behaviour, including making sounds or saying some number names in sequence during play.	Recite numbers past 5; say one number for each item when counting a small set of objects.
Explore and talk about 2D shapes	Build with a range of resources; complete inset puzzles; compare sizes using language such as big, small, tall; notice shape in the environment.	Talk about and explore 2D and 3D shapes using informal and mathematical language such as sides and corners; select shapes appropriately; combine shapes to make new ones.
Talk about and create patterns	Notice patterns and arrange things in patterns; begin to make simple repeating sequences through play.	Talk about and identify patterns in the environment; extend and create ABAB patterns; notice and correct errors in a repeating pattern.

Number & Counting

one, same, more, fewer, number, count, how many, next, again

Subitising

subitise, quick look, spot, how many, one, two, three

Shape

shape, circle, square, triangle, sides, corners, flat, round, straight

Pattern

pattern, same, different, repeat, next, again, sequence

Twoness of Two
Threeness of Three
Say one number for each item in order.
Know that the last number when counting is the total
Understand positional language

Learning objective	Birth to 3 – Development Matters links	3–4 years – Development Matters links
Twoness of Two	React to changes of amount in small groups up to three; compare amounts using informal language such as *more*, *same*.	Say one number for each item in order; show 'finger numbers' up to 5; know that the last number reached tells how many there are.
Threeness of Three	React to changes in a group of up to three items; notice small quantities during play without formal counting.	Develop fast recognition of up to 3 objects (subitising); link numerals and amounts up to 5.
Say one number for each item in order	Develop counting-like behaviour such as pointing, touching or saying some numbers in sequence during play.	Say one number for each item in order when counting small sets; show understanding of one-to-one correspondence.
Know that the last number when counting is the total	React to changes in amount; begin to notice when something has more or fewer items.	Know that the last number reached when counting a small set of objects tells you how many there are altogether (cardinal principle).
Understand positional language	Explore objects and space through play; put objects inside, on, under and take them out again; begin to use positional words alongside gestures.	Understand position through words alone (e.g. *under*, *behind*); describe a familiar route; use positional language accurately in play and discussion.

Number & Cardinality

one, two, three, number, count, how many, total, altogether

One-to-one correspondence

each, one each, match, touch and count, same number

Position & Space

in, on, under, next to, behind, in front of, inside, outside, between

Fourness of Four
Show ‘finger numbers’ to 5
Link numeral and amount to 5
Talk about and explore 3D shapes

Learning objective	Birth to 3 – Development Matters links	3–4 years – Development Matters links
Fourness of Four	React to changes of amount in small groups up to three; notice differences in quantity during play; compare amounts using informal language such as *more* and *same*.	Say one number for each item in order; know that the last number reached when counting tells how many there are; begin to explore numbers beyond three through practical play.
Show ‘finger numbers’ to 5	Take part in finger rhymes with numbers; show awareness of number through gesture and action.	Show ‘finger numbers’ up to 5; use fingers to represent quantities when counting and solving simple problems.
Link numeral and amount to 5	Experiment with marks and symbols during play; explore objects and begin to notice differences in quantity.	Link numerals and amounts up to 5, for example matching numerals to a set of objects; experiment with own marks and symbols as well as numerals.
Talk about and explore 3D shapes	Build with a range of resources; handle and explore objects; notice shape and space through play and problem solving.	Talk about and explore 3D shapes using informal and mathematical language; select shapes appropriately; combine shapes to make

Number & Representation

four, five, number, count, how many, total, altogether

Finger Numbers & Numerals

fingers, numeral, match, show, count on fingers

Shape

shape, cube, cuboid, sphere, cone, cylinder, faces, edges, corners

Fiveness of Five
Recognise numerals 1-5
Experiment with their own marks and symbols as well as numerals
Describe a familiar route – including positional language

Learning objective	Birth to 3 – Development Matters links	3–4 years – Development Matters links
Fiveness of Five	React to changes of amount in groups of up to three; compare quantities using informal language such as *more*, *same*; develop counting-like behaviour during play.	Say one number for each item in order; know that the last number reached when counting tells how many there are; solve real-world mathematical problems with numbers up to 5.
Recognise numerals 1–5	Experiment with marks and symbols during play; begin to notice numerals in the environment.	Recognise numerals 1–5; link numerals and amounts up to 5; match numerals to quantities.
Experiment with their own marks and symbols as well as numerals	Make marks using a range of tools; explore meaning through marks and symbols during play.	Experiment with their own symbols and marks as well as numerals; use marks to represent numbers and ideas.
Describe a familiar route – including positional language	Explore space through movement and play; place objects inside, on, under and take them out again; begin to use positional language supported by gesture.	Describe a familiar route; discuss routes and locations using positional language such as *in front of*, *behind*; understand position through words alone.

