## Maths HL7 Extended - Trigonometric equations, Sine and Cosine rules

Solve these equations for angles in the range  $0^{\circ} \le x \le 180^{\circ}$ 

- $1 \cos x = 0.2$
- $2 \cos x = 0.7$

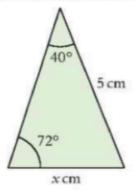
 $3 \sin x = 0.88$ 

- $4 \cos x = -0.35$
- $5 \sin x = 0.2$

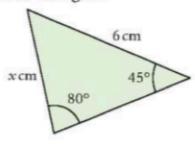
 $6 \sin x = 1$ 

**7** Find the value of x for each of these triangles.

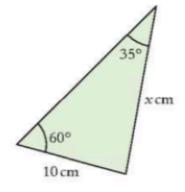
a



b

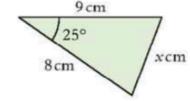


C

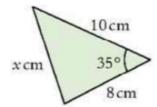


8 Find the length of x for each of these triangles.

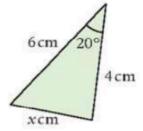




b

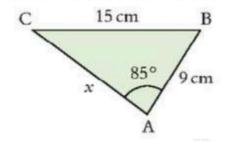


C

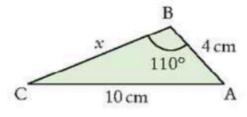


**9** Find the length of x for each of these triangles.

a



b



- 10 ABCD is a quadrilateral.
  - a Find the length of BD.
  - b Calculate the size of angle BCD. 3 cm

