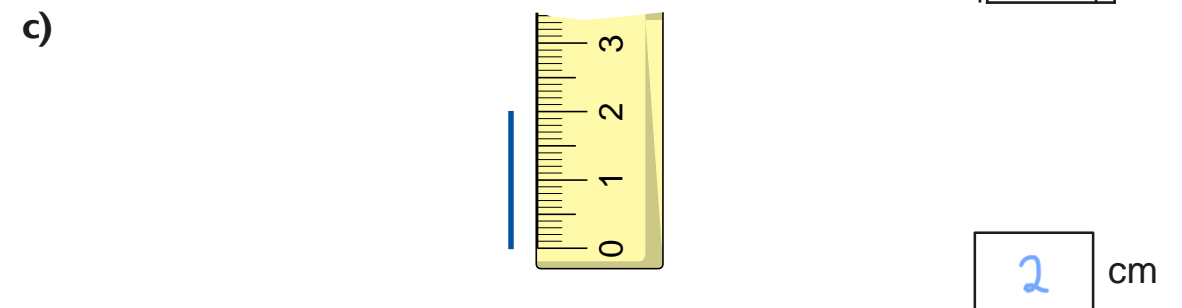
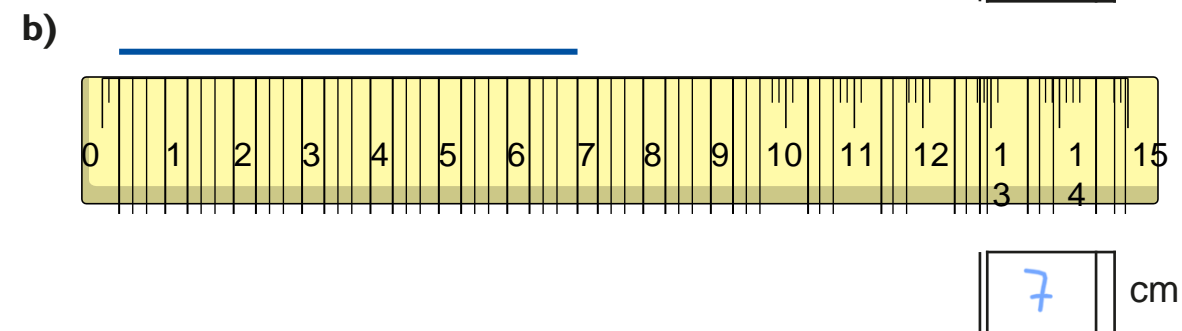
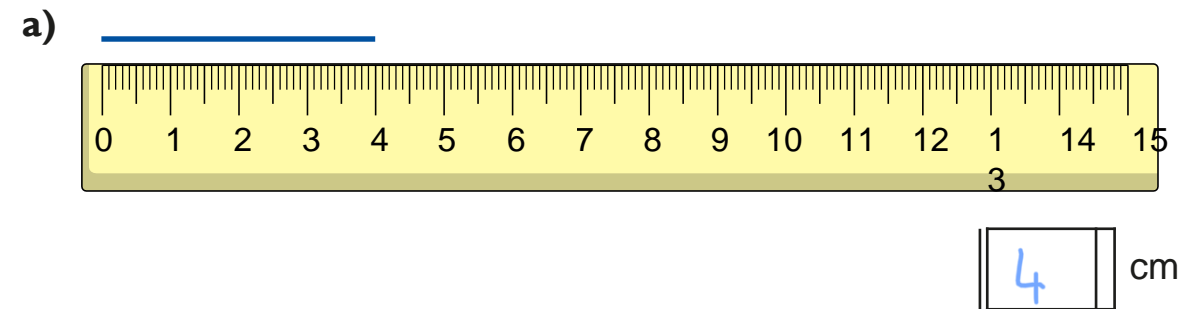
