Volume of a cuboid

1 Here is a cuboid made up of cubes.
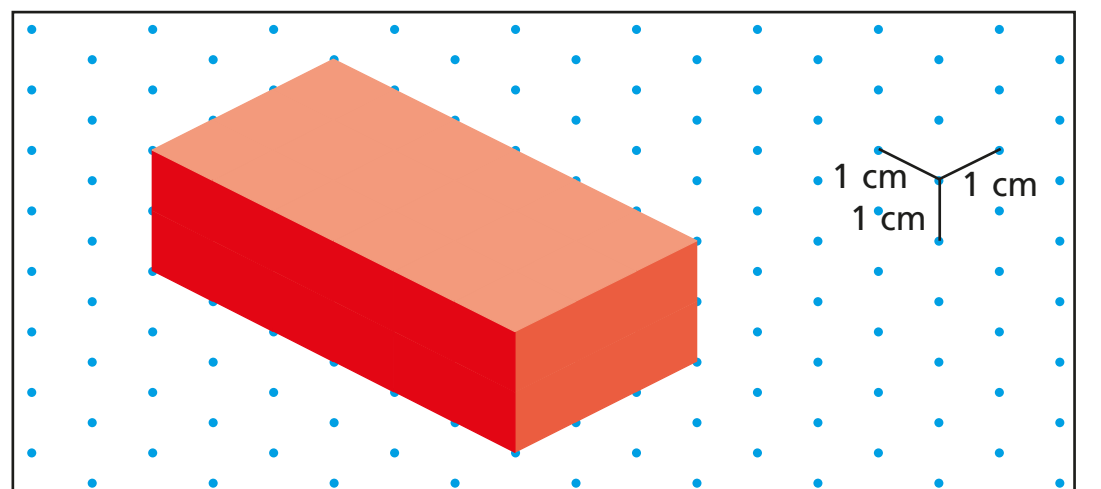

1 cm 1 cm 1 cm
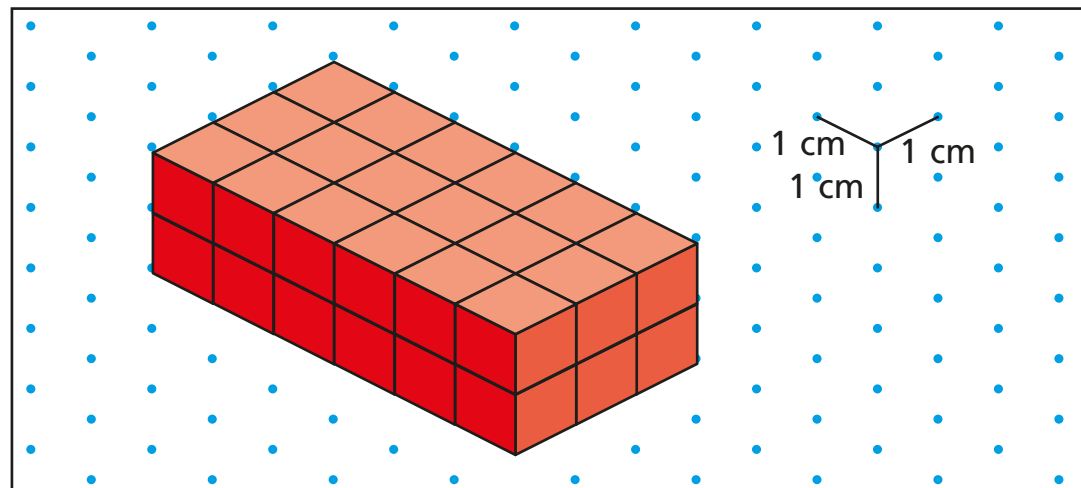
a) What is the volume of the cuboid?

volume = **36** cm³

b) Explain your method for finding the volume.

