Mathematics Curriculum Progression Map

Number: Geometry – Properties of Shape

EYFS		Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
3-4 Year olds	Reception						
Identifying Shapes and their Properties							
Talk about and explore 2D and 3D shapes e.g. circles, rectangles, triangles and cuboids, using mathematical language: sides, corners, straight, flat, round		Recognise and name common 2-D and 3-D shapes, including: ○ 2-D shapes e.g. rectangles (including squares), circles and triangles ○ 3-D shapes e.g. cuboids (including cubes),	Identify and describe the properties of 2-D shapes, including the number of sides and line symmetry in a vertical line Identify and describe the properties of 3-D shapes, including the number of edges, vertices and faces		Identify lines of symmetry in 2-D shapes presented in different orientations	Identify 3-D shapes, including cubes and other cuboids, from 2-D representations	Recognise, describe and build simple 3-D shapes, including making nets *(cross reference - Drawing and Constructing)* Illustrate and name parts of circles, including radius, diameter and circumference and know that

		pyramids and spheres	Identify 2-D shapes on the surface of 3-D shapes, for example, a circle on a cylinder and a triangle on a pyramid				the diameter is twice the radius
Drawing and Constructing							
Select shapes appropriately, e.g. flat surface for building, a triangular prism for a roof. Combine shapes to make: new ones, e.g. an arch or a bigger triangle; pattern blocks; and interlocking shapes. *Challenge the children to build increasingly complex constructions*	Select, rotate and manipulate shapes to develop spatial reasoning skills. *Challenge the children to copy increasingly complex 2D pictures and patterns with 3D resources, guided by knowledge of learning trajectories* Compose and decompose shapes so that children recognise a shape can have other shapes within it, just as a number can, e.g.		*Children daw lines and shapes using a straight line (Non-Statutory Guidance)*	Draw 2-D shapes and make 3-D shapes using modelling materials; recognise 3-D shapes in different orientations and describe them	Complete a simple symmetric figure with respect to a specific line of symmetry *Children draw symmetric patterns using a variety of media to become familiar with different orientations of lines of symmetry; and recognise line of symmetry in a variety of diagrams, including where the line of symmetry does not dissect the*	Draw given angles, and measure them in degrees ^{o}	Draw 2-D shapes using given dimensions and angles Recognise, describe and build simple 3-D shapes, including making nets *(cross reference - Identifying Shapes*

	two triangles can fit together to make a square; find 2D shapes within 3D shapes.				*original shape (Non-statutory Guidance)*		*and their Properties)*
Comparing and Classifying							
			Compare and sort common 2-D and 3-D shapes and everyday objects		Compare and classify geometric shapes, including quadrilaterals and triangles, based on their properties and sizes	Use the properties of rectangles to deduce related facts and find missing lengths and angles Distinguish between regular and irregular polygons based on reasoning about equal sides and angles	Compare and classify geometric shapes based on their properties and sizes and find unknown angles in any triangles, quadrilaterals, and regular polygons
Angles							
				Recognise angles as a property of shape or a description of a turn	Identify acute and obtuse angles and compare and order angles up to two right angles by size	Know angles are measured in degrees: estimate and compare acute, obtuse and reflex angles	
				Identify right angles, recognise that two right angles make a half-turn, three		Identify: o angles at a point and one	Recognise angles where they meet at a point, are on a straight line, or are vertically

				make three quarters of a turn and four a complete turn; identify whether angles are greater than or less than a right angle		whole turn (total 360^{o}) ○ angles at a point on a straight line and ½ a turn (total 180^{o}) ○ other multiples of 90^{o}	opposite, and find missing angles
				Identify horizontal and vertical lines and pairs of perpendicular and parallel lines			