



Math Virtual Learning

# Geometry

April 10, 2020

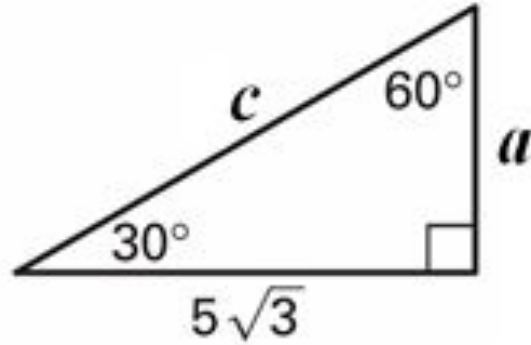


# Geometry

## Lesson: April 10, 2020

Objective/Learning Target:  
Students will solve problems using special right triangles.

**Bell Ringer:**  
Find the missing sides.





**Bell Ringer Answer:  $a = 5$  ,  $c = 10$**

**Let's Get Started:**

Watch Video: [Solving Special Right Triangles](#)

After you complete video, move on to the practice problems provided.

**Practice:** Try the following problems shown below. Then, use the provided answer key to check your work.

- 1) The diagonal of a square is 14 units, find the length of each side of the square.
- 2) The diagonal of a square is  $10\sqrt{2}$  units, find the perimeter of the square.
- 3) At a point 500 miles north of a ship, the shoreline runs east and west. East of that point, the navigator sights a lighthouse at a 60 degree angle. How far is the ship from the lighthouse?
- 4) A ladder leaning against a wall makes a 60 angle with the ground. The base of the ladder is 3ft from the building. How high above the ground is the top of the ladder?



### **Answer Key:**

Here you will find the answers to the previous four questions.  
Check your answers below.

- 1)  $7\frac{1}{2}$  units
- 2) Perimeter = 10 units
- 3)  $500\frac{1}{3}$  miles or approximately 866.03 miles
- 4)  $3\frac{1}{3}$  ft or approximately 5.20 ft



## **Additional Resources:**

Click on the link below to get additional practice and to check your understanding!

[Special Right Triangles Extra Practice and Explanation](#)