

Geometric Reasoning 3.14		Length of unit: 2 weeks	Week beg:	Year: 3	Teacher:
Success criteria Pupils can measure the perimeter of simple 2D shapes and describe properties of the shapes related to angles.	Prior Learning: <ul style="list-style-type: none"> • recognise, find, name and write fractions $\frac{1}{3}$, $\frac{1}{4}$, $\frac{2}{4}$ and $\frac{3}{4}$ of a length, shape, set of objects or quantity • write simple fractions for example $\frac{1}{2}$ of 6 = 3 and recognise the equivalence of $\frac{2}{4}$ and $\frac{1}{2}$. • 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 2-D shapes on the surface of 3-D shapes, [for example, a circle on a cylinder and a triangle on a pyramid] • compare and sort common 2-D and 3-D shapes and everyday objects • order and arrange combinations of mathematical objects in patterns and sequences • use mathematical vocabulary to describe position, direction and movement, including movement in a straight line and distinguishing between rotation as a turn and in terms of right 		Resources Maths vocabulary book Using and Applying in every maths lesson Assessment through guided maths Think Maths! Pitch and Expectations Y3 Models and Images Overcoming Barriers to Learning L2 to L3/L3 to L4 Securing Level 3/Level 4		
Guidance Pupils' knowledge of the properties of shapes is extended at this stage to symmetrical and non-symmetrical polygons and polyhedra. They should be able to describe the properties of 2-D and 3-D shapes using accurate language, including lengths of lines and acute and obtuse for angles greater or lesser than a right angle.					

Learning objectives

Pupils should be taught to:

Geometry: properties of shape

- recognise that angles are a property of shape or a description of a turn
- identify right angles, recognise that two right angles make a half-turn, three make three quarters of a turn and four a complete turn; identify whether angles are greater than or less than a right angle
- identify horizontal and vertical lines and pairs of perpendicular and parallel lines
- measure the perimeter of simple 2-D shapes.

Pupil outcomes:

I can draw several shapes with a perimeter of 30 cm and identify horizontal and vertical lines and pairs of perpendicular and parallel lines. I can also identify acute, obtuse and right angles in the shapes I have drawn.