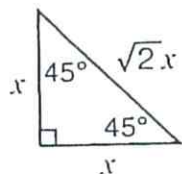


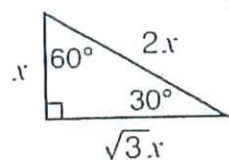
Name _____

Special Right Triangles

Remember

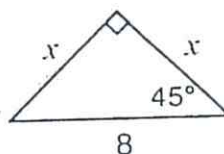


1. In a **45°-45°-90°** right triangle, the hypotenuse is $\sqrt{2}$ times as long as each leg.



2. In a **30°-60°-90°** right triangle, the hypotenuse is twice as long as the short leg. The long leg is $\sqrt{3}$ times as long as the short leg.

Example: Find the missing lengths.



$$\begin{aligned}\sqrt{2}x &= 8 \\ x &= \frac{8}{\sqrt{2}} \\ &= \frac{8}{\sqrt{2}} \cdot \frac{\sqrt{2}}{\sqrt{2}} \\ &= \frac{8\sqrt{2}}{2} \\ &= 4\sqrt{2}\end{aligned}$$

Use the 30°-60°-90° and the 45°-45°-90° triangle relationships to solve for the missing sides. Follow your answers in alphabetical order through the maze.

