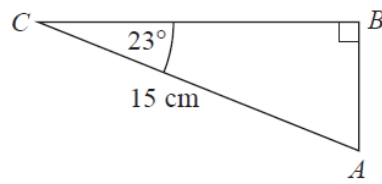


- 1 ABC is a right-angled triangle.



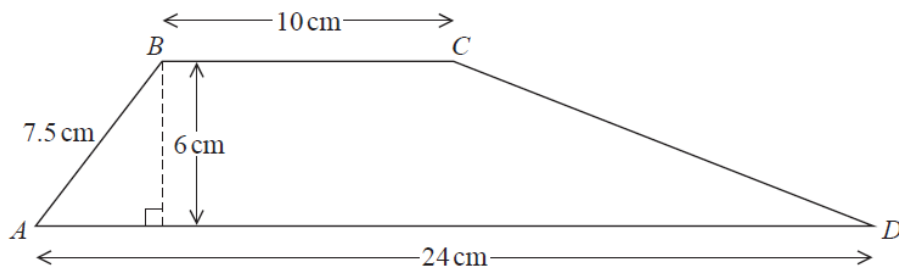
Calculate the length of AB .

Give your answer correct to 3 significant figures.

.....cm

(Total for Question is 2 marks)

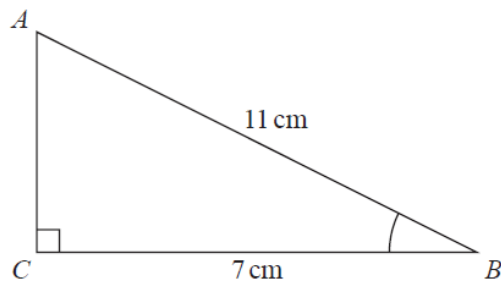
2 $ABCD$ is a trapezium.



Work out the size of angle CDA .
Give your answer correct to 1 decimal place.

.....
(Total for Question 2 is 5 marks)

- 3 ABC is a right-angled triangle.



- (a) Work out the size of angle ABC .
Give your answer correct to 1 decimal place.

.....
(2)

The length of the side AB is reduced by 1 cm .

The length of the side BC is still 7 cm .

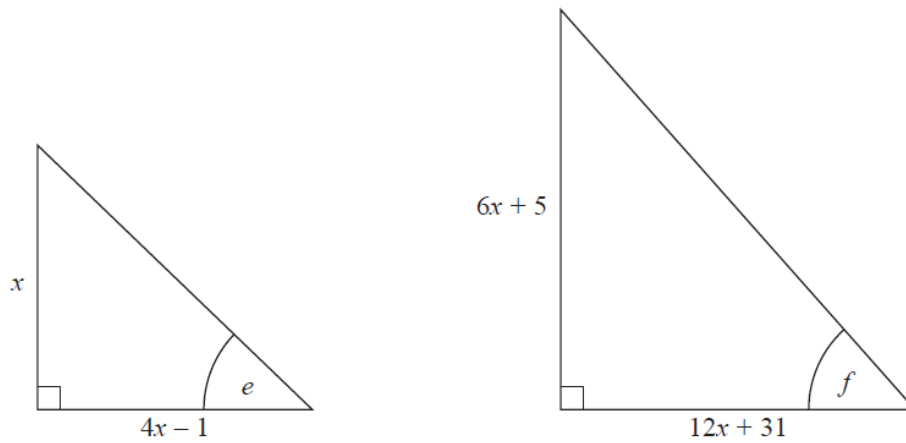
Angle ACB is still 90°

- (b) Will the value of $\cos ABC$ increase or decrease?
You must give a reason for your answer.

.....
(1)

(Total for Question is 3 marks)

4 Here are two right-angled triangles.



Given that

$$\tan e = \tan f$$

find the value of x .

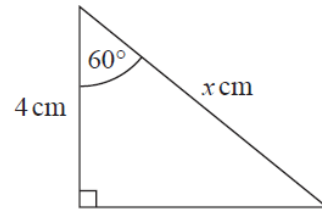
You must show all your working.

.....
(Total for Question is 5 marks)

- 5 (a) Write down the exact value of $\tan 45^\circ$

.....
(1)

Here is a right-angled triangle.



$$\cos 60^\circ = 0.5$$

- (b) Work out the value of x .

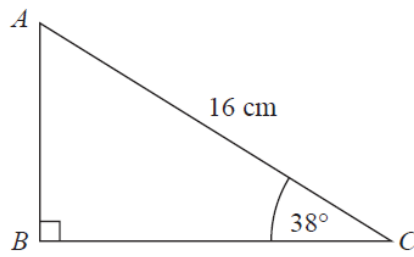
.....
(2)

(Total for Question is 3 marks)

- 6 Find the exact value of $\tan 30^\circ \times \sin 60^\circ$
Give your answer in its simplest form.

