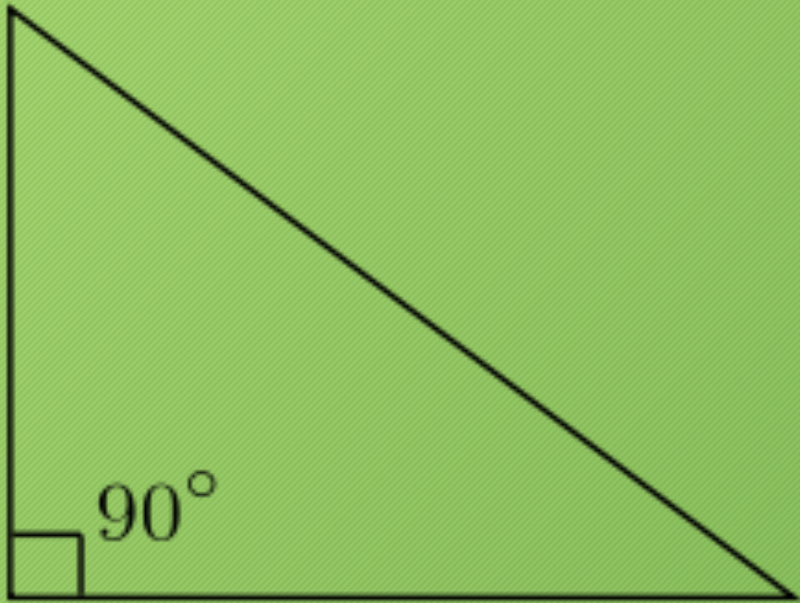


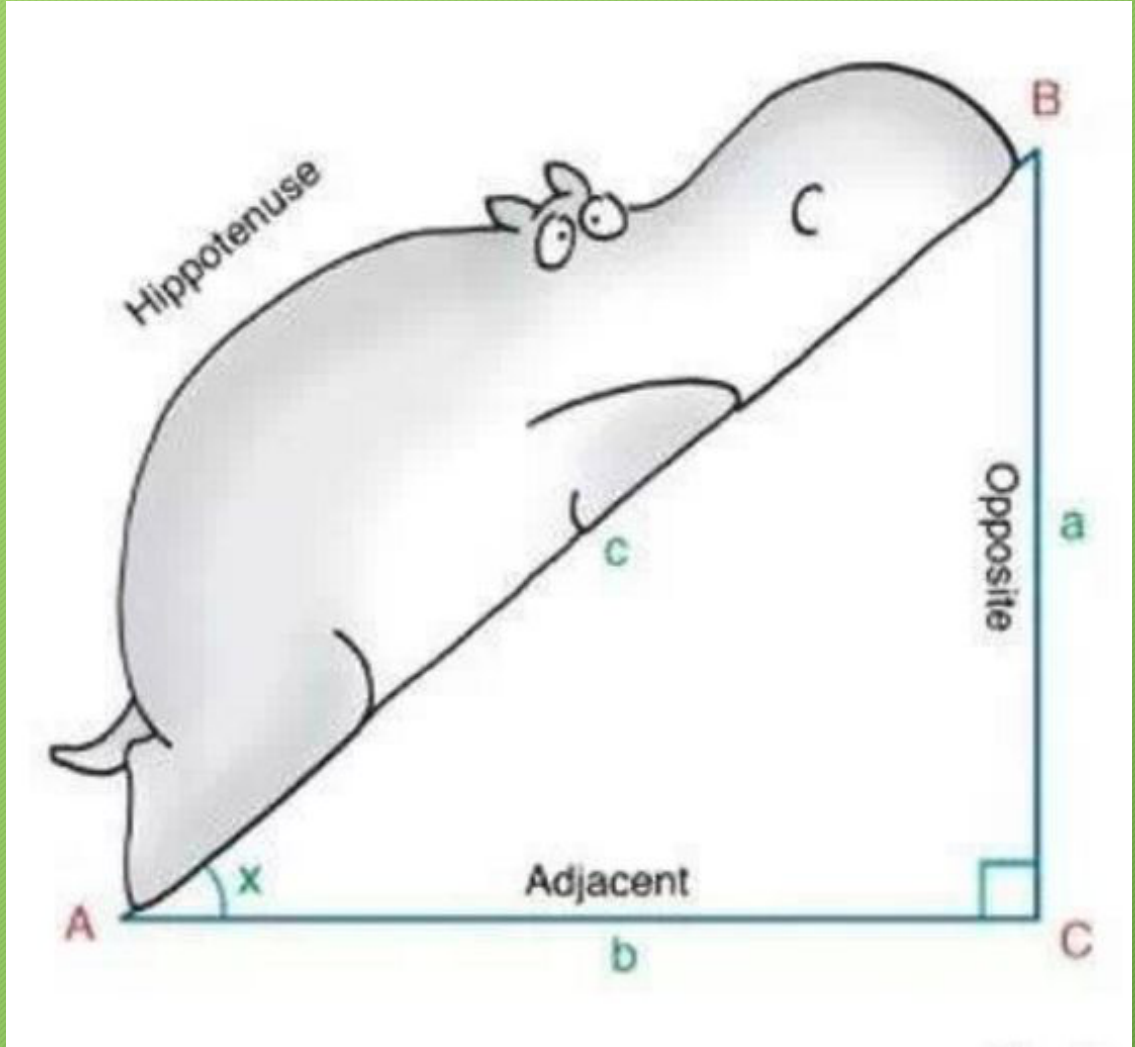
1.17 PYTHAGOREAN THEOREM

RIGHT TRIANGLES



Legs: two shorter sides of the right triangle
angles $\angle a$ & $\angle b$

Hypotenuse: the longest side;
opposite the right angle
angle $\angle c$



FORMULA:

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

- Find the length of the leg of a right triangle whose hypotenuse is 10 cm and leg is 6 cm.
- Find the length of the hypotenuse of a right triangle whose legs measure 5 cm and 12 cm.

FORMULA:

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

- One leg of a right triangle measures 15 cm. The hypotenuse measures 17 cm. Find the length of the other leg.
- The legs of a right triangle measure 9 cm and 12 cm. What is the length of the hypotenuse?