

Math 2 Honors – Unit 1 Trigonometry - Spring 2017

I can:

- identify the trigonometric ratios sine, cosine, and tangent of an acute angle given a right triangle.
- create equations in one variable that represent right triangle trigonometric relationships between quantities and use them to solve problems.
- discover the three trigonometric ratios for the acute angles of a right triangle using the side lengths of similar triangles.
- choose the correct method to solve problems involving right triangles in terms of context.
- use pythagorean theorem to develop a 45-45-90 triangle.
- use equilateral triangles and pythagorean theorem to develop 30-60-90 triangles.

I understand:

- there are three specific trigonometric ratios based on the location of the acute angle
- how to solve for a missing side or angle in a right triangle using trigonometric functions.
- the trigonometric ratios of similar right triangles are equal.
- in right triangles that I can use Pythagorean Theorem or Trigonometric Ratios to solve for missing pieces.
- in all 45-45-90 triangles the sides lengths have the same relationships.
- in all 30-60-90 triangles the sides lengths have the same relationships.
- are two types of special right triangles (45-45-90 and 30-60-90) and can use these special relationships to solve problems.