Maths Mastery

Draw 2D Shapes Using Given Dimensions and Angles



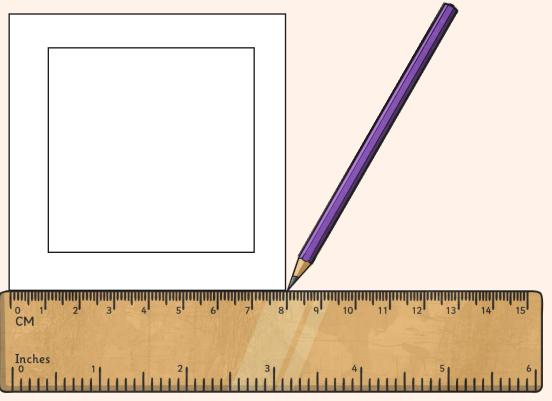


Squares

On plain paper draw a square with side 6cm.

Draw another square with side 8cm, which has the same centre as the first.

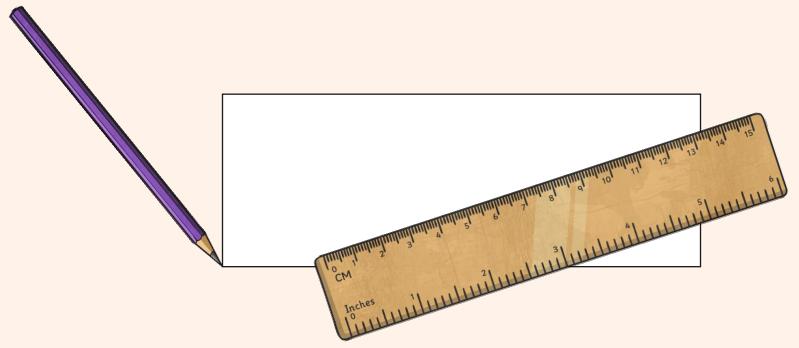
Can you continue the pattern?



Rectangles

Work with a partner. Challenge each other to draw rectangles with certain dimensions. Compare your rectangles.

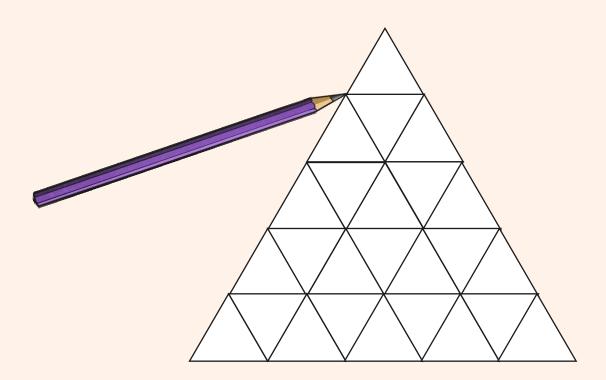
Are your right angles accurate?



Can make a pattern with your rectangles?

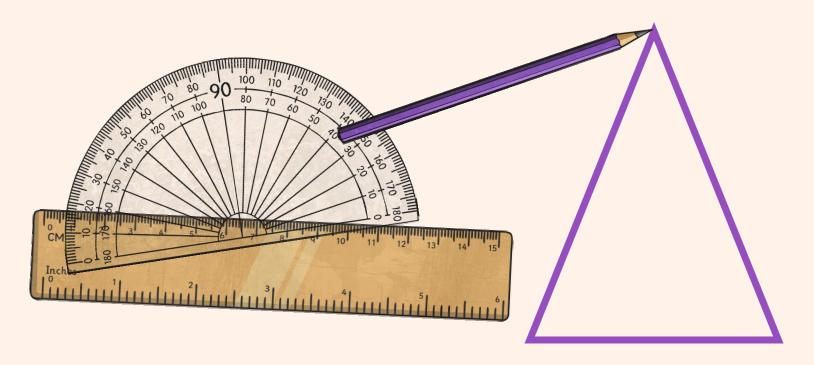
Equilateral Triangles

Draw an equilateral triangle with a side of a whole number of centimetres. Create a tessellating pattern of equilateral triangles.



Isosceles Triangles

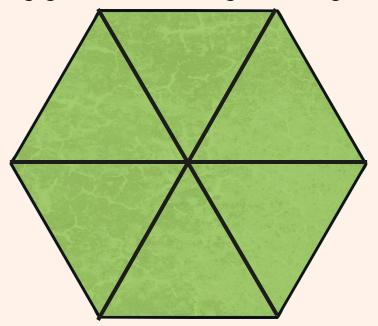
Work with a partner. Calculate the angles needed to draw an isosceles triangle and challenge your partner to draw an isosceles triangle with certain angles and length of side.



Hexagon

Draw a regular hexagon with each side being 8cm. Think about the angle you need.

Draw diagonal lines through the centre of the hexagon. This will test how accurately you have drawn your hexagon.



Try other regular polygons with an even number of sides.

Parallelograms

Work with a partner to each draw the same size parallelogram.

One partner choose the length of the sides and the other the angles.

Both accurately draw the parallelogram. Compare by overlaying or cutting out.

Change partners and try another parallelogram, or try a trapezium.

