Whiteshill Primary School Fluency Plan Year 6

Fluency must include variation (see ready to progress tests and retrieve it quizzes for ideas)

KPI number	Objectives <mark>Year 5</mark> Year 6	Teaching Notes
1	Read and write numbers up to 1,000,000	This is not a spelling lesson but to show an understanding of place value e.g. do they know where the zero goes in three thousand and forty-two.
2 and 3	Compare and order numbers up to 1,000,000 and decimals with up to 3 decimal places.	
4	Round numbers to 1 decimal place, nearest whole number and 10, 100, 1000, 10000	
5	Count forwards and backwards with positive and negative numbers	
6 and 7	Add and subtract whole numbers with more than 4 digits and decimals with up to 3 decimal places choosing efficient methods	
8	Multiply and divide whole numbers and decimals by 10, 100 and 1000	
9	Identify and use multiples, factors and prime numbers	
10 and 11	Multiply numbers up to 4-digits by 1 or 2-digits and divide numbers up to 4-digits by 1 digits using a formal written method	
12	Use known facts and place value to multiply a whole number by a decimal	
13	Multiply decimal numbers (1 or 2 decimal places) by 1-digit using a formal written method	
Year 4 - 4	Classify quadrilaterals	
Year 3 - 5	Recognise horizontal, vertical, perpendicular and parallel lines	

Year 3 – 21	Use standard units to measure area and perimeter of rectilinear shapes	
Year 5 - 22		
23	Draw given angles, and measure them, in degrees (°)	Draw their own angles and measure it with protractor, write angles in degrees on the board which they then draw.
Year 3 - 20	Calculate durations of events	
Year 4 - 24	Convert between analogue and digital 12 and 24-hour clocks and other units of time	
Year 3 – 23 Year 5 - 24	Interpret bar charts and line graphs	
Year 4 - 23	Describe and plot positions on a 2-D grid as coordinates in the first quadrant	
14	Compare and order fractions whose denominators are all multiples of the same number	
15	Read and write decimal numbers (up to 3 decimal places) as fractions	
16	Understand that per cent relates to 'number of parts per 100', and write percentages as a fraction with denominator	
18	Convert mixed numbers to improper fractions and vice versa	
19	Add mixed numbers and proper fractions with denominators that are the same and multiples of each other	
20	Subtract proper fractions from mixed numbers with denominators that are the same and multiples of each other	
21	Multiply fractions and mixed numbers by a whole number	
17	Convert between adjacent units of metric measure	
Year 6 - 1 Year 5 - 4	Read, write order and round numbers up to 10,000,000	
5	Calculate intervals across zero	
2	Multiply and divide numbers including decimals by 10, 100 and 1000	

3 and 4	Multiply and divide numbers up to 4 digits by a 2-digit number choosing efficient methods and interpreting the remainders	
	Add and subtract whole numbers with more than 4 digits and decimals with up to 3 decimal places choosing efficient methods	
	Identify and use multiples, factors and prime numbers	
	Use known facts and place value to multiply a whole number by a decimal	
	Multiply decimal numbers (1 or 2 decimal places) by 1-digit using a formal written method	
	Classify quadrilaterals	
	Recognise horizontal, vertical, perpendicular and parallel lines	
	Use standard units to measure area and perimeter of rectilinear shapes	
	Draw given angles, and measure them, in degrees (°)	
	Calculate durations of events	
	Convert between analogue and digital 12 and 24-hour clocks and other units of time	
	Interpret bar charts and line graphs	
	Describe and plot positions on a 2-D grid as coordinates in the first quadrant	
	Convert between adjacent units of metric measure	
8	Simplify fractions	
9	Compare and order fractions, including fractions > 1	
10	Know and use simple fraction, decimal and percentage equivalents	
14	Add and subtract fractions with denominators that are not multiples of each other	
15	Add and subtract mixed numbers	
16	Multiply simple pairs of proper fractions and divide proper fractions by a whole number	

Year 6 - 1	Read, write order and round numbers up to 10,000,000	
Year 5 - 4		
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3 and 4	Multiply and divide numbers up to 4 digits by a 2-digit number choosing efficient methods and interpreting the remainders	
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14	Add and subtract fractions with denominators that are not multiples of each other	
15	Add and subtract mixed numbers	
16	Multiply simple pairs of proper fractions and divide proper fractions by a whole number	
18	Find percentages of an amount	
19	Use simple ratio to compare quantities	
	Classify quadrilaterals	
	Recognise horizontal, vertical, perpendicular and parallel lines	
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	Calculate durations of events	
	Convert between analogue and digital 12 and 24-hour clocks and other units of time	
	Interpret bar charts and line graphs	
	Describe and plot positions on a 2-D grid as coordinates in the first quadrant	
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23	Use simple formulae expressed in words	
24	Find possible values in missing number problems involving one or two unknowns	
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11	Compare and classify 2-D and 3-D shapes	
	Recognise horizontal, vertical, perpendicular and parallel lines	
Year 6 - 21	Use standard units to measure area and perimeter of rectilinear shapes, area of triangles and prallelograms	
13	Draw simple shapes using given lengths and angles	
	Calculate durations of events	
	Convert between analogue and digital 12 and 24-hour clocks and other units of time	
	Interpret bar charts and line graphs	
6 and 7	Describe and plot positions on a 2-D grid as coordinates in the four quadrants by reflecting and translating shapes	
20	Convert between different units of metric measure	
23	Use simple formulae expressed in words	
24	Find possible values in missing number problems involving one or two unknowns	
22	Calculate volumes of cuboids	
12	Know and use angle properties of straight lines, at a point and shapes	
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