Year 4 – Discrete Mathematical Knowledge

Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
I know how to count in multiples of 6, 7, 9, 25 and 1000's.	I know timestables for 1, 2, 3, 4, 5, 6, 7, 8 9	I know multiplying by 3 is called the associative law.	I know a fraction is a part of an whole.	I know there are 100 pennies in £1.	I know timestables up to 12x.
I know roman numerals to 100.	I know perimeter is length x width.	I know factor pairs of multiples up to 12x.	I know a numerator is part of the whole.	I know there are ten 10ps in £1.	I know the x axis runs across the bottom of a graph.
I know a 5-digit number is made up of ten thousands, thousands, hundreds, tens and ones.	I know a factor is a whole number that multiplies by another number to make a product. Factor x factor = product	I know area is the amount of space that is taken up by a 2D shape or surface.	I know the denominator is the number of parts that make the whole.	I know there are 60 minutes in 1 hour.	I know coordinates are written x axis then y axis.
I know doubles of numbers up to 50,	I know factor pairs of multiples up to 12x.	I know timestables up to 12x.	I know a unit fraction has a 1 for a numerator.	I know there are 60 seconds in 1 minute.	I know the y axis runs vertically up the side of a graph.
I know the half of even numbers up to 50.	I know grouping means equal groups.	I know there is 10mm in 1cm.	I know a non-unit fraction has a number larger than 1 for the numerator.	I know there are 24 hours in a day.	I know a right angle is 90 degrees.
I know timestables for 1, 2, 3, 4, 5, 6, 7, 8 9.	I know sharing is dividing into equal groups.	I know there are 100cm in 1m.	I know a mixed number is a whole and fraction.	I know there are 12 months in a year.	I know an acute angle is smaller than 90 degrees.
I know related facts for addition and subtraction.	I know dividing and multiplying by 1 the number stays the same.	I know there are 1000m in 1km.	I know an improper fraction has a numerator larger than the denominator.	I know there are 7 days in 1 week.	I know an obtuse angle is between 90 and 180 degrees.
I know number bonds for 10.	I know dividing and multiplying by 0 will always equal 0.		I know that ten hundredths are equivalent to one tenth.	I know timestables up to 12x.	I know a polygon is a 2D shape closed with straight sides.
I know number bonds for 20.			I know tenths and hundredths as decimals.		I know triangles: scalene, isosceles and equilateral so I can describe their properties.
I know number bonds for 100.			I know timestables up to 12x.		I know 2D shapes: trapezium, square, rhombus, rectangle and parallelogram so I can describe their properties.
I know number bonds for 1000.			I know ten tenths make 1 whole.		I know parallel lines stays the same distance from each other.
			I know 10 hundredths make 1.		I know perpendicular are lines that cross each other at 90 degrees.
			I know equivalent fractions are the same.		