c) What is the volume of this cuboid?
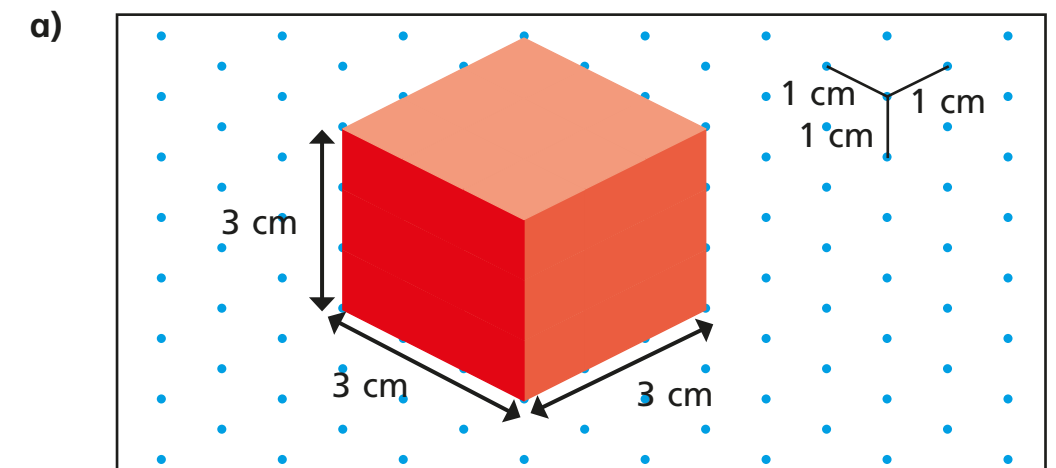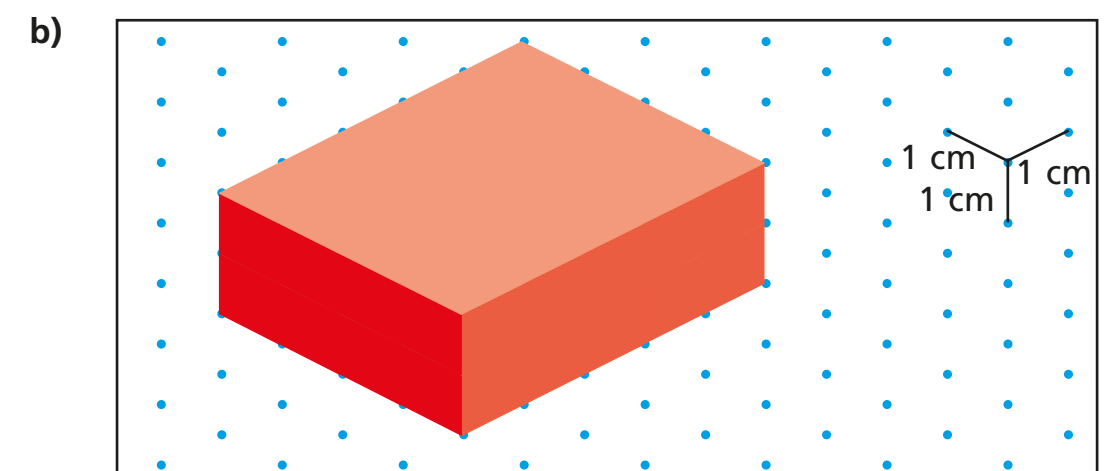

1 cm 1 cm 1 cm

volume = **36** cm³

d) What is the same and what is different about the cuboids?

