Challenge 1

Jane is standing in a queue.
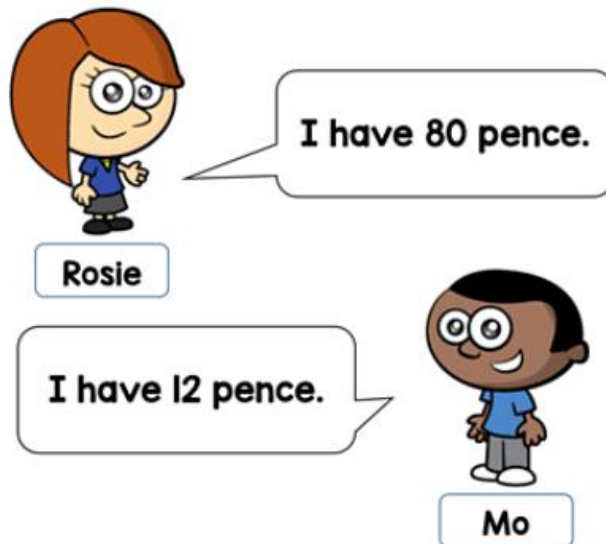
There are 5 people in front of her.

There are 2 people behind her.

How many people are in the queue?

Challenge 2

I have 80 pence.

Rosie

I have 12 pence.

Mo

Rosie gives Mo 25 pence.

How much more money does Rosie have than Mo now?

Challenge 3

If

$$70 + \bigcirc = 100$$

$$50 + \triangle = 100$$

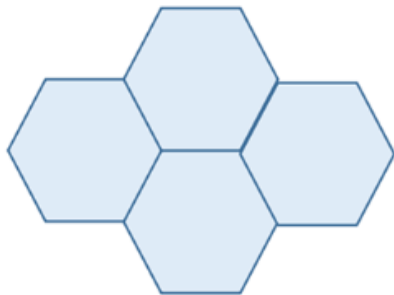$$\bigcirc + \triangle + \blacksquare = 100$$

What is the value of the blue square?

Challenge 4

The perimeter of this regular hexagon is 42 cm.
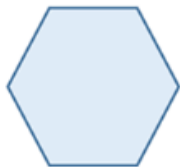
Four of these hexagons are put together to make this shape.

What is the perimeter of the shape?

Challenge 5

Charlie has a tin of paint.

The tin is half full and weighs 5.8 kg. Charlie paints a wall in his house.

The tin is now a quarter full and weighs 3.1 kg.

How much does the empty tin weigh?

Challenge 6

A spinner has 5 equal sections. The sections are labelled A to E.

The arrow is pointing to the centre of section A.

Tom rotates the arrow clockwise so that the arrow is now pointing to the centre of section D.

What angle has the arrow been rotated through?