Number & Recognition

five, number, numeral, count, how many, total, altogether

Marks and Symbols

mark, symbol, write, draw, label, numeral

Position & Direction

in, on, under, next to, behind, in front of, between, route, along

Solve real world mathematical problems using numbers 1-5

Compare objects relating to size, length, weight and capacity

Learning objective	Birth to 3 – Development Matters links	3–4 years – Development Matters links
Solve real-world mathematical problems using numbers 1–5	React to changes of amount in small groups; use counting-like behaviour in everyday play; compare amounts using informal language such as *more* and *same*.	Solve real-world mathematical problems involving numbers up to 5; say one number for each item in order; know that the last number reached tells how many there are.
	Compare sizes, weights and amounts using gesture and language such as *big/little*,	Make comparisons between objects relating to size, length, weight and capacity; use everyday language to

Problem Solving & Number

problem, solve, how many, total, more, fewer, same, altogether

Measurement & Comparison

big, small, bigger, smaller, long, short, heavy, light, full, empty, holds

	Compare objects relating to size, length, weight and capacity	*heavy/light*, *full/empty*; explore objects through hands-on play.	describe and compare quantities and measures.

Compare quantities using language ‘more than’ and ‘fewer than’

Combine shapes to make new ones

Describe a sequence of events

Learning objective	Birth to 3 – Development Matters links	3–4 years – Development Matters links
Compare quantities using language ‘more than’ and ‘fewer than’	React to changes of amount in small groups; compare quantities using informal language such as *more* and *same*.	Compare quantities using language such as *more than* and *fewer than*; say one number for each item in order; know that the last number reached tells how many there are.
Combine shapes to make new ones	Build with a range of resources; explore shape and space through construction and play; fit shapes together experimentally.	Combine shapes to make new ones, for example making an arch or a larger shape; select shapes appropriately during play and construction.
Describe a sequence of events	Experience routines and repeated events; begin to anticipate what comes next in everyday routines and play.	Describe a sequence of events, real or fictional, using language such as *first*, *then* and *next*; talk about what happens before and after.

Comparison

more than, fewer than, same, equal, most, least

Shape

shape, build, join, combine, bigger, smaller

Sequencing

first, next, then, before, after, now

Maths

Curriculum Overview

Foundation Stage 2

Unit	Development Matters			Vocabulary
Match and sort Compare amounts Compare Size, Mass & Capacity Exploring Pattern Representing 1, 2 & 3 Comparing 1, 2 & 3 Composition of 1, 2 & 3	**Learning objective**	**Children in Reception – Development Matters links**	**Early Learning Goals**	**Sorting & Comparing** same, different, match, sort, more, fewer, equal **Measure** big, small, long, short, heavy, light, full, empty **Number & Composition** one, two, three, part, whole, altogether, group **Pattern** pattern, repeat, next, continue, sequence
	Match and sort	Match and sort objects using given criteria; compare objects and make decisions about sorting; notice similarities and differences between objects.	Children sort and organise objects, explaining their choices and reasoning.	
	Compare amounts	Compare quantities using language such as *more*, *fewer* and *same*; begin to reason about which group has more or fewer.	Children compare quantities and numbers, deciding which is greater or smaller and explaining how they know.	
	Compare size, mass and capacity	Make comparisons between objects relating to size, length, mass and capacity; use appropriate vocabulary to describe differences.	Children compare quantities, measures and attributes, using precise mathematical language.	
	Exploring pattern	Explore and create repeating patterns; notice, continue and describe patterns in the environment and in play.	Children explore patterns and relationships and use them to make predictions.	
	Representing 1, 2 and 3	Represent numbers 1, 2 and 3 using objects, fingers, marks and symbols; subitise small quantities.	Children subitise and represent quantities up to at least 5.	
	Comparing 1, 2 and 3	Compare small quantities, saying which has more or fewer; recognise when quantities are equal.	Children compare quantities and numbers, including knowing when quantities are equal.	
	Composition of 1, 2 and 3	Explore the composition of numbers 1, 2 and 3 using objects and images; recognise that numbers are made up of smaller parts.	Children demonstrate understanding of the composition of numbers to at least 5, including how numbers can be partitioned and recombined.	
Circles and triangles Positional Language Representing numbers to 5 One more and less Shapes with 4 sides Time	**Learning objective**	**Children in Reception – Development Matters links**	**Early Learning Goals**	**Shape** circle, triangle, square, rectangle, sides, corners **Position & Direction** in, on, under, next to, behind, in front of, between **Number** one, two, three, four, five, more, less, numeral **Time**
	Circles and triangles	Talk about and explore 2D shapes, including circles and triangles, using mathematical language such as *sides* and *corners*; recognise shapes in the environment.	Children identify, name and describe common 2D shapes and use them in a range of contexts.	
	Positional language	Use positional language to describe where things are in relation to each other; follow and give simple positional instructions.	Children use positional language accurately to describe location, movement and direction.	
	Representing numbers to 5	Represent numbers to 5 using objects, fingers, marks and numerals; subitise small quantities; link numerals to amounts.	Children subitise and represent numbers to at least 5, demonstrating understanding of quantity.	
	One more and one less	Understand the relationship between consecutive numbers; say which number is one more or one less than a given number within 5.	Children understand the one-more-than and one-less-than relationship between numbers.	