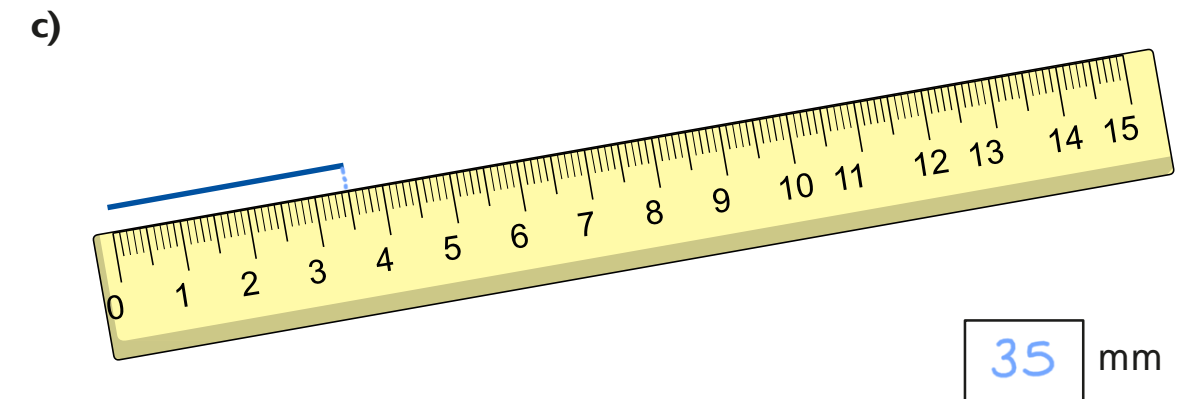
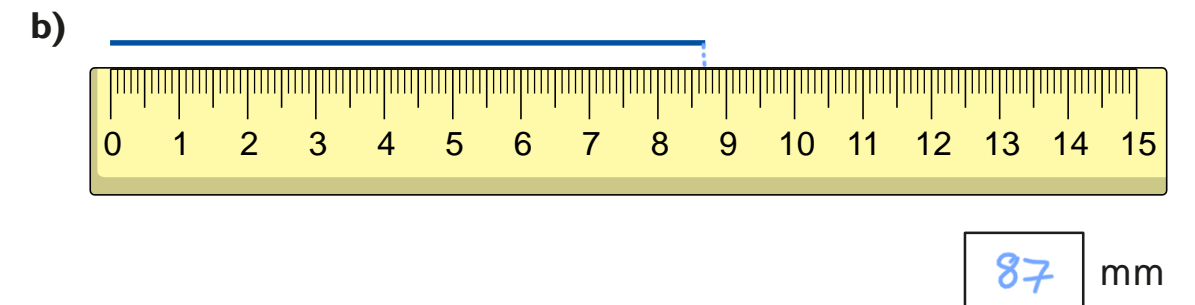
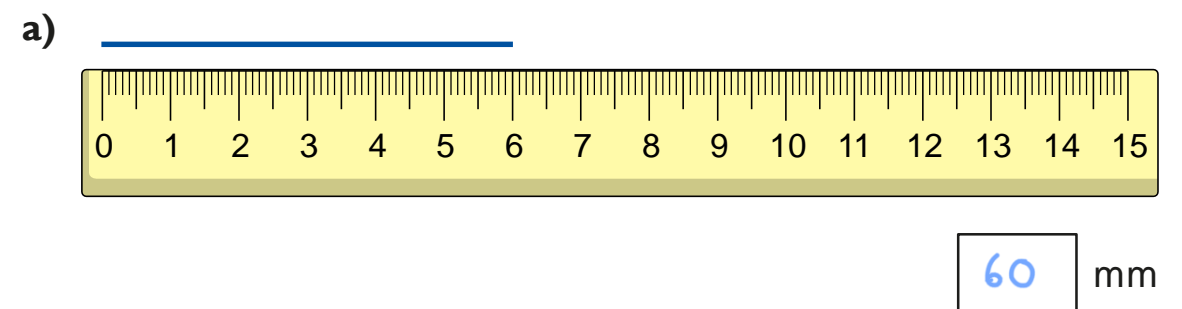


