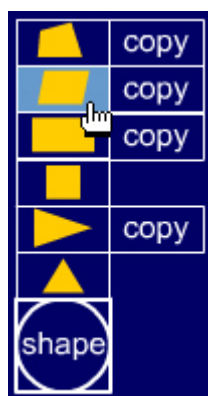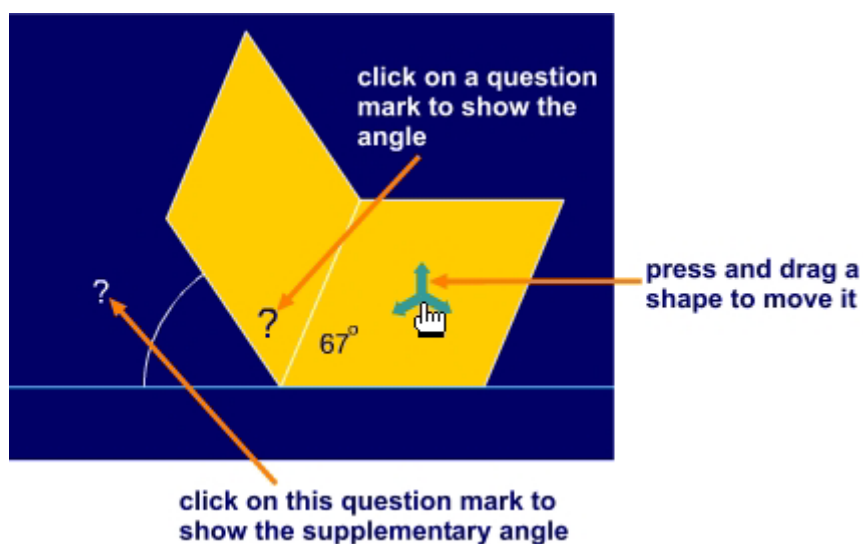# Calculating angles

This ITP allows you to place shapes around a point and investigate their angles. You can opt to display the shapes in one, two or four quadrants. The first shape is placed on the screen in the first quadrant with one of its sides horizontal.

Additional shapes are rotated around the central point to fit against the previous shape. In some shapes side lengths and angles are generated randomly. Shapes generated can be dragged to new positions and overlaid to form new intersecting shapes and angles.

Select the type of shape to place on the screen.

If you click 'copy' you create a shape with the same base angle as the previous shape.

Select the colour of the next shape.

Opt to show one, two or four quadrants.

Two quadrants (180°) are shown in the example above.

Show or hide the protractor. You can drag the protractor around the screen and rotate it using the rotate handle on its right-hand side.