	Shapes with 4 sides	Recognise and talk about 2D shapes with 4 sides, including squares and rectangles; notice similarities and differences between shapes.	Children identify and describe properties of 2D shapes, including recognising shapes with 4 sides.	first, next, then, before, after, now, later
	Time	Use everyday language related to time; sequence events; talk about daily routines and order events using *first*, *next* and *then*.	Children use language of time to compare durations, sequence events and describe what happens first, next and last.	
Introducing zero Comparing numbers to 5 Composition of 4 & 5 Compare mass Compare capacity 6, 7 & 8 Making pairs Combining 2 groups	**Learning objective**	**Children in Reception – Development Matters links**	**Early Learning Goals**	**Number & Calculation** zero, one, two, three, four, five, six, seven, eight, more, fewer, equal, altogether **Composition & Grouping** part, whole, combine, group, pair, same **Measure** heavy, light, heavier, lighter, full, empty, holds
	Introducing zero	Understand that zero represents none; recognise zero in everyday contexts; compare zero with other numbers within 5.	Children understand that zero shows no quantity and use it accurately in counting and comparison.	
	Comparing numbers to 5	Compare numbers within 5, deciding which is greater, smaller or equal; explain reasoning using number knowledge.	Children compare numbers and quantities within 5 and justify their thinking.	
	Composition of 4 and 5	Explore the composition of 4 and 5 using objects, fingers and images; partition numbers into smaller groups and recombine them.	Children demonstrate understanding of the composition of numbers to at least 5.	
	Compare mass	Compare objects according to mass using everyday language; explore heavy and light through practical experiences.	Children compare quantities and measures, including mass, using appropriate mathematical language.	
	Compare capacity	Compare containers according to capacity; explore full, half full and empty through play and investigation.	Children compare quantities and measures, including capacity, using appropriate mathematical language.	
	6, 7 and 8	Count, represent and compare numbers 6, 7 and 8; subitise where possible; recognise numerals and link them to quantities.	Children understand number to 10, including composition and comparison.	
	Making pairs	Make pairs of objects; recognise when objects are matched one-to-one; explore sharing equally.	Children explore grouping and sharing, recognising equal groups.	
	Combining 2 groups	Combine two groups of objects and find how many altogether; use practical strategies to support addition.	Children combine groups and begin to use number relationships to solve problems.	
Length & height Time 9 & 10 Comparing numbers to 10 Bonds to 10 3D shape Pattern	**Learning objective**	**Children in Reception – Development Matters links**	**Early Learning Goals**	**Measure** long, short, longer, shorter, tall, taller, height **Time** first, next, then, before, after, quicker,
	Length and height	Compare, describe and order objects according to length and height; use everyday language to talk about longer, shorter, taller and shorter.	Children compare lengths and heights using appropriate mathematical language and explain their reasoning.	
	Time	Use language related to time; sequence events; talk about daily routines and compare durations using words such as *faster* and *slower*.	Children sequence events and use language of time to describe durations and order events.	

	9 and 10	Count, recognise and represent numbers 9 and 10; link numerals to quantities; understand that numbers continue beyond 8.	Children understand numbers to 10, including counting, representation and comparison.	**Number** nine, ten, more, fewer, equal, bond, altogether **Shape & Pattern** cube, cuboid, sphere, cone, pattern, repeat, continue
	Comparing numbers to 10	Compare numbers within 10, deciding which is greater, smaller or equal; explain reasoning using number knowledge.	Children compare numbers within 10 and justify their thinking using mathematical language.	
	Bonds to 10	Explore number bonds to 10 using practical resources; partition numbers and recombine them in different ways.	Children demonstrate fluency with number bonds to 10 and use them in problem solving.	
	3D shape	Talk about and explore 3D shapes using everyday and mathematical language; recognise 3D shapes in the environment.	Children identify, name and describe properties of common 3D shapes.	
	Pattern	Explore, copy and create repeating patterns; notice and describe patterns in the environment and in play.	Children explore patterns and relationships, notice structures and use them to make predictions.	
Building numbers beyond 10 Counting patterns beyond 10 Spatial reasoning (1) Match, rotate, manipulate Adding more Taking away	**Learning objective**	**Children in Reception – Development Matters links**	**Early Learning Goals**	**Number & Calculation** more, less, add, take away, altogether, count on **Spatial Reasoning** shape, turn, rotate, fit, move, space **Number Beyond 10** ten, eleven, twelve, pattern, sequence
	Building numbers beyond 10	Build numbers beyond 10 using concrete resources; begin to understand that numbers are composed of tens and ones through practical exploration.	Children understand number to at least 10, including recognising patterns and structures that support building numbers beyond 10.	
	Counting patterns beyond 10	Count forwards and backwards beyond 10; notice and describe counting patterns and rhythms in number sequences.	Children count confidently and identify patterns in the counting system, supporting fluency with numbers.	
	Spatial reasoning (1)	Develop spatial reasoning skills through puzzles, construction and exploration; talk about how shapes fit together and move in space.	Children demonstrate spatial reasoning by selecting, rotating and combining shapes for a purpose.	
	Match, rotate, manipulate	Match shapes and objects; rotate and manipulate pieces to solve problems; explore how things change when turned or moved.	Children select, rotate and manipulate shapes to develop spatial understanding and solve problems.	
	Adding more	Combine two groups of objects and find how many altogether; use informal strategies to add by counting on.	Children add quantities and numbers, including solving real-world problems using addition.	
	Taking away	Remove objects from a group and see what is left; begin to understand subtraction as taking away through practical experiences.	Children subtract quantities and numbers and explain their thinking using concrete resources and language.	
Spatial reasoning (3) Visualise and build Deepening understanding Patterns and relationships Spatial reasoning (4) Mapping	**Learning objective**	**Children in Reception – Development Matters links**	**Early Learning Goals**	**Spatial Reasoning** visualise, build, fit, rotate, turn, space **Pattern & Structure**
	Spatial reasoning (3)	Develop spatial reasoning through practical activities, construction and puzzle-solving; talk about how objects fit together and move in space.	Children select, rotate and manipulate shapes to experiment with spatial relationships and solve problems.	