# Measure length

1 What is the length of each line?



2 Write the length of each line to the nearest millimetre.



3 Use a ruler to draw lines of these lengths.

a) 5 cm



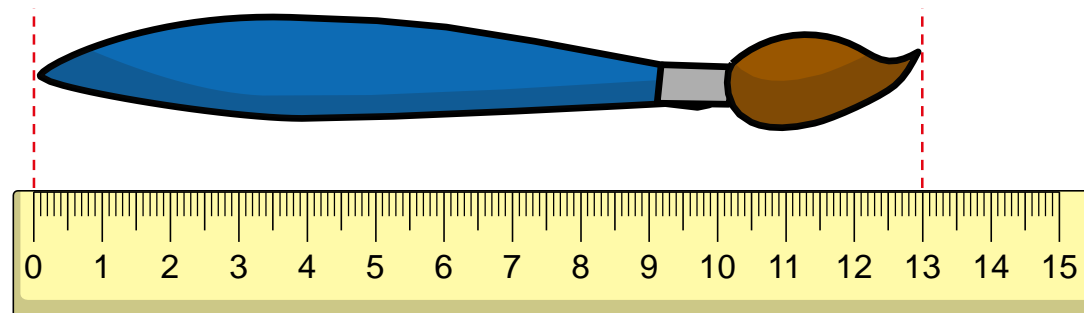
b) 75 mm



c) 42 mm

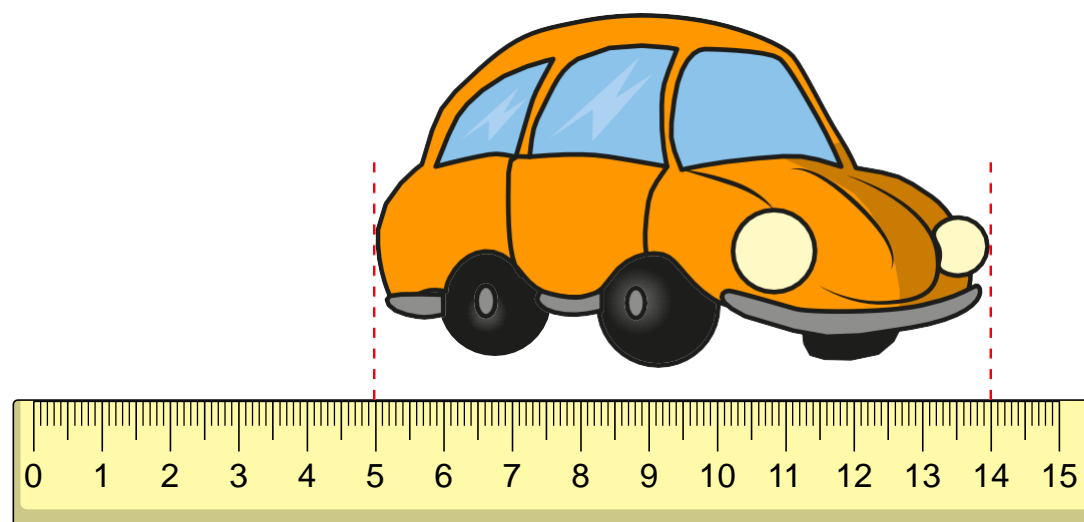


4 How long is the paintbrush?



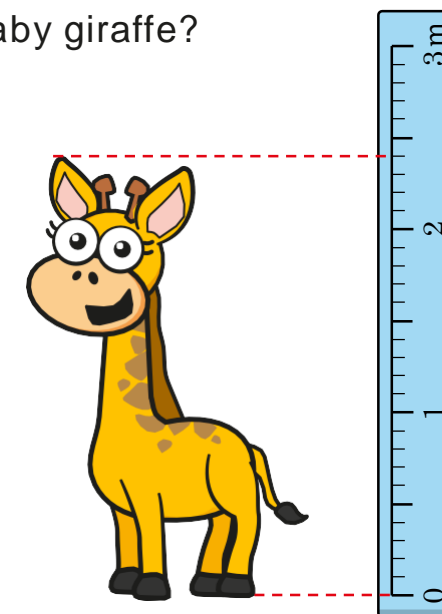
The paintbrush is  cm long.

