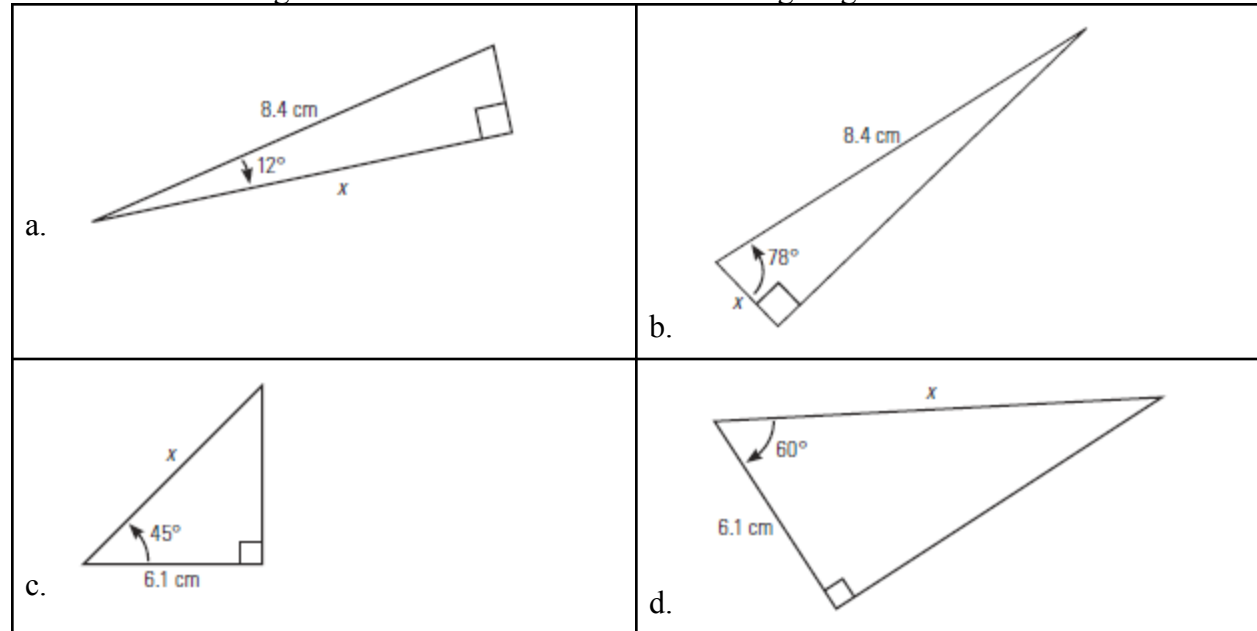


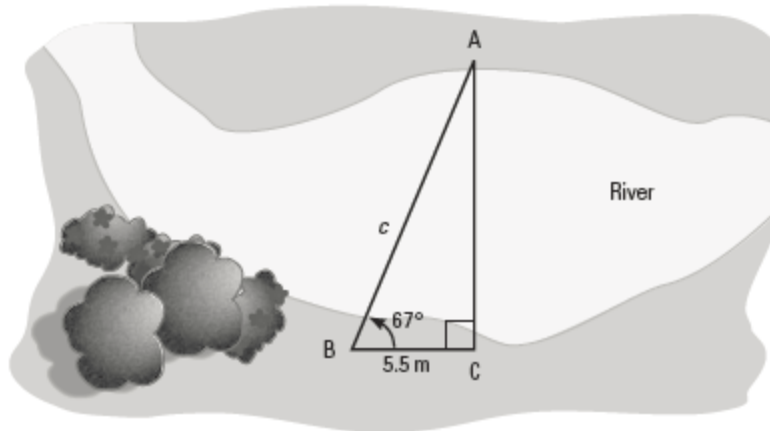
**Unit 5 - WA10.8 - Trigonometry Practice Questions #2**

Be sure to input your answers here to receive credit: <https://bit.ly/2YQWKj6>

1. Calculate the length of the side indicated in the following diagrams.



- How far from the base of a flagpole must a guy wire be fixed if the wire is 14 metres long and it makes an angle of  $63^\circ$  with the ground?
- Reba walks 29 yards across the diagonal of a rectangular field. If the angle between the width and the diagonal is  $67^\circ$ , how wide is the field?
- A square-based pyramid has a slant height of 11 metres. The slant height makes an angle of  $70^\circ$  with the ground. What is the length of a side of the pyramid? Be careful!
- Arul needs to string a bridge line across the river from A to B. What must the length of the bridge line be, given his measurements?



- What is the length of a rafter that makes an angle of  $35^\circ$  with the floor of an attic whose centre is 8.6 metres from the edge?
- An airplane starts descending at an angle of depression of  $5^\circ$ . If the horizontal distance to its destination is 500 kilometres, what is the actual distance the airplane will travel before it lands?