	Visualise and build	Visualise shapes and structures before building; recreate models and pictures using construction materials and blocks.	Children visualise and represent shapes and structures, building models with increasing accuracy and purpose.	pattern, relationship, same, different, repeat, change
	Deepening understanding	Secure understanding of number, shape and pattern through repeated practice and exploration; explain thinking using mathematical language.	Children demonstrate deep understanding of number and spatial structures, explaining relationships and methods.	**Position & Direction**
	Patterns and relationships	Notice, create and describe patterns; explore relationships between numbers, shapes and measures; make predictions based on patterns.	Children explore patterns and relationships and use them to reason and make generalisations.	map, route, near, far, left, right, forwards, backwards
	Spatial reasoning (4)	Apply spatial reasoning skills to more complex problems; rotate, manipulate and combine shapes to achieve a goal.	Children apply spatial reasoning flexibly, choosing strategies to solve problems involving shape and space.	
	Mapping	Create simple maps of familiar spaces; use positional and directional language to describe routes and locations.	Children use spatial awareness and positional language to describe locations, routes and movements.	

Maths

Curriculum Overview

Year 1

Unit	Curriculum objectives	Vocabulary
Y1 Unit 1—Number and Place value Numbers to 10 2 weeks	• Count to ten, forwards and backwards, beginning with 0 or 1, or from any given number • Count, read and write numbers to 10 in numerals and words • Identify and represent numbers using objects and pictorial representations including the number line, and use the language of: equal to, more than, less than (fewer), most, least • Given a number, identify one more and one less • Count in multiples of 2s - Have not taught this yet, moving this to Spring 1 when teaching number and place value to 20.	0-100, More/less, digit, numeral, figures, in order, different order, size value, objects, numerals, words, show, identify, less, more, number line, bead string, tens frame, counters, , fewer, least, more.
Y1 Unit 2—Addition and Subtraction Addition and Subtraction within 10 3 weeks	• Represent and use number bonds and related subtraction facts [within 10] • Add and subtract one-digit … numbers [to 10], including zero • Read, write and interpret mathematical statements involving addition (+), subtraction (–) and equals (=) signs • Solve one-step problems that involve addition and subtraction, using concrete objects and pictorial representations, and missing number problems	Number bonds, number line add, more, plus, make, sum, total, altogether, plus , inverse, double, near double, Equals, is the same as, equals sign, find the difference, difference between, how many more make? How many more/fewer is…than…? How much more is…? Subtract, take-away, Fewer, less, count on, count back, part-whole model
Y1 Unit 1—Number and Place value Numbers to 20 1 week	• Count to twenty, forwards and backwards, beginning with 0 or 1, or from any given number • Count, read and write numbers from 1 to 20 in numerals and words • Identify and represent numbers using objects and pictorial representations including the number line, and use the language of: equal to, more than, less than (fewer), most, least • Count in multiples of 2s and 5s	0-100, More/less, digit, numeral, figures, in order, different order, size value, numerals, words, show, identify, less, more, number line, bead string, tens frame, counters, , fewer, least, more.
Y1 Unit 2—Addition and Subtraction Addition and subtraction within 20 2 weeks	• Represent and use number bonds and related subtraction facts within 20 • Add and subtract one-digit and two-digit numbers to 20, including zero • Read, write and interpret mathematical statements involving addition (+), subtraction (–) and equals (=) signs • Solve one-step problems that involve addition and subtraction, using concrete objects and pictorial representations, and missing number problems such as 7 = [[– 9	Number bonds, number line add, more, plus, make, sum, total, altogether, plus , inverse, double, near double, Equals, is the same as, equals sign, find the difference, difference between, how many more make? How many more/fewer is…than…? How much more is…? Subtract, take-away, Fewer, less, count on, count back, part-whole model
Y1 Unit 6—Geometry—properties of shape Shapes and patterns 2 weeks	• Recognise and name common 2-D and 3-D shapes, including: 2-D shapes [for example, rectangles (including squares), circles and triangles]; 3-D shapes [for example, cuboids (including cubes), pyramids and spheres • Describe position, direction and movement, including whole, half, quarter and three-quarter turns	on, under, above, behind, next to, in front of, between, circle, triangle, rectangle, square, cube, pyramid, cuboid, cone, sphere, cylinder, side, corner, face, Position, over, underneath, below, top, side, bottom, in, outside, inside, around, front, back, before, after, beside, opposite, apart, middle, journey, left, right, up, down, forwards, backwards, sideways, across, close, far, near, along, through, to, from, towards, away from, movement, slide, roll, turn, whole turn, half turn, left turn, right turn, quarter turn, stretch, bend, Group, sort, cube, cuboid, pyramid, sphere, cone, cylinder, circle, triangle, square, shape, flat, curved, straight, round, hollow, solid, edge, centre, corner, direction, point, pointed, make, build, draw, rotated, vertex, vertices
Y1 Unit 2– Addition and subtraction Exploring calculation strategies within 20 2 weeks Consolidation week (best after holiday)	• Represent and use number bonds and related subtraction facts within 20 • Add and subtract one-digit and two-digit numbers to 20, including zero • Read, write and interpret mathematical statements involving addition (+), subtraction (–) and equals (=) signs • · Solve one-step problems that involve addition and subtraction, using concrete objects and pictorial representations, and missing number problems such as 7 = [ ] – 9	Number bonds, number line add, more, plus, make, sum, total, altogether, plus , inverse, double, near double, Equals, is the same as, equals sign, find the difference, difference between, how many more make? How many more/fewer is…than…? How much more is…? Subtract, take-away, Fewer, less, count on, count back, part-whole model

