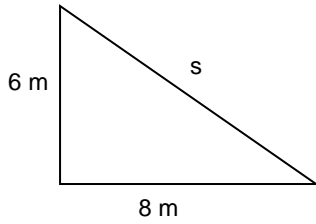


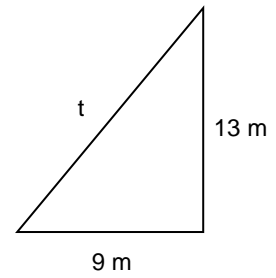
Pythagoras and Trigonometry Revision Sheet

1. Find the side or angle marked s, t, u etc. in the following diagrams. Answer in your book and show your working – or else!

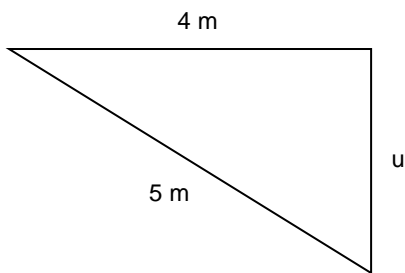
a.



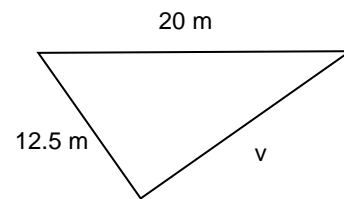
b.



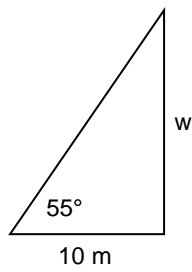
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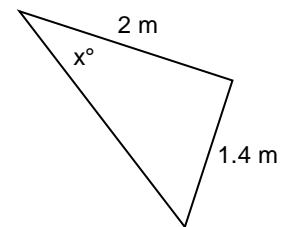
d.



e.



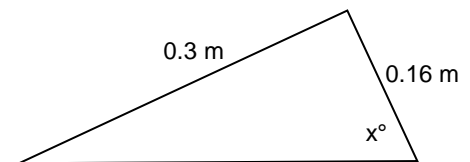
f.



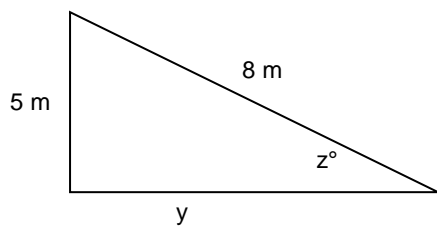
g.



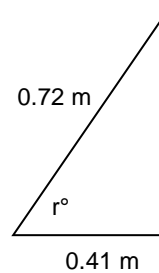
h.



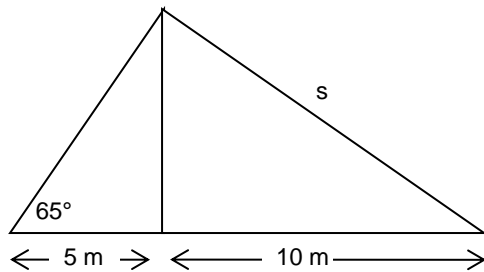
i.



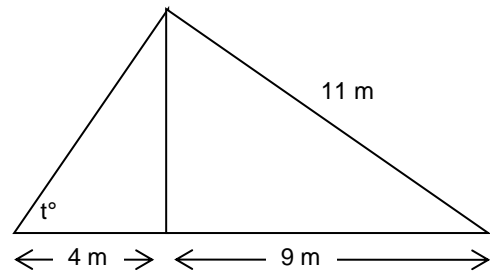
j.



k.



l.



2. A 12 m flagpole is held up by 15 m cables attached to the top of the pole and to the ground. How far from the base of the pole are the cables attached to the ground?
3. What is the angle between the cables and the pole in the previous question?
4. A rectangle has a length of 1.2 m and its diagonal is 1.84 m long. How wide is it?
5. A little old lady measured a tree with a clinometer. When he stood 24 m from the tree, the angle to the top was 37° . Her eyeballs are 1.2 m above the ground. How tall was the tree?
6. A 6 m ladder is leaning against a wall. If the top is 4.2 m up the wall, how far is the bottom from the wall?
7. A man in a boat sees a bomb explode in the air at an angle of elevation of 42° . By timing the arrival of the sound, he worked out that the bomb went off 3.7 km from him. At what altitude did it go off?
8. The distance between the opposite corners of a square is 90 cm. What is the area of the square?