5 How long is the toy car?



The toy car is  cm long.

6 How tall is the baby giraffe?



The baby giraffe is  m and  cm tall.

7 Tick the most sensible estimate for the height of a classroom door.

20 cm

☐

2 m

☒

20 m

☐

8 Find items in the classroom that are the following lengths.

Write your answers in the table.

Less than 10 cm long	Between 10 cm and 1 m long	More than 1 m tall

Compare with a partner.



# Equivalent lengths - m and cm

- 1** There are 100 centimetres (cm) in 1 metre (m).  
Use the bar models to complete the sentences.

1 m
100 cm

a)

1 m	1 m	1 m
100 cm	100 cm	100 cm

There are  cm in 3 m.

b)

1 m	1 m	1 m	1 m	1 m	1 m
100 cm	100 cm	100 cm	100 cm	100 cm	100 cm

There are  cm in 6 m.

c)

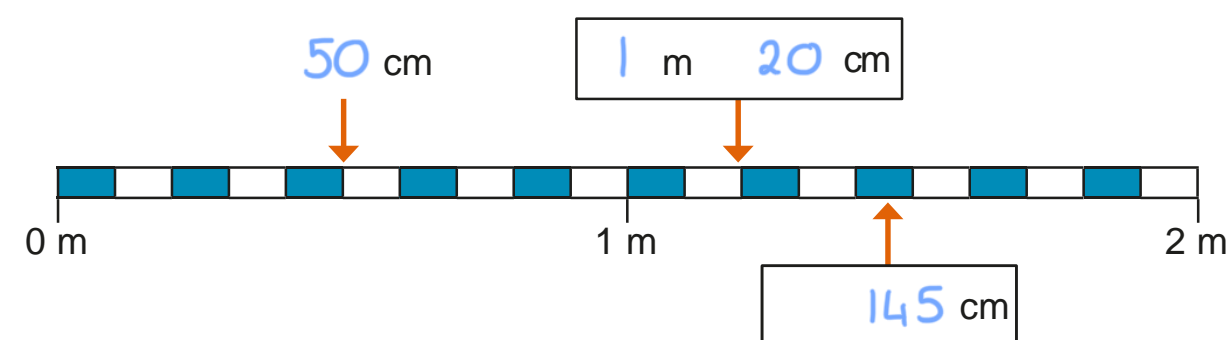
1 m	1 m	1 m	1 m	1 m
100 cm	100 cm	100 cm	100 cm	100 cm

There are 500 cm in  m.

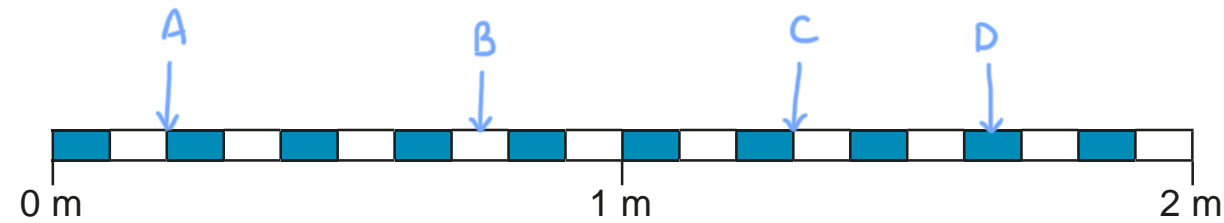
- 2** Complete the table to show equivalent lengths and continue the pattern.

cm	m and cm
310 cm	3 m and 10 cm
320 cm	3 m and 20 cm
330 cm	3 m and 30 cm
340 cm	3 m and 40 cm
350 cm	3 m and 50 cm
360 cm	3 m and 60 cm
370 cm	3 m and 70 cm

- 3** Write the missing measurements.