Unit	Curriculum objectives	Vocabulary
Y1 Unit 1 - Number and Place value Numbers to 40 2 weeks	• Count to forty, forwards and backwards, beginning with 0 or 1, or from any given number • Count, read and write numbers from 1 to 40 in numerals and words • Identify and represent numbers using objects and pictorial representations including the number line, and use the language of: equal to, more than, less than (fewer), most, least • Given a number, identify one more and one less • Recognise the place value of each digit in a two-digit number (tens, ones) (Y2	0-100, More/less, digit, numeral, figures, in order, different order, size Value,
Y1 Unit 2 - Addition and Subtraction Adding and subtracting within 40 2 weeks	• Represent and use number bonds and related subtraction facts within 20 • Add and subtract one-digit and two-digit numbers to 40, including zero • Add and subtract numbers using concrete objects, pictorial representations, and mentally, including: a two-digit number and ones; a two-digit number and tens; two two-digit numbers; adding three one-digit numbers (Y2) • Read, write and interpret mathematical statements involving addition (+), subtraction (–) and equals (=) signs • Solve one-step problems that involve addition and subtraction, using concrete objects and pictorial representations, and missing number problems such as 7 = [ ] – 9	Number bonds, number line add, more, plus, make, sum, total, altogether, plus double, near double, Equals, is the same as, equals sign, find the difference, difference between, how many more make? How many more/fewer is…than…? How much more is…? Subtract, take-away, Fewer, less, count on, count back, part-whole model
Y1 Unit 5 - Measurement Length, weight and volume Applying addition and subtraction within 40	• Compare, describe and solve practical problems for: lengths and heights [for example, long/short, longer/shorter, tall/short, double/half]; mass/weight [for example, heavy/light, heavier than, lighter than]; capacity and volume [for example, full/empty, more than, less than, half, half full, quarter] • Measure and begin to record the following: lengths and heights; mass/weight; capacity and volume	Length, height, mass, weight, capacity, Full, half full, empty, holds, container, weigh, weighs, balances, heavy, heavier, heaviest, light, lighter, lightest, scales, estimate, close to, about the same, just over, just under, too many, too few, not enough, enough, length, width, depth, height, long, longer, longest, short, shorter, shortest, tall, taller, tallest, high, higher, highest, low, wide, narrow, deep, shallow, thick, thin, far, close, near, metre, ruler, metre stick, how many? How much?
Y1 Unit 1 - Number and Place Value Numbers to 60 1 week	• Count to forty, forwards and backwards, beginning with 0 or 1, or from any given number • Count, read and write numbers from 1 to 40 in numerals and words • Identify and represent numbers using objects and pictorial representations including the number line, and use the language of: equal to, more than, less than (fewer), most, least • Given a number, identify one more and one less • Recognise the place value of each digit in a two-digit number (tens, ones) (Y2	0-100, More/less, digit, numeral, figures, in order, different order, size Value,
Unit 2– Addition and Subtraction Adding and subtracting within 60 1 week	• Represent and use number bonds and related subtraction facts within 20 • Add and subtract one-digit and two-digit numbers to 40, including zero • Add and subtract numbers using concrete objects, pictorial representations, and mentally, including: a two-digit number and ones; a two-digit number and Tens; two two-digit numbers; adding three one-digit numbers (Y2) • Read, write and interpret mathematical statements involving addition (+), subtraction (–) and equals (=) signs • Solve one-step problems that involve addition and subtraction, using concrete objects and pictorial representations, and missing number problems such as 7 = [ ] – 9	Number bonds, number line add, more, plus, make, sum, total, altogether, plus , inverse, double, near double, Equals, is the same as, equals sign, find the difference, difference between, how many more make? How many more/fewer is…than…? How much more is…? Subtract, take-away, Fewer, less, count on, count back, part-whole model