2 Find the volume of the cuboids.
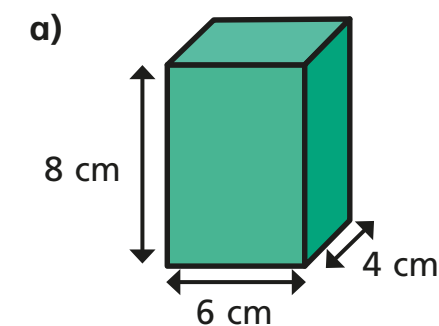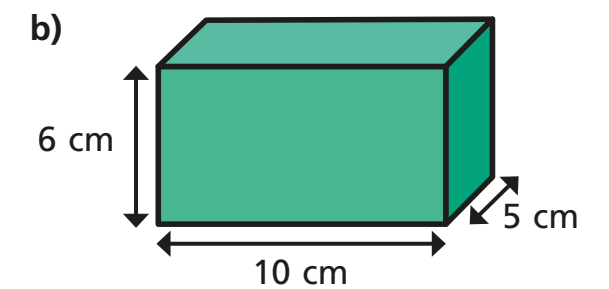
You can make them with cubes if it helps.

a)

3 cm   3 cm   3 cm   1 cm 1 cm 1 cm

volume = **27** cm³

b)

1 cm 1 cm 1 cm

volume = **40** cm³

3 Calculate the volumes of the cuboids.

a)

8 cm   6 cm   4 cm

volume = **192** cm³

b)

6 cm   10 cm   5 cm

volume = **300** cm³

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4 Calculate the volumes of the cubes.

a)

5 cm

volume = 125 cm³

b)

7 mm
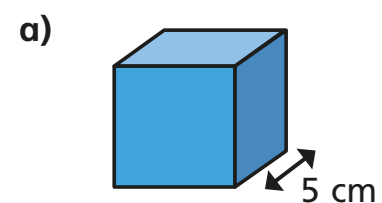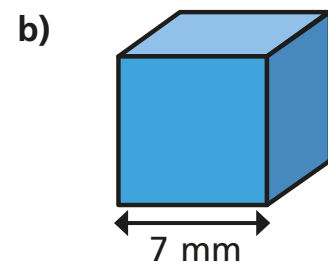
volume = 343 mm³

5 The volume of the cuboid is 60 m³

Find the missing length.

5 m

3 m

4 m
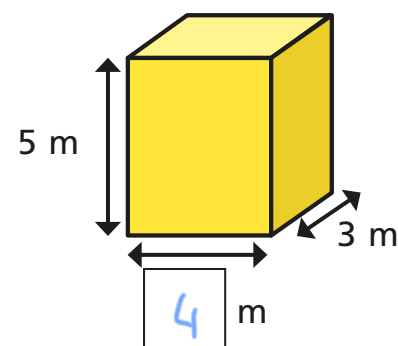
6 Calculate the volume of the cuboid.

$\frac{1}{2}$ m

1 m

30 cm
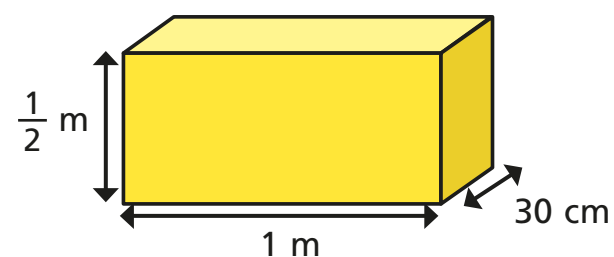
volume = 150,600 cm³

7 a) Calculate the volumes of the two cuboids.

4 cm

4 cm

2 cm

32 cm³

2 cm

8 cm

2 cm
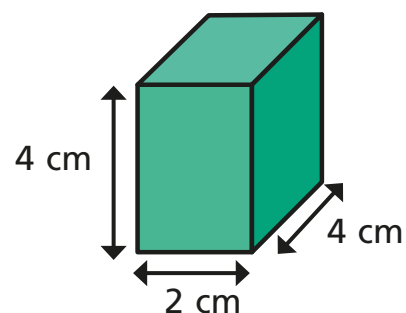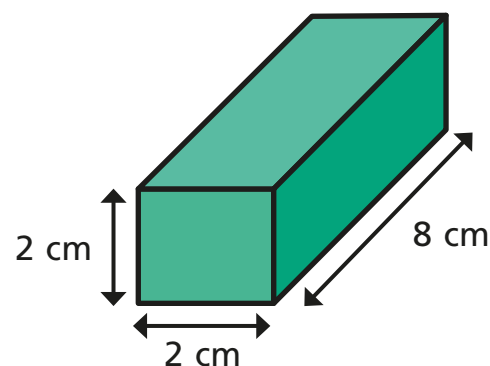
32 cm³

What do you notice?

b) Draw two different cuboids that have a volume of 24 cm³

e.g.

