



Maths Progression Map– 2022

Measurement and time

Year group/ Expected level	Measurement			Time		
Nursery	- Understand position through words alone – for example, 'The bag is under the table,' – with no pointing. (M) - Describe a familiar route. (M) - Discuss routes and locations, using words like 'in front of' and 'behind'. (M) - Make comparisons between objects relating to size, length, weight and capacity. (M)			Begin to describe a sequence of events, real or fictional, using words such as 'first', 'then...' (M)		
Reception	- Use talk to help work out problems and organise thinking and activities. (CL) - Compare length, weight and capacity. (M)					
Year 1	Term 1 - Measure and begin to record lengths and heights - know what metres are - Compare, describe and solve practical problems for lengths and heights - for example, long/short, longer/shorter, tall/short, double/half	Term 2 - Estimate - Measure and begin to record mass and weight - know what kilograms are - Compare, describe and solve practical problems for mass and weight - for example, heavy/light, heavier than, lighter than	Term 3 - Measure and begin to record capacity and volume - know what litres are - Compare, describe and solve practical problems for capacity - for example, full/empty, more than, less than, half, half full, quarter - Know the value of notes and coins	Term 1 - Understand what time is - hours, minutes, seconds - Recognise and use language relating to dates, including days of the week (name and order the days of the week), weeks, months and years	Term 2 - Sequence events in chronological order and use the language after, next, first, today, yesterday - Compare, describe and solve practical problems for time - quicker, slower, earlier, later	Term 3 - Read the time in hours and half hours - Draw the hands on a clock face to show o'clock and half past times.

Year 2	Term 1 - Measure using litres and millilitres - Measure using metres and centimetres - Measure mass using kilograms - Read a scale using intervals - Find different combinations of coins that equal the same amounts of money - Recognise and use symbols for pounds (£) and pence (p)	Term 2 - Find ways to measure objects to answer questions - Estimate and then check my estimate by measuring - Compare and order mass and record the results using >, < and = - Compare and order volume/capacity and record the results using >, < and = - Compare and order lengths and record the results using >, < and = - Combine amounts of money to make a particular value	Term 3 - Read a temperature scale on a thermometer - Solve measuring problems involving mass, length and capacity, using an appropriate pictorial or written method - Solve simple problems in a practical context involving addition and subtraction of money of the same unit (in pounds and pence), including giving change	Term 1 Know the number of minutes in an hour and the number of hours in a day	Term 2 Sequence intervals of time	Term 3 - Measure time in minutes and seconds - 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
Year 3	Term 1 - Measure and compare lengths m, cm, mm. - Measure and compare mass kg and g. - Measure and compare volume/capacity using ml and litres. - Include practical measuring	Term 2 - Add and subtract different lengths involving mm, cm and m and solve problems. - Add and subtract mass and solve problems - Add and subtract capacity/volume and solve problems - Solve (+, -, x and ÷) problems involving money.	Term 3 - Convert between units of measurements for length, capacity and mass - Solve word problems that require converting	Term 1 - Tell and write the time to five minute on an analogue clock and a digital 12-hour clock - Know the number of seconds in a minute, and the number of days in each month, year and leap year.	Term 2 Tell and write the time to five minute on an analogue clock and a digital 24-hour clock	Term 3 - Read timetables - Work out time duration- to five minute - Tell and write the time on a clock with Roman Numerals
Year 4	Term 1 - Read scales and record to the nearest tenth - Compare different measures (km-m; cm-m, cm-mm; gram –kg litre and ml.) - Estimate different measures including money - Calculate money in pounds and pence	Term 2 - Convert units of measurement using length kilometres, metres and centimetres - Convert units of measurement using mass – kilograms and grams - Convert units of measurement using volume/capacity - Measure and calculate the perimeter of a rectilinear figure in cm and metres.	Term 3 Solve problems involving the conversion between units of measurements for length, capacity and mass	Term 1 Tell and write the time on an analogue and digital 12-hour clock to the nearest minute.	Term 2 Tell and write the time on an analogue and digital 24-hour clock to the nearest minute.	Term 3 - Solve problems converting from hours to minutes, minutes to seconds years to months, weeks to days - Read timetables and work out time durations- to the nearest minute.

		Measure the area of rectilinear shapes including counting squares.				
Year 5	Term 1 - Read unmarked scales accurately - Convert between different units of metric measurement (km-m; cm-m, cm-mm; gram –kg) - Choose, use, read and record standard metric units - Answer questions by measuring using kilometres, metres and cm	Term 2 - Estimate and measure capacity and volume (litre and ml.) - Understand and use approximate equivalences between metric units and common imperial equivalents (inches, pounds and pints) - Measure and calculate perimeters or composite rectilinear shapes - Measure or calculate the area of a square or rectangle	Term 3 - Read unmarked scales accurately and solve problems - Use all four operations to solve problems involving measure of length, mass and volume/capacity - Use all four operations to solve problems involving money	Term 1 Accurately tell the time to the nearest minute on analogue clocks and digital 12 hour and 24 hour clocks	Term 2 Work out time durations- to the nearest minute.	Term 3 - Solve problems involving the conversion between units of time - Read timetables and work out time durations- to the nearest minute.
Year 6	Term 1 - Calculate the perimeter of rectilinear shapes - Recognise that shapes with the same areas can have different perimeters and vice versa - Use, read, write and convert between standard units - Convert miles to km and vice versa	Term 2 - Calculate the areas of parallelograms and triangles - Recognise when it is possible to use the formulae for the area of shapes - Solve measuring problems - Solve money problems in pounds and pence - Read scales with un-numbered divisions accurately - Measure using negative numbers	Term 3 - Solve measuring problems - Calculate, estimate and compare volume - Recognise when it is possible to use the formulae for the volume of shapes	Term 1 Accurately tell the time to the nearest minute on analogue clocks and digital 12 hour and 24 hour clocks	Term 2 Solve problems involving the conversion between units of time (including reading time tables)	Term 3 Solve multi-step problems involving the conversion between units of time (including reading time tables)