Salhouse Primary School

Year 4/5 Mixed Age Maths Scheme of Learning

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Place Value

Year 4

New scheme steps
Represent numbers to 1,000
Partition numbers to 1,000
Number line to 1,000
Thousands
Represent numbers to 10,000
Partition numbers to 10,000
Flexible partitioning of numbers to 10,000
Find 1, 10, 100, 1,000 more or less
Number line to 10,000
Estimate on a number line to 10,000
Compare numbers to 10,000
Order numbers to 10,000
Roman numerals
Round to the nearest 10
Round to the nearest 100
Round to the nearest 1,000
Round to the nearest 10, 100 or 1,000

Year 5

New scheme steps
Numbers to 10,000
Numbers to 100,000
Numbers to 1,000,000
Read and write numbers to 1,000,000
Powers of 10
10/100/1,000/10,000/100,000 more or less
Partition numbers to 1,000,000
Number line to 1,000,000
Compare and order numbers to 100,000
Compare and order numbers to 1,000,000
Round to the nearest 10, 100 or 1,000
Round within 100,000
Round within 1,000,000

Addition and Subtraction

New scheme steps
Add and subtract 1s, 10s, 100s and 1,000s
Add up to two 4-digit numbers - no exchange
Add two 4-digit numbers - one exchange
Add two 4-digit numbers– more than one exchange
Subtract two 4-digit numbers - no exchange
Subtract two 4-digit numbers - one exchange
Subtract two 4-digit numbers – more than one exchange
Efficient subtraction
Estimate answers
Checking strategies

New scheme steps
Mental strategies
Add whole numbers with more than four digits
Subtract whole numbers with more than four digits
Round to check answers
Inverse operations (addition and subtraction)
Multi-step addition and subtraction problems
Compare calculations
Find missing numbers

Multiplication and Division *A*

New scheme steps
Multiples of 3
Multiply and divide by 6
6 times-table and division facts
Multiply and divide by 9
9 times-table and division facts
The 3, 6 and 9 times-tables
Multiply and divide by 7
7 times-table and division facts
11 times-table and division facts
12 times-table and division facts
Multiply by 1 and 0
Divide by 1 and itself
Multiply three numbers

New scheme steps
Multiples
Common multiples
Factors
Common factors
Prime numbers
Square numbers
Cube numbers
Multiply by 10, 100 and 1,000
Divide by 10, 100 and 1,000
Multiples of 10, 100 and 1,000

Fractions A

New scheme steps
Understand the whole
Count beyond 1
Partition a mixed number
Number lines with mixed numbers
Compare and order mixed numbers
Understand improper fractions
Convert mixed numbers to improper fractions
Convert improper fractions to mixed numbers
Equivalent fractions on a number line
Equivalent fraction families
Add two or more fractions
Add fractions and mixed numbers
Subtract two fractions
Subtract from whole amounts
Subtract from mixed numbers

New scheme steps
Find fractions equivalent to a unit fraction
Find fractions equivalent to a non-unit fraction
Recognise equivalent fractions
Convert improper fractions to mixed numbers
Convert mixed numbers to improper fractions
Compare fractions less than 1
Order fractions less than 1
Compare and order fractions greater than 1
Add and subtract fractions with the same denominator
Add fractions within 1
Add fractions with total greater than 1
Add to a mixed number
Add two mixed numbers
Subtract fractions
Subtract from a mixed number
Subtract from a mixed number - breaking the whole
Subtract two mixed numbers

Multiplication and Division B

New scheme steps
Factor pairs
Use factor pairs
Multiply by 10
Multiply by 100
Divide by 10
Divide by 100
Related facts – multiplication and division
Informal written methods for multiplication
Multiply a 2-digit number by a 1-digit number
Multiply a 3-digit number by a 1-digit number
Divide a 2-digit number by a 1-digit number (1)
Divide a 2-digit number by a 1-digit number (2)
Divide a 3-digit number by a 1-digit number
Correspondence problems
Efficient multiplication

New scheme steps
Multiply up to a 4-digit number by a 1-digit number
Multiply a 2-digit number by a 2-digit number (area model)
Multiply a 2-digit number by a 2-digit number
Multiply a 3-digit number by a 2-digit number
Multiply a 4-digit number by a 2-digit number
Solve problems with multiplication
Short division
Divide a 4-digit number by a 1-digit number
Divide with remainders
Efficient division
Solve problems with multiplication and division

SPRING

Measurement: length, area, perimeter.