4 Draw an arrow to show the position of each measurement.



A

20 cm

B

0 m 75 cm

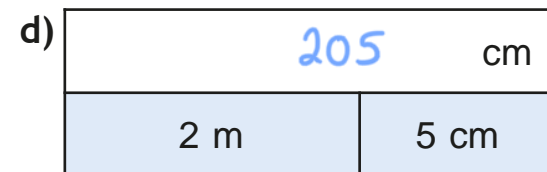
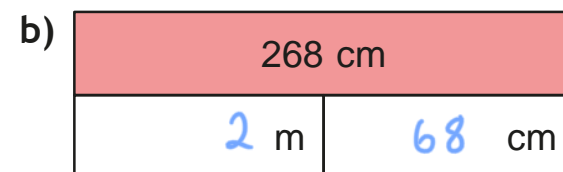
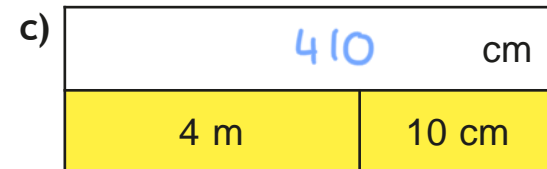
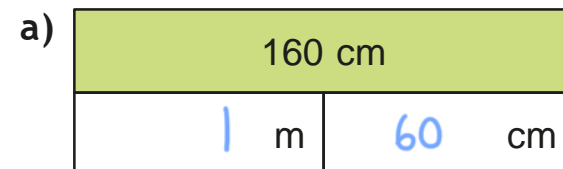
C

130 cm

D

1 m 65 cm

5 Complete the bar models.



6 Complete the sentences.

a) 240 cm = 2 m and 40 cm

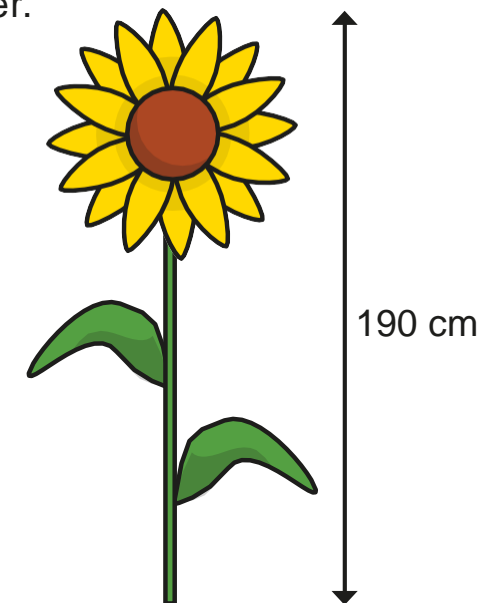
b) 319 cm = 3 m and 19 cm

c) 508 cm = 5 m and 8 cm

d) 2 m and 15 cm = 215 cm

e) 8 m and 3 cm = 803 cm

7 Here is Huan's sunflower.



Dani's sunflower is 2 m and 30 cm.

Tom's sunflower is exactly halfway between Huan's and Dani's.

How tall is Tom's sunflower?

Write your answer in metres and centimetres.

2 m and 10 cm



# Equivalent lengths – mm and cm

- 1 There are 10 millimetres (mm) in 1 centimetre (cm).  
Use the bar models to complete the sentences.

