



St Joseph's RC Middle School

Mathematics Subject Overview Year 8

	Autumn		Spring		Summer	
	1	2	1	2	1	2
Topic	Proportional Reasoning	Representations	Algebraic techniques	Developing Number	Developing Geometry	Reasoning with Data
Areas of curriculum covered	Understanding ratio and its link to multiplication Circumference of a circle Use ratio notation Reduce ratios to simplest form Solve ratio problems Use scale factors, linking to ratio solve simple direct proportion problems Scale diagrams and maps Multiplying and dividing a fraction by an integer Multiplying and dividing a fraction by a fraction	Plotting and interpreting straight line graphs Equations of lines parallel to the axes Model situation by translating them into expressions, formulae and graphs Scatter graphs and correlation Designing and using one and two way tables Listing outcomes Using simple space diagrams Using tables	Multiplying out single brackets Forming and using expressions, formulae and identities Forming and solving equations and inequalities with and without brackets Using more complex rules e.g. with brackets and squared terms Writing expressions with powers	Revisit fraction, decimals and percentage equivalence One number as a percentage of another Conversation between numbers in ordinary and standard form Comparing numbers in standard form Developing mental strategies Measures and units Estimation, including rounding to a given number of decimal places Revisit order of operations	Review Y7 angles rules Parallel lines and angles Revisit geometric notation Angles in special quadrilaterals Angles in a polygon Review area of shapes covered in year 7 Area of trapezium Area of a circle and parts of a circle Using significant figures Area of compound shapes Line symmetry in polygons and other shapes Reflections of shapes in horizontal, vertical and diagonal lines	Collecting data Interpreting statistical diagrams Dual bar charts Constructing and interpreting pie charts Median and mean revisited including finding the total Mean for grouped data The mode Choosing the appropriate average Revisit finding the range Comparing distributions