New scheme steps
What is area?
Counting squares
Make shapes
Compare area

Measure in kilometres and metres
Equivalent lengths (kilometres and metres)
Perimeter on a grid
Perimeter of a rectangle
Perimeter of rectilinear shapes
Find missing lengths in rectilinear shapes
Calculate the perimeter of rectilinear shapes
Perimeter of regular polygons
Perimeter of polygons

Y5 Number: negative numbers

New scheme steps
Perimeter of rectangles
Perimeter of rectilinear shapes
Perimeter of polygons
Area of rectangles
Area of compound shapes
Estimate area

New scheme steps
Understand negative numbers
Count through zero in 1s
Count through zero in multiples
Compare and order negative numbers
Find the difference

Decimals (Y5 incl. percentages)

New scheme steps
Tenths as fractions
Tenths as decimals
Tenths on a place value chart
Tenths on a number line
Divide a 1-digit number by 10
Divide a 2-digit number by 10
Hundredths as fractions
Hundredths as decimals
Hundredths on a place value chart
Divide a 1 or 2-digit number by 100

New scheme steps
Decimals up to 2 decimal places
Equivalent fractions and decimals (tenths)
Equivalent fractions and decimals (hundredths)
Equivalent fractions and decimals
Thousandths as fractions
Thousandths as decimals
Thousandths on a place value chart
Order and compare decimals (same number of decimal places)
Order and compare any decimals with up to 3 decimal places
Round to the nearest whole number
Round to 1 decimal place
Understand percentages
Percentages as fractions
Percentages as decimals
Equivalent fractions, decimals and percentages

Fractions B

New scheme steps
Make a whole with tenths
Make a whole with hundredths
Partition decimals
Flexibly partition decimals
Compare decimals
Order decimals
Round to the nearest whole number
Halves and quarters as decimals

New scheme steps
Multiply a unit fraction by an integer
Multiply a non-unit fraction by an integer
Multiply a mixed number by an integer
Calculate a fraction of a quantity
Fraction of an amount
Find the whole
Use fractions as operators

Geometry: Shape

New scheme steps
Understand angles as turns
Identify angles
Compare and order angles
Triangles
Quadrilaterals
Polygons
Lines of symmetry
Complete a symmetric figure

New scheme steps
Understand and use degrees
Classify angles
Estimate angles
Measure angles up to 180°
Draw lines and angles accurately
Calculate angles around a point
Calculate angles on a straight line
Lengths and angles in shapes
Regular and irregular polygons
3-D shapes

Measurement: Y4 money, Y5 converting units

New scheme steps
Write money using decimals
Convert between pounds and pence
Compare amounts of money
Estimate with money
Calculate with money
Solve problems with money

New scheme steps
Kilograms and kilometres
Millimetres and millilitres
Convert units of length
Convert between metric and imperial units
Convert units of time
Calculate with timetables

Decimals B

New scheme steps
Make a whole with tenths
Make a whole with hundredths
Partition decimals
Flexibly partition decimals
Compare decimals
Order decimals
Round to the nearest whole number
Halves and quarters as decimals

New scheme steps
Use known facts to add and subtract decimals within 1
Complements to 1
Add and subtract decimals across 1
Add decimals with the same number of decimal places
Subtract decimals with the same number of decimal places
Add decimals with different numbers of decimal places
Subtract decimals with different numbers of decimal places
Efficient strategies for adding and subtracting decimals
Decimal sequences
Multiply by 10, 100 and 1,000
Divide by 10, 100 and 1,000
Multiply and divide decimals - missing values

Measurement (Y4 time, Y5 volume)

New scheme steps
Years, months, weeks and days
Hours, minutes and seconds
Convert between analogue and digital times
Convert to the 24 hour clock
Convert from the 24 hour clock

New scheme steps
Cubic centimetres
Compare volume
Estimate volume
Estimate capacity

Geometry (position and direction)

New scheme steps
Describe position using coordinates
Plot coordinates
Draw 2-D shapes on a grid
Translate on a grid
Describe translation on a grid

New scheme steps
Read and plot coordinates
Problem solving with coordinates
Translation
Translation with coordinates
Lines of symmetry
Reflection in horizontal and vertical lines

Statistics

New scheme steps
Interpret charts
Comparison, sum and difference
Interpret line graphs
Draw line graphs

New scheme steps
Draw line graphs
Read and interpret line graphs
Read and interpret tables
Two-way tables
Read and interpret timetables