1 cm
10 mm

a)

1 cm	1 cm	1 cm
10 mm	10 mm	10 mm

There are  mm in 3 cm.

b)

1 cm	1 cm	1 cm	1 cm	1 cm	1 cm	1 cm
10 mm	10 mm	10 mm	10 mm	10 mm	10 mm	10 mm

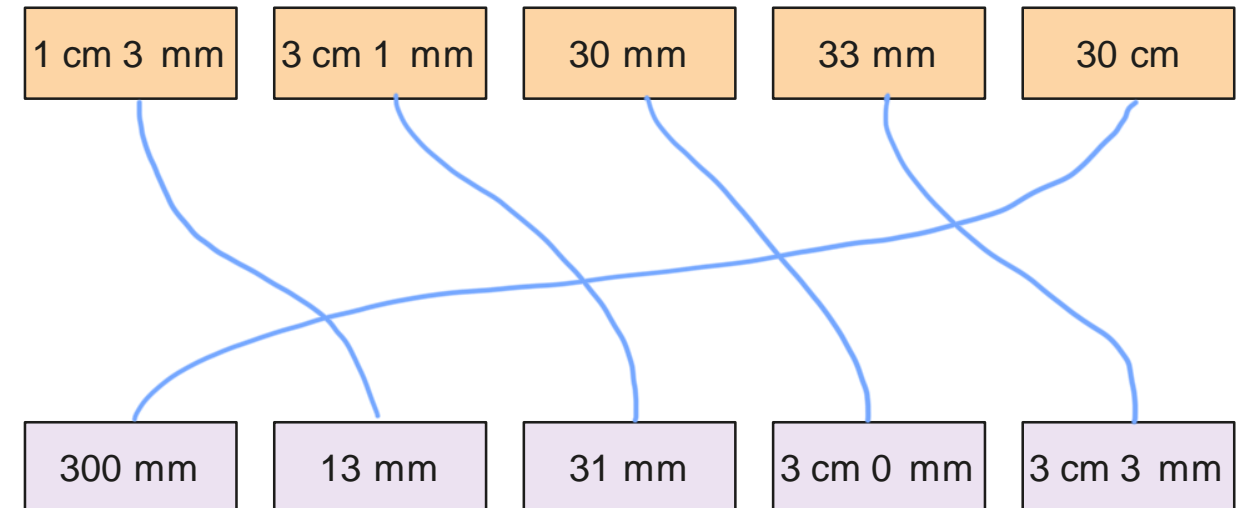
There are  mm in 7 cm.

c)

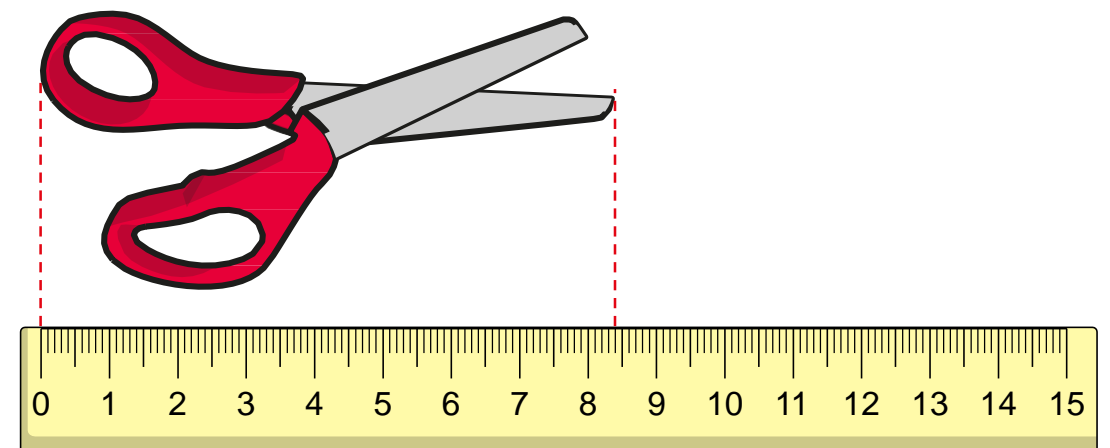
1 cm	1 cm	1 cm	1 cm
10 mm	10 mm	10 mm	10 mm

There are 40 mm in  cm.

- 2 Match the equivalent lengths.



- 3 How long are the scissors?



The scissors are  cm and  mm long.

