

### Shape Prior Assessment Questions 7 and 8.

**Objective:** I can identify different quadrilaterals and triangles and know the properties of these.

**NC SH3:** compare and classify geometric shapes based on their properties and sizes

#### Teacher Input Ideas:

- Create large examples of quadrilaterals and triangles around the school for children to hunt and find. These can be labelled a,b,c, etc. and the children can name the different ones that they have found along their journey. Collect children's answers and discuss the properties of these shapes and what makes each of these unique. Encourage children who had difficulty in the prior learning assessment with naming these shapes, to record images of these and definitions so that they can refer to these in the lesson for support.
- Place name cards on the playground and the children to use skipping ropes, strips of paper, chalk or metre sticks to make an example of the shape for the label. Children to move around the playground to a different label and they must create another example with different measurements or orientation of the shape.
- Place these key words onto the board with images of quadrilaterals and triangles. Children must use each word on the board at least once to name and describe the shapes:

perpendicular, adjacent, parallel, right angle, acute angle, obtuse angle, equal, vertical, horizontal, diagonal, unequal, kite, parallelogram, rhombus, trapezium, square, rectangle, scalene, right angles triangle, equilateral, isosceles.

#### Practice Activities

**Purple Practice:** most suitable for children who made errors in Question 7 due to lack of knowledge of quadrilaterals.

**Practical:** Children to be given straws or small sticks and a large piece of paper. Ask the children to make 5 or 6 different columns and children to write the names of different quadrilaterals at the top of each column. Children to then create examples of different shapes by measuring and cutting the lengths of the straws and placing them at appropriate angles to create the shapes using the properties. Children could stick these on or record with a photograph. Encourage children to list the properties too using vocabulary discussed in the input to describe the shapes.

**Green Practice:** most suited for children who made errors in Question 8 of the prior learning assessment due to lack of understanding of different triangles.

Practical: Children to be given straws or small sticks and a large piece of paper. Ask the children to make 3 or 4 different columns and children to write the names of different triangles at the top of each column. Children to then create examples of different triangles by measuring and cutting the lengths of the straws and placing them at appropriate angles to create the shapes using the properties. Children could stick these on or record with a photograph. Encourage children to list the properties too using vocabulary discussed in the input to describe the shapes.

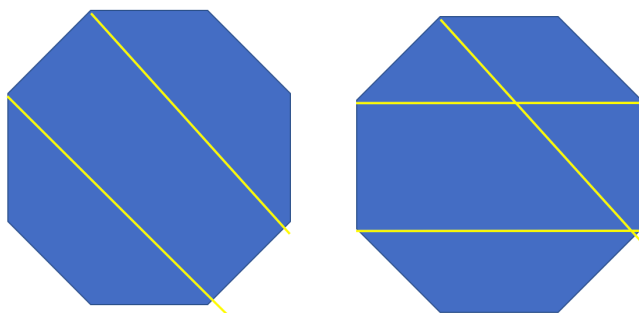
**Yellow Practice** Most suited for children who need to further develop understanding of creating Carroll diagrams to sort shapes based on own suggestions of criteria.

Practical: children to create own table for a Carroll diagram on a large piece of paper. Encourage children to think of sensible criteria such as, has right angles, no right angles, quadrilateral, triangle, parallel sides, no parallel sides, right angles, no right angles.

Children to then create shapes with straws to place into the correct parts of the diagram. Children to then use the vocabulary list and describe the shape to a friend, justifying why it is in the correct place on the diagram.

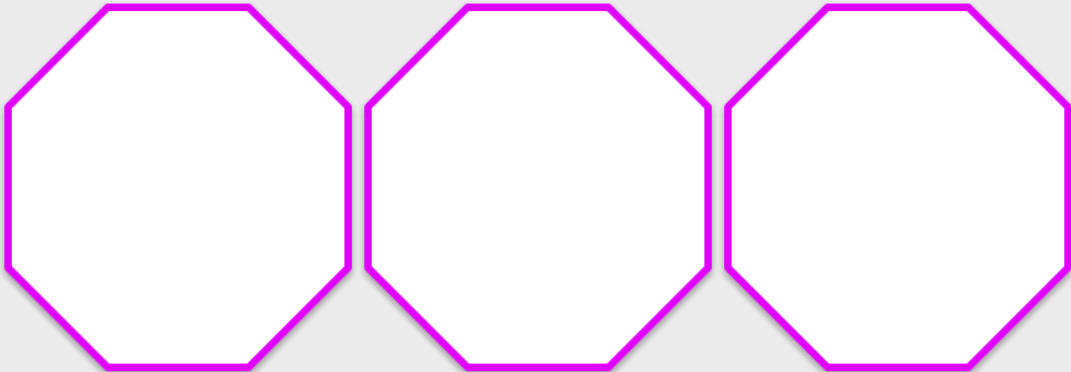
**Mastery:** For this activity, the children are provided with octagons. They are required to use the edges and the vertices of the octagon to create different quadrilaterals and triangles, by drawing lines through the shapes.

### Examples of mastery

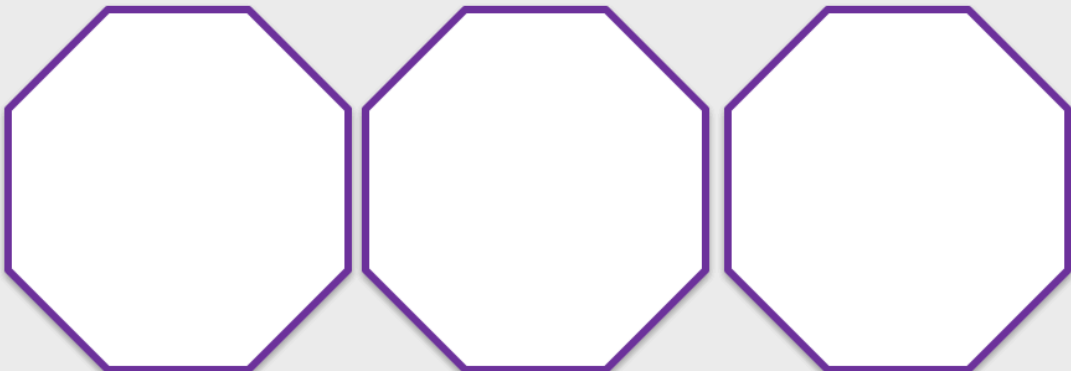


Look at the octagons below. Draw lines in each octagon to create different shapes as instructed for each question:

1) How many different **quadrilaterals** can you draw in one octagon by joining the vertices with lines?



2) How many different **triangles** can you draw in one octagon by joining the vertices with lines?



3) How many different **triangles and quadrilaterals** can you draw in one octagon by joining the vertices with lines?

