

Trigonometry HW 2

Find the missing sides in the following right triangles.

1)

2)

3)

4)

5) $\sqrt{-(-9)^2} = ?$ (Note: $i = \sqrt{-1}$)

(a) $9i$

(b) $9 + i$

(c) $9 - i$

(d) 9

(e) -9

Challenge

In the figure below XYZ is an equilateral triangle. YW is perpendicular to XZ and has a length of $2\sqrt{3}$ inches. What is the area, in square inches, of $\triangle XYZ$? (*Hint*: Recall that the area of a triangle is $\frac{1}{2}bh$ where b is the base of the triangle and h is the height of the triangle.)

