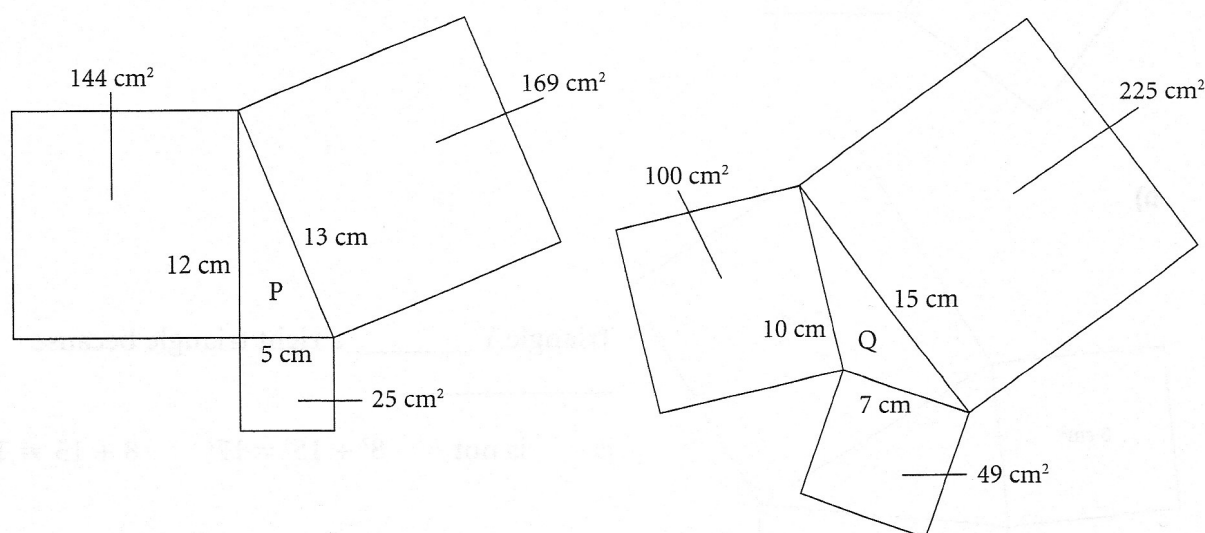




Quick Review

- The Pythagorean Theorem is true for right triangles only.
- To see which triangle is a right triangle, check to see if the area of the square on the longest side is equal to the sum of the areas of the squares on the other two sides.

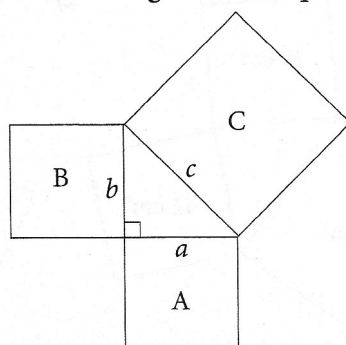


$$25 \text{ cm}^2 + 144 \text{ cm}^2 = 169 \text{ cm}^2$$

$$49 \text{ cm}^2 + 100 \text{ cm}^2 \neq 225 \text{ cm}^2$$

The Pythagorean Theorem applies to triangle P, but not to triangle Q.

- A set of three whole numbers that satisfy the Pythagorean Theorem is called a Pythagorean triple. For example, 5-12-13 is a Pythagorean triple because $5^2 + 12^2 = 13^2$.
- For a right triangle:
area of square on the longest side (square C) = area of square A + area of square B

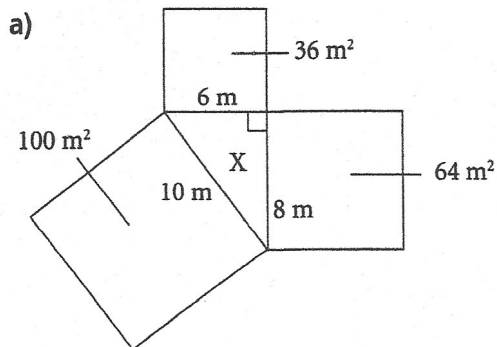


- For a Pythagorean triple a - b - c :

$$c^2 = a^2 + b^2$$

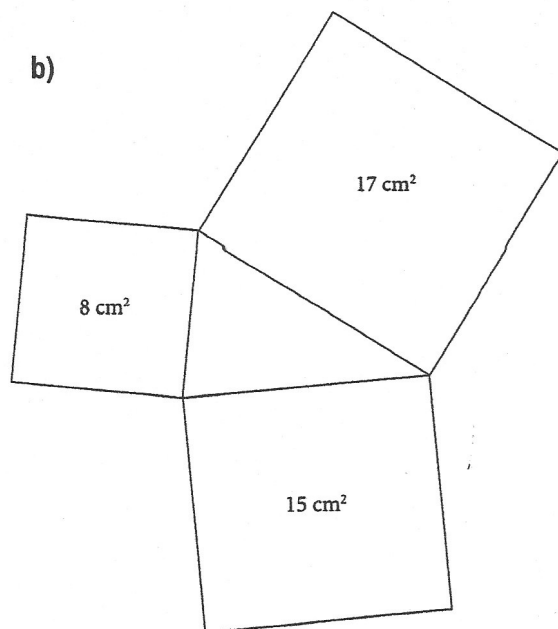
Practice

1. Fill in the blanks from the list of choices to make the sentence true.



Triangle X _____ a right triangle because

is is not $6 + 8 \neq 10$ $100 = 64 + 36$



Triangle Y _____ a right triangle because

is is not $8^2 + 15^2 = 17^2$ $8 + 15 \neq 17$

2. Which of the following triangles are right triangles? Explain.

