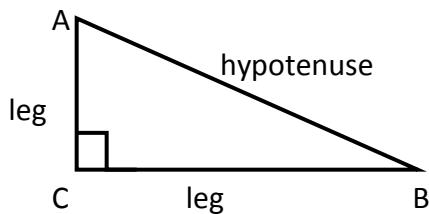


MPM 1D

THE PYTHAGOREAN THEOREM

Given a right-angled triangle, there is a relationship amongst its 3 sides.

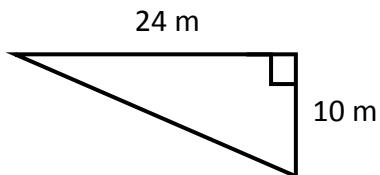


$$(AB)^2 = (AC)^2 + (BC)^2$$

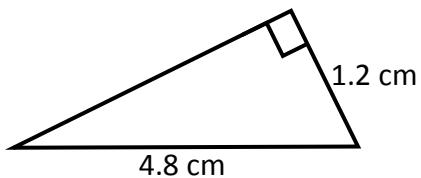
$$c^2 = a^2 + b^2$$

EXAMPLES: Solve for each unknown side.

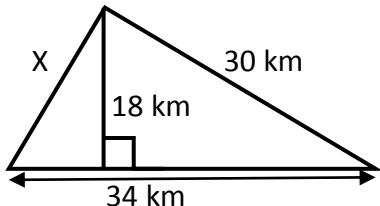
1.



2.



3.



4. The bottom of a rectangular briefcase has a length of 60 cm and a width of 40 cm. What is the longest umbrella that will fit at the bottom of the briefcase?



5. A box has a side length of 0.8 m. What is the longest stick that will fit inside the box?

