Challenge 1

Can you work out the values of each shape?

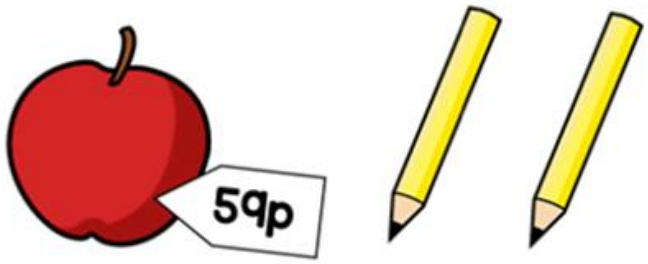
The two stars are the same so we need the same number.

__ - 10 = 7 so we know that 7 + 10 = __

Challenge 2

Tom has six 10p coins and three 5p coins. He buys an apple for 59p and two pencils.

He has no money left. How much does a pencil cost?



Tom's money at the start:

6 x 10p = 60p

3 x 5p = 15p

60p + 15p = 75p

75 - 59 = 2 pencils

2 pencils = 16p

1 pencil = 8p

Challenge 3

Here are some digit cards.

Amir and Donna each make a three-digit number using all the cards.

Amir notices that when he subtracts his number from Donna's number he gets an answer greater than 300 but less than 400.

What numbers did they make?

Hundreds must be 8 (Donna) and 5 (Amir) because 800 - 500 = 300

With the 10s and 1s, Donna must have a larger number than Amir so that the answer is 3 hundred and ____ instead of 2 hundred and ____.

Donna has 3 and 5 left. Amir has 3 and 8 left. The only combination is Donna having 53 and Amir having 38..

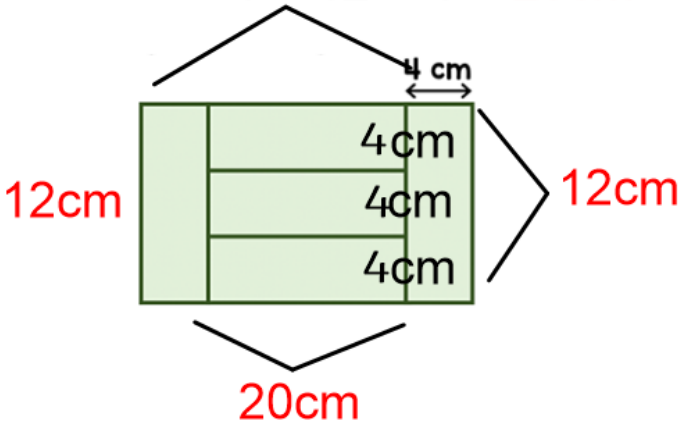
Donna started with 853 and Amir started with 538.

Challenge 4

Five identical rectangles are put together to make a large rectangle.

The width of one rectangle is 4cm. Work out the perimeter of the large rectangle.

4 + 12 + 4 = 20cm



20 + 20 + 12 + 12 = 64cm