The scissors are  mm long.

- 4** Find three items in your classroom.  
Measure them and complete the table.  
One has been done for you.

Item	Length in cm and mm	Length in mm
toy car	9 cm 6 mm	96 mm



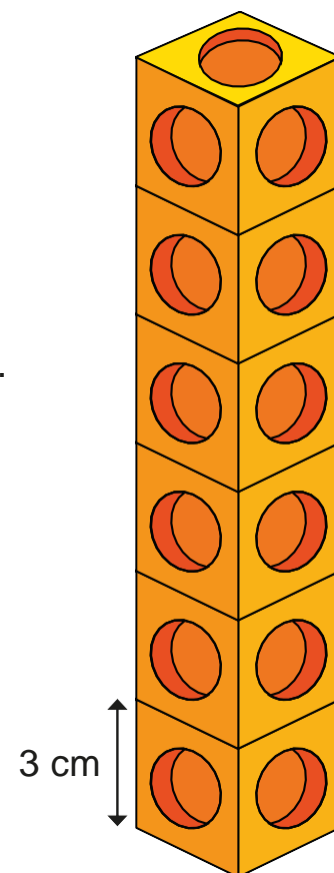
- 5** Filip and Kim are building towers using cubes.  
Each cube is 3 cm high.

- a) Filip uses 6 cubes.

How tall is Filip's tower?

Give your answer in millimetres.

Filip's tower is  mm tall.



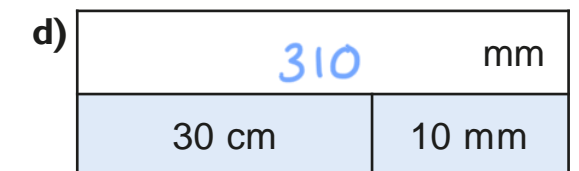
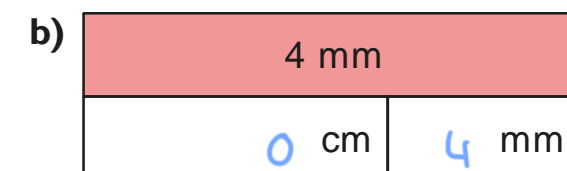
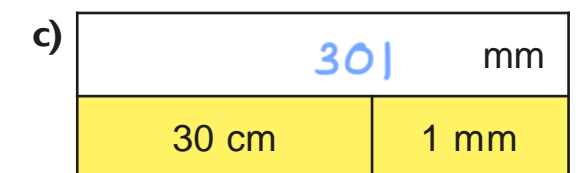
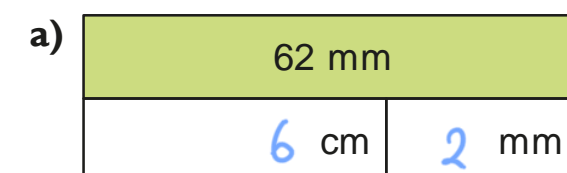
- b)** Kim's tower is 300 mm tall.

How many cubes does she use?

Kim uses  cubes.



- 6** Complete the bar models.



# Compare lengths

1 Write  $<$ ,  $>$  or  $=$  to compare the lengths.

a) 60 mm  $=$  6 cm      c) 5 cm  $>$  45 mm

b) 1 m 50 cm  $>$  115 cm      d) 100 mm  $<$  1 m

How did you work this out?

2 Eva, Mo, Alex and Dexter have each built a tower.

Use the table to complete the sentences.

Child	Height of tower
Eva	1 m 5 cm
Mo	135 cm
Alex	1 m 45 cm
Dexter	1 m 25 cm

a) Alex's tower is the tallest.

b) Eva's tower is the shortest.

c) Mo's tower is taller than Dexter's.

d) Eva's tower is shorter than Alex's.