Unit a	Curriculum objectives	Vocabulary
Y1 Unit 5 - Measures Time 2 Weeks	• Tell the time to the hour and half past the hour and draw the hands on a clock face to show these times • Recognise and use language relating to dates, including days of the week, weeks, months and years • Compare, describe and solve practical problems for time [for example, quicker, slower, earlier, later] and measure and begin to record time (hours, minutes, seconds • Sequence events in chronological order using language [for example, before and after, next, first, today, yesterday, tomorrow, morning, afternoon and evening]	Time, days of the week, seasons, day, week, month, year, weekend, birthday, holiday, morning, afternoon, evening, night, midnight, bedtime, dinnertime, playtime, today, yesterday, tomorrow, takes longer, takes less time, hour, o'clock, half past, hands, clock, watch, how long ago? How long will it be to? How long will it take to? How often? before, after, next, last, now, soon, early, late, quick, quicker, quickest, fast, faster, fastest, slow, slower, slowest, slowly, old, older, young, younger, youngest
Y1 Unit 1 - Numbers and Place Value Numbers to 100 2 weeks	• Count to and across 100, forwards and backwards, beginning with 0 or 1, or from any given number • Count, read and write numbers from 1 to 20 in numerals and words • Identify and represent numbers using objects and pictorial representations including the number line, and use the language of: equal to, more than, less than • (fewer), most, least • Recognise the place value of each digit in a two-digit number (tens, ones) (Y2) • Identify, represent and estimate numbers to 100 using different representations (Y2) • Given a number, identify one more and one less • Read and write numbers to at least 100 in numerals and in words	0-100, More/less, digit, numeral, figures, in order, different order, size Value, estimate, represent, ones, tens, double, near double,
Y1 Unit 2– Addition and Subtraction Adding and subtracting within 100 3 weeks	• Represent and use number bonds and related subtraction facts within 20 • Add and subtract one-digit and two-digit numbers to 100, including zero • Add and subtract numbers using concrete objects, pictorial representations, and mentally, including: a two-digit number and ones; a two-digit number and • tens; two two-digit numbers; adding three one-digit numbers (Y2) • Read, write and interpret mathematical statements involving addition (+), subtraction (–) and equals (=) signs • Solve one-step problems that involve addition and subtraction, using concrete objects and pictorial representations, and missing number problems such as 7 = [ ]– 9	Number bonds, ones, tens, teen numbers, numerals, numbers in words, subtract, take away, add, addition, bigger, smaller, equals, two-digit, one-digit, add, addition, subtract, take away, bigger, smaller.
Y1 Unit 5 - Measures Money 2 weeks	• Recognise and know the value of different denominations of coins and notes • Solve one-step problems that involve addition and subtraction, using concrete objects and pictorial representations, and missing number problems such as 7p = [ ] – 9p	Money, coin, penny, pence, pound, price, cost, buy, sell, spend, spent, pay, change, dear, costs, cheaper, same as, total
Y1 Unit 3—Multiplication and Division Multiplication and division 2weeks	• Solve one-step problems involving multiplication and division, by calculating the answer using concrete objects, pictorial representations and arrays with the support of the teacher.	Sharing, groups, hoops, compare, Odd, even, count in twos, threes, fives, count in Sharing, groups, hoops, compare, Odd, even, count in twos, threes, fives, count in
Y1- Fractions 1-2 weeks	• Recognise, find and name a half as one of two equal parts of an object, shape and quantity. • Recognise, find and name a quarter as one of four equal parts of an object, shape and quantity •	Fractions, half, quarter, numerator, denominator.

