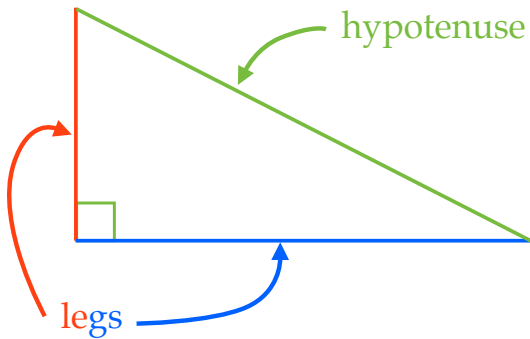


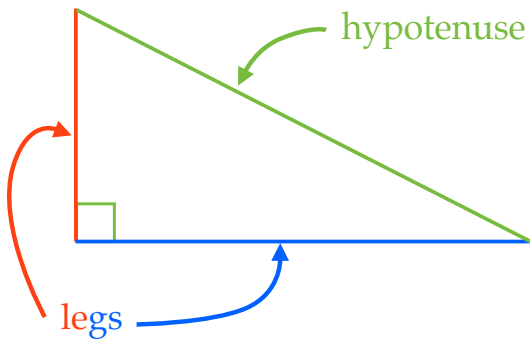
Right Triangles



On a right triangle, the **hypotenuse** is the side opposite the **right angle**. It is always the longest.

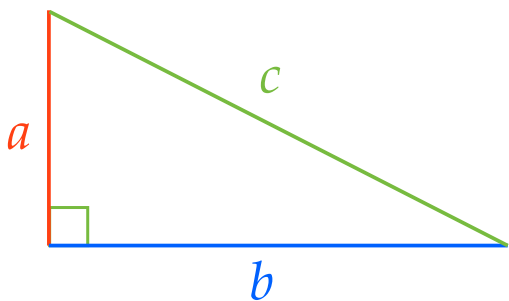
The other two sides are the **legs**.

Right Triangles



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The Pythagorean Theorem

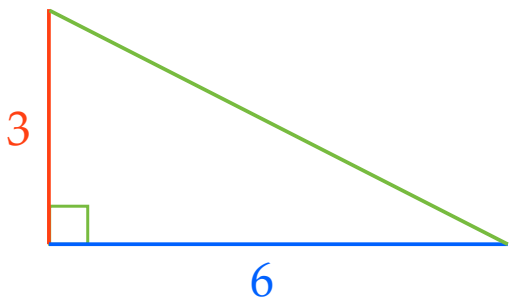
The sum of the **squares** of the **legs** of a right triangle is equal to the **square** of the **hypotenuse**.

$$\text{leg}^2 + \text{leg}^2 = \text{hypotenuse}^2$$

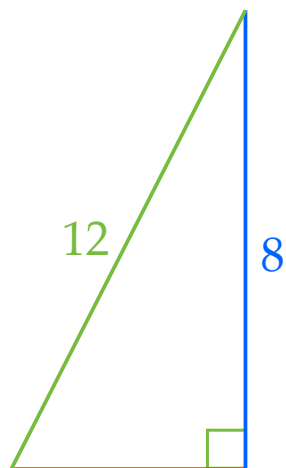
$$a^2 + b^2 = c^2$$

Given two sides of a right triangle, we can use the Pythagorean Theorem to solve for the third side.

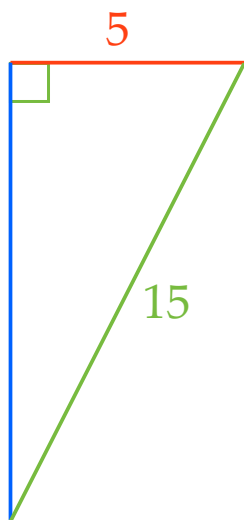
Solve for the missing side using the Pythagorean Theorem: $a^2 + b^2 = c^2$

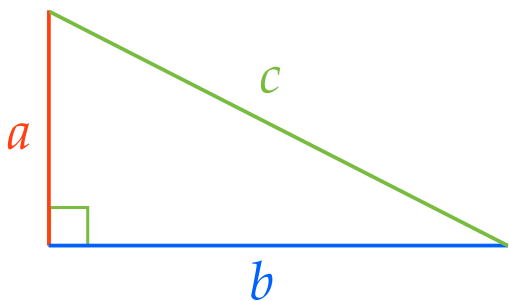


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The Pythagorean Theorem

The sum of the **squares** of the **legs** of a right triangle is equal to the **square** of the **hypotenuse**.

$$\text{leg}^2 + \text{leg}^2 = \text{hypotenuse}^2$$

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

Given two sides of a right triangle, we can use the Pythagorean Theorem to solve for the third side.