8cm

1cm

3cm

2cm

6 cm

2cm
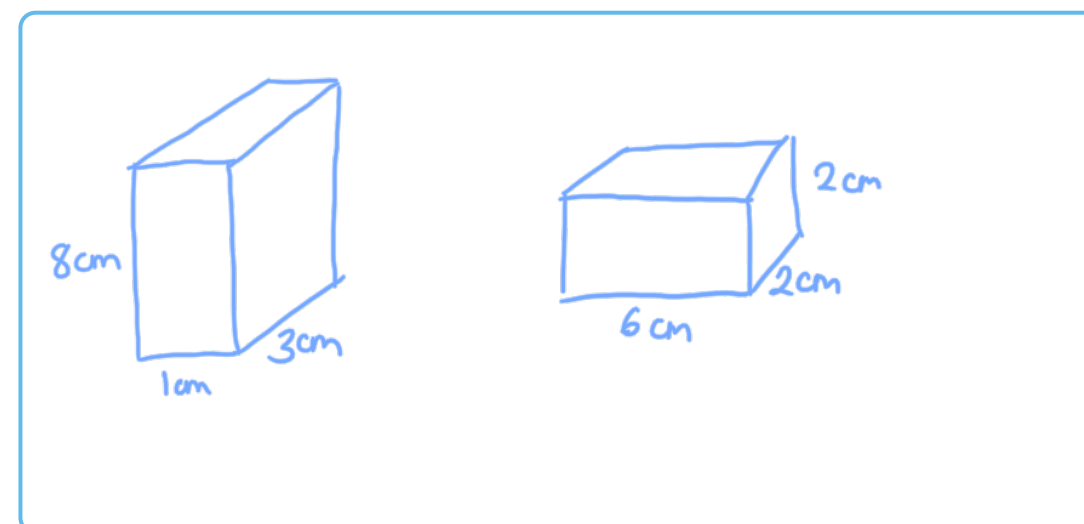
8 Calculate the total volume of the shape.

2 cm

5 cm

6 cm

2 cm

8 cm
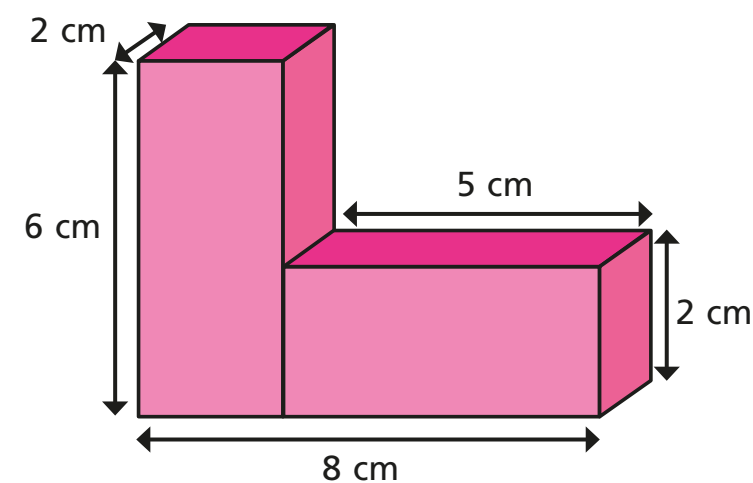
volume = 56 cm³

Was there another method you could have used?