Maths

Curriculum Overview

Year 2

Unit	Curriculum objectives	Vocabulary
Y2 Unit 1 - Number and Place value Numbers within 100 3 weeks	• Use place value and number facts to solve problems • Recognise the place value of each digit in a two-digit number (tens, ones) • Identify, represent and estimate numbers to 100 using different representations, including the number line • Compare and order numbers from 0 up to 100; use <, > and = signs • Identify, represent and estimate numbers to 100 using different representations (to 1000 Y3) • Recognise the place value of each digit in a three-digit number (hundreds, tens, ones) (Y3) • Compare and order numbers up to 100 (up to 1000 Y3) • Read and write numbers to at least 100 in numerals and in words • Read and write numbers up to 100 in numerals and in words (1000 Y3) • Count in steps of 2, 3, and 5 from 0, and in tens from any number, forward and backward • Count from 0 in multiples of 100; find 10 or more or less than a given number (100 y3) • NB– Expose children to working with these numbers in a variety of contexts including measure and scales	1-100, hundreds, partition, recombine, hundred more/less, hundreds column, compare, order, in words, greater than, less than symbols, place value, hundreds, tens and ones. tens ones place value grid partition more fewer fewest greatest smallest
Y2 Unit 2 - Addition and Subtraction Add and subtract 2 digit and 3 digit numbers 4 weeks	• Recall and use addition and subtraction facts to 20 fluently, and derive and use related facts up to 100 • Show that addition of two numbers can be done in any order (commutative) and subtraction of one number from another cannot • Add and subtract numbers using concrete objects, pictorial representations, and mentally, including: a two-digit number and ones; a two-digit number and • tens; two two-digit numbers; • Add and subtract numbers mentally, including: a two digit number and ones; a two-digit number and tens; a two-digit number and hundreds (Y3 3 digits Y3) • Add and subtract numbers with up to three digits, using written methods in line with the calculation policy	Number bonds, number line, add, more, plus, make, sum, total, altogether, plus, inverse, double, near double, Equals, is the same as, equals sign, find the difference, difference between, how many more make? How many more/fewer is…than…? How much more is…? Subtract, take-away, Fewer, less, count on, count back, part-whole model, column, columnar, exchange, fact family number sentence number bond column 10 more 10 less
Y2 Unit 2 - Addition and Subtraction Problems involving calculation 2 weeks	• Recognise and use the inverse relationship between addition and subtraction and use this to check calculations and solve missing number problems • Solve problems with addition and subtraction: using concrete objects and pictorial representations, including those involving numbers, quantities and • measures; applying their increasing knowledge of mental and written methods • Estimate the answer to a calculation and use inverse operations to check answers (Y3)	Number bonds, number line, add, more, plus, make, sum, total, altogether, plus, inverse, double, near double, Equals, is the same as, equals sign, find the difference, difference between, how many more make? How many more/fewer is…than…? How much more is…? Subtract, take-away, Fewer, less, count on, count back, part-whole model, column, columnar, exchange total tens ones subtract difference bar model represent
Y2 Unit 6 - Measure Measure Length 1 week	• Choose and use appropriate standard units to estimate and measure length/height in any direction (m/cm) to the nearest appropriate unit, using rulers and scales • Compare and order length and record the results using >, < and = • Connect new learning to number work mastered and embed number and calculation strategies taught so far	m. cm, length, height, scales, measure, measurement, record, table, greater than, less than, equal to.

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Y2 Unit 6 - Measure Measure Mass 1 week	• Choose and use appropriate standard units to estimate and measure mass (kg/g) to the nearest appropriate unit, using rulers, scales, thermometers and measuring vessels • Compare and order mass and record the results using >, < and = • Connect new learning to number work mastered and embed number and calculation strategies taught so far	grams, g, kilograms, kg, weight, unit, record, compare.
Y2 Unit 6 Measure Measure Capacity 1 week	• Choose and use appropriate standard units to estimate and measure capacity (litres/ml) and temperature (°C) to the nearest appropriate unit, using scales, thermometers and measuring vessels • Compare and order mass and record the results using >, < and = • Connect new learning to number work mastered and embed number and calculation strategies taught so far	ml, millilitre, litres, l, temperature, record, table, mass, weight, measure, length, height, heavy, light, capacity, full, nearly full, half full, nearly empty, empty.
Y2 Unit 3 - Multiplication and Division Multiplication and division 1 week	• Calculate mathematical statements for multiplication and division within the multiplication tables and write them using the multiplication (×), division (÷) and • equals (=) signs • Solve problems involving multiplication and division, using materials, arrays, repeated addition, mental methods, and multiplication and division facts, including problems in contexts • show that multiplication of two numbers can be done in any order (commutative) and division of one number by another cannot	Sharing, groups, hoops, compare, Odd, even, count in twos, threes, fives, count in
Y2 Unit 3 - Multiplication and Division Multiplication tables of 2, 5 and 10 2 week	• Recall and use multiplication and division facts for the 2, 5 and 10 multiplication tables, including recognising odd and even numbers • Calculate mathematical statements for multiplication and division within the multiplication tables and write them using the multiplication (×), division (÷) and • equals (=) signs • Solve problems involving multiplication and division, using materials, arrays, repeated addition, mental methods, and multiplication and division facts, • including problems in contexts • show that multiplication of two numbers can be done in any order (commutative) and division of one number by another cannot	Sharing, groups, hoops, compare, odd, even, count in twos, threes, fives, count in, multiples, answer, equals
Y2 Unit 2 - Addition and subtraction Y2 Unit 3 - Multiplication and division Exploring calculation strategies 2 weeks	• Recall and use addition and subtraction facts to 20 fluently, and derive and use related facts up to 100 • Show that addition of two numbers can be done in any order (commutative) and subtraction of one number from another cannot • Add and subtract numbers using concrete objects, pictorial representations, and mentally, including: a two-digit number and ones; a two-digit number and • tens; two two-digit numbers; adding three one-digit numbers • Add and subtract numbers mentally, including: a three-digit number and ones; a three-digit number and tens; a three-digit number and hundreds (Y3) • Solve problems with addition and subtraction: using concrete objects and pictorial representations, including those involving numbers, quantities and measures; applying their increasing knowledge of mental and written methods • estimate the answer to a calculation and use inverse operations to check answers (Y3)	Number bonds, number line, add, more, plus, make, sum, total, altogether, plus, inverse, double, near double, Equals, is the same as, equals sign, find the difference, difference between, how many more make? How many more/fewer is…than…? How much more is…? Subtract, take-away, Fewer, less, count on, count back, part-whole model, column, columnar, exchange, multiply, divide, share, find, equals.

