

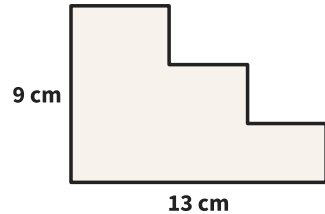
Perimeter of Compound Shapes

ANSWERS

1



Work out the perimeter of the shape.



Not drawn accurately

slide the steps out to a 13 by 9 rectangle

$$13 + 9 + 13 + 9$$

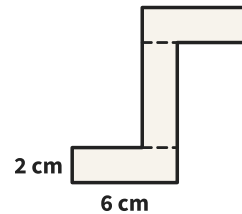
$$44 \text{ cm}$$

Answer

2



This shape is made from three identical rectangles. Work out its perimeter.



Not drawn accurately

the sides are 6, 8, 4, 2, 6, 8, 4 and 2

$$6 + 8 + 4 + 2 + 6 + 8 + 4 + 2$$

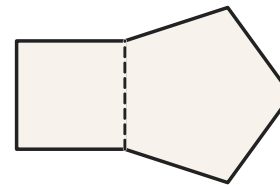
$$40 \text{ cm}$$

Answer

3



A regular pentagon and a square share a side. The square's perimeter is 24 cm. Work out the perimeter of the shape.



Not drawn accurately

each side = $24 \div 4 = 6 \text{ cm}$

7 sides on the outside: 7×6

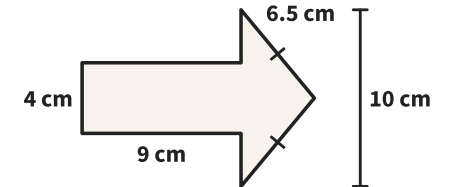
$$42 \text{ cm}$$

Answer

4



Work out the perimeter of this arrow.



Not drawn accurately

each overhang = $(10 - 4) \div 2 = 3 \text{ cm}$

$$4 + 9 + 9 + 3 + 3 + 6.5 + 6.5$$

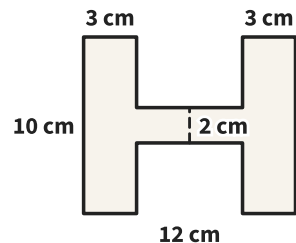
$$41 \text{ cm}$$

Answer

5



The shape is symmetrical. Work out its perimeter.



Not drawn accurately

gaps 6 wide, $(10 - 2) \div 2 = 4$ deep

$$12 + 10 + 12 + 10 + 4 \times 4$$

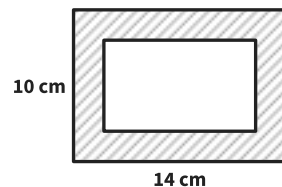
$$60 \text{ cm}$$

Answer

6



The shaded frame is 2 cm wide all the way round. Work out the total length of all its edges, inside and outside.



Not drawn accurately

outside $14 + 10 + 14 + 10 = 48$

inside $10 + 6 + 10 + 6 = 32$

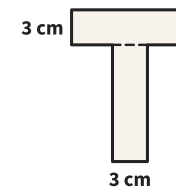
$$80 \text{ cm}$$

Answer

7



This T shape is made from two identical rectangles. Its perimeter is 46 cm. Work out the length of one rectangle.



Not drawn accurately

$2 \times (\text{length} + \text{length} + 3) = 46$

$2 \times \text{length} = 23 - 3 = 20$

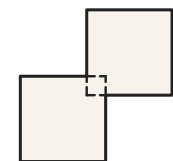
$$10 \text{ cm}$$

Answer

8



Two identical squares overlap in a 2 cm square. The perimeter of the shape is 64 cm. Work out the side of one square.



Not drawn accurately

$8 \times \text{side} - 4 \times 2 = 64$

$8 \times \text{side} = 72$

$$9 \text{ cm}$$

Answer