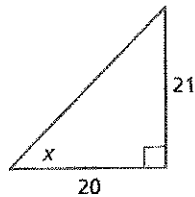


1. To guard against a fall, a ladder should make an angle of 75 degrees or less with the ground.

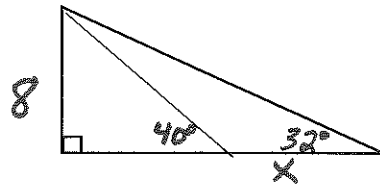
- a) What is the maximum height that a 20 foot ladder can reach safely?
- b) How far from the building is the base of the ladder at the maximum height?

2. Which of the following statements must be true?

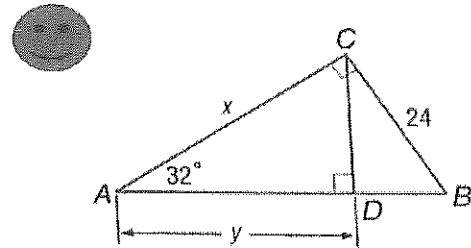
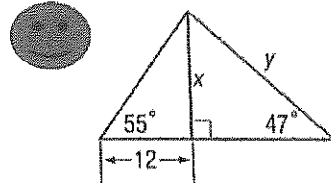
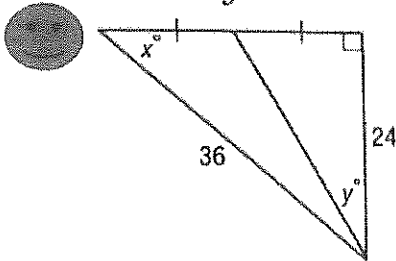


- a. $x < 45^\circ$
- b. $x = 45^\circ$
- c. $x > 45^\circ$
- d. Not enough information to determine x

3. Find x in the following diagram:



4. Find x and y . Round to the nearest tenth.



5. Without using a calculator, find each of the following:

	Sin	Cos	Tan
30°			
45°			
60°			