.....
(Total for Question is 2 marks)

7 ABC is a right-angled triangle.

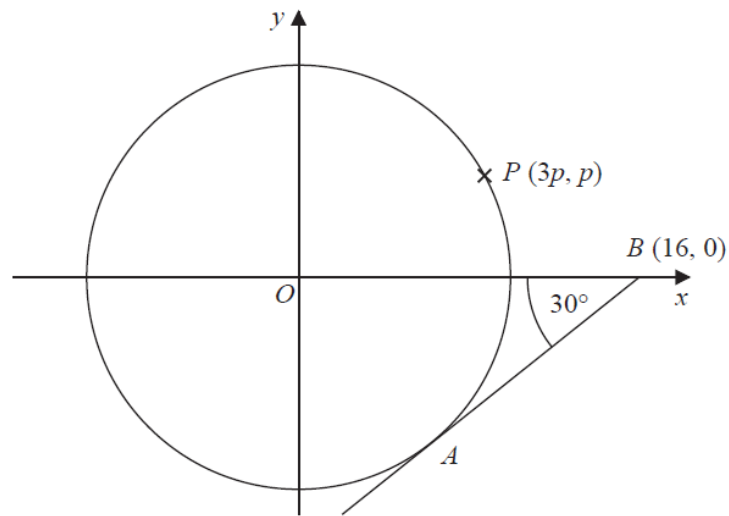


Calculate the length of AB .
Give your answer correct to 2 decimal places.

.....cm

(Total for Question is 2 marks)

- 8 The diagram shows a circle, centre O .



AB is the tangent to the circle at the point A .
Angle $OBA = 30^\circ$

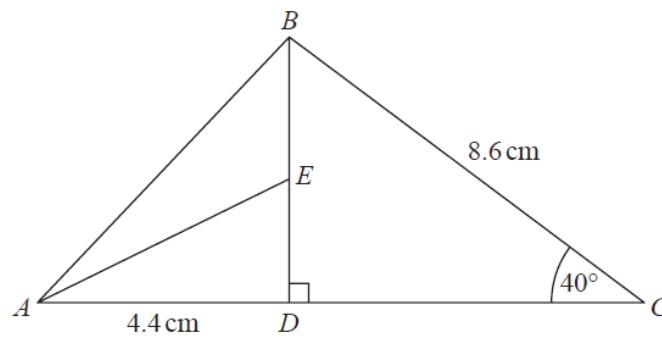
Point B has coordinates $(16, 0)$
Point P has coordinates $(3p, p)$

Find the value of p .
Give your answer correct to 1 decimal place.
You must show all your working.

$p = \dots\dots\dots$

(Total for Question is 4 marks)

9 The diagram shows triangle ABC .



ADC and DEB are straight lines.

$$AD = 4.4 \text{ cm}$$

$$BC = 8.6 \text{ cm}$$

E is the midpoint of DB .

$$\text{Angle } CDB = 90^\circ$$

$$\text{Angle } DCB = 40^\circ$$

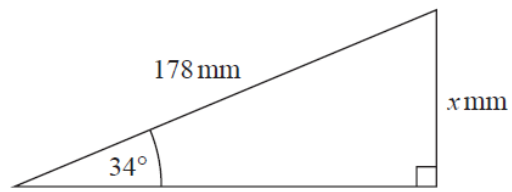
Work out the size of angle EAD .

Give your answer correct to 1 decimal place.

You must show all your working.

.....
(Total for Question is 4 marks)

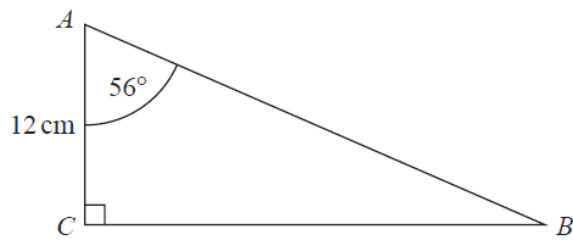
10



Work out the value of x .
Give your answer correct to 1 decimal place.

.....
(Total for Question is 2 marks)

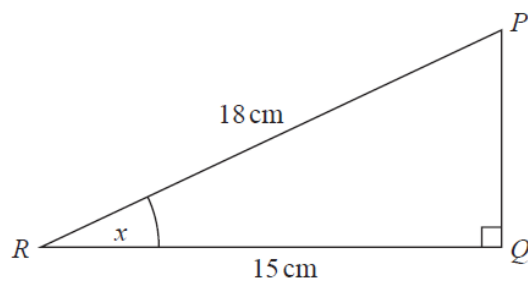
11 ABC is a right-angled triangle.



- (a) Work out the length of BC .
Give your answer correct to 1 decimal place.

..... cm
(2)

PQR is a right-angled triangle.



- (b) Work out the size of the angle marked x .
Give your answer correct to 1 decimal place.

.....
(2)

(Total for Question is 4 marks)