Unit	Curriculum objectives	Vocabulary
Y2 Unit 4 - Fractions Fractions 2 weeks	• Recognise, find, name and write fractions $\frac{1}{3}$, $\frac{1}{4}$, $\frac{2}{4}$ and $\frac{3}{4}$ of a length, shape, set of objects or quantity. • Write simple fractions for example, $\frac{1}{2}$ of 6 = 3 • Recognise the equivalence of $\frac{2}{4}$ and $\frac{1}{2}$ Nb: remember to connect fraction to pre visited units such as length, mass, capacity, money etc	Three quarters, one third, a third, equivalence, equivalent, Whole, equal parts, four equal parts, one half, two halves, equal, a quarter, quarters, pictorial representation of…, numerator, denominator, equivalent equal parts, numerator denominator, fraction ,bar ,non-unit fraction ,unit fraction
Y2 Unit 6 - Measure Money 2 weeks	• Recognise and use symbols for pounds (Åí) and pence (p); combine amounts to make a particular value • Find different combinations of coins that equal the same amounts of money • Solve simple problems in a practical context involving addition and subtraction of money of the same unit, including giving change.	pound (£) pence (p), coin, note ,change
Y2 Unit 6—Measure Time 2 weeks	• Tell and write the time to five minutes, including quarter past/to the hour and draw the hands on a clock face to show these times • Know the number of minutes in an hour and the number of hours in a day • Compare and sequence intervals of time Nb. Link time to previously taught fraction work	half past, quarter past quarter to, minute hand, hour hand, duration, quarter past/to, analogue, digital, sequence, time, minutes, hours, days, months, weeks, intervals, length centimetre (cm) metre (m)
Y2 Unit 3 Multiplication and division Multiplication and division 3 x and 4 x 3 weeks	• Recall and use multiplication and division facts for the 3 and 4 multiplication tables (Y3) • Calculate mathematical statements for multiplication and division within the multiplication tables and write them using the multiplication (x), division (÷) and equals (=) signs • Solve problems involving multiplication and division, using materials, arrays, repeated addition, mental methods, and multiplication and division facts, including problems in contexts • Show that multiplication of two numbers can be done in any order (commutative) and division of one number by another cannot	Multiply, repeated addition Groups of , lots of, shared between, commutative, facts, equals
Y2 Unit 6 - Geometry Faces, shapes, patterns, lines and turns	• *Identify and describe the properties of 2-D shapes, including the number of sides and line symmetry in a vertical line* • *Identify and describe the properties of 3-D shapes, including the number of edges, vertices and faces* • *Identify 2-D shapes on the surface of 3-D shapes, [for example, a circle on a cylinder and a triangle on a pyramid]* • *Compare and sort common 2-D and 3-D shapes and everyday objects* • *Order and arrange combinations of mathematical objects in patterns and sequences* • *Use mathematical vocabulary to describe position, direction and movement, including movement in a straight line and distinguishing between rotation as a turn and in terms of right angles for quarter, half and three-quarter turns (clockwise and anticlockwise)*	Rotation, clockwise, anti-clockwise, straight line, ninety degree turn, right angle, Size, bigger, smaller, larger, symmetrical, line of symmetry, fold, match, mirror line, reflection, pattern, repeating pattern, forwards, backwards ,left, right, middle, turn, half turn, quarter turn, three-quarter turn
Y2 Unit 7 - Statistics Graphs	• *Interpret and construct simple pictograms, tally charts, block diagrams and simple tables.* • *Ask and answer simple questions by counting the number of objects in each category and sorting the categories by quantity.* • *Ask and answer questions about totalling and comparing categorical data* *NB– this should not be the first time children have been exposed to data in year 2– they should be shown graphs and representations as a context for comparing and calculating earlier in term,*	Count, tally, sort, vote, graph, block graph, diagram, pictogram, represent, group, set, list, table, label, title, most popular, most common, least popular, least common