3 Write the following lengths in order from shortest to longest.

160 cm

950 mm

1 m 50 mm

200 cm

1 m 25 cm

950 mm

1 m 50 mm

1 m 25 cm

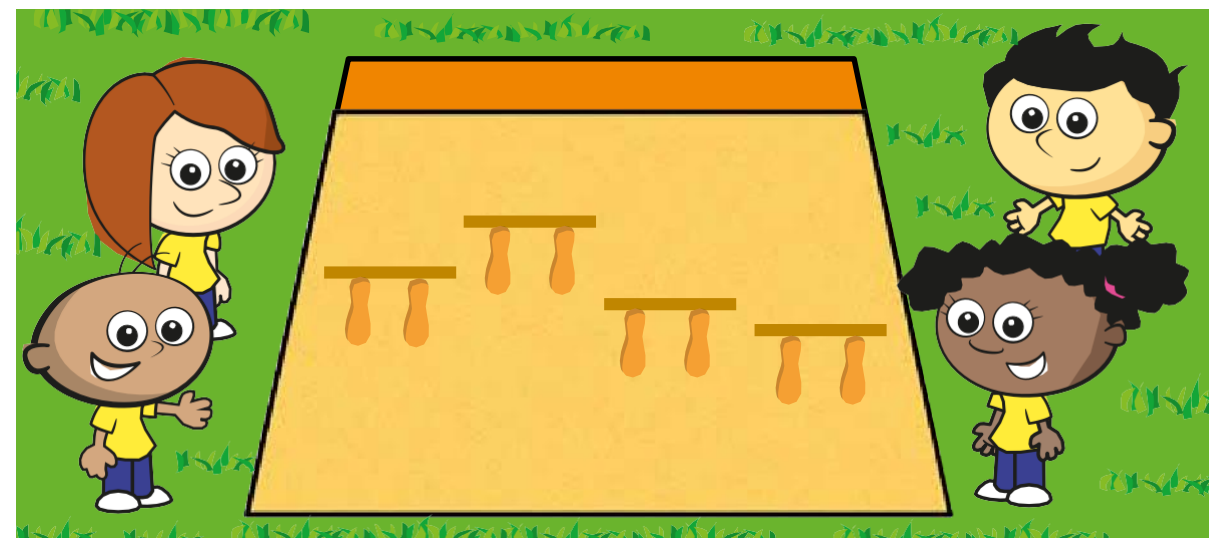
160 cm

200 cm

shortest

longest

4 Jack, Tommy, Rosie and Whitney have a jumping competition.



Here are the results.

Jack	Tommy	Rosie	Whitney
870 mm	105 cm	1 m and 30 mm	1 m and 10 cm

The person who jumped the furthest wins the competition.

Put the children in order from 1st to 4th place.

Whitney

1st

Tommy

2nd

Rosie

3rd

Jack

4th

**5** Measure the height of four of your classmates.  
Measure their foot length and then complete the table.

Name	Height in cm	Foot length in cm


What have you found? Do taller people have longer feet?

**6** Measure the height of four of your classmates.  
Measure how far they can jump and then complete the table.


Name	Height in cm	Jump length in cm

Talk about what your results show.  
Can taller people jump further?


**7** Teddy, Mo, Amir, Dora and Annie have each grown a sunflower.  
Use the clues below to work out which sunflower belongs to which child.




A  
1 m 10 cm




B  
101 cm




C  
550 mm



D  
98 cm

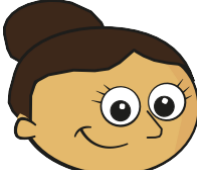


E  
1 m 12 cm




Amir

My sunflower is twice as tall as Teddy's.



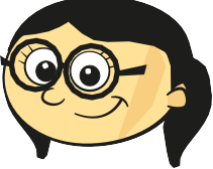
Dora

My sunflower is 3 cm taller than Mo's.



Mo

My sunflower is less than 1 m tall.



Annie

My sunflower is the tallest.

Write the owner of each sunflower.

sunflower A: Amir

sunflower D: Mo

sunflower B: Dora

sunflower E: Annie

sunflower C: Teddy