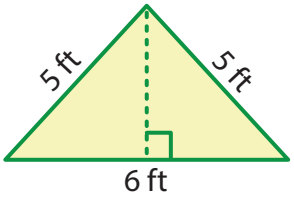
AREA OF ISOSCELES TRIANGLE

Name _____

Score _____

AT:32

Example : Find the area of the triangle and round it to two decimal places.



$$\text{Height}(h) = \sqrt{a^2 - \frac{b^2}{4}}$$

$a = 5$ ft, $b = 6$ ft

$$h = \sqrt{5^2 - \frac{6^2}{4}} = \sqrt{25 - \frac{36}{4}}$$

$$= \sqrt{25 - 9} = \sqrt{16} = \mathbf{4\ ft}$$

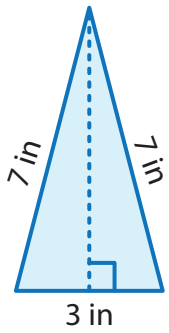
$$\text{Area} = \frac{1}{2} \times b \times h$$

$$= \frac{1}{2} \times 6 \times 4$$

$$= \mathbf{12\ ft^2}$$

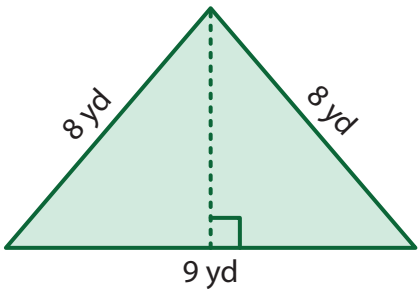
Find the area of the triangle and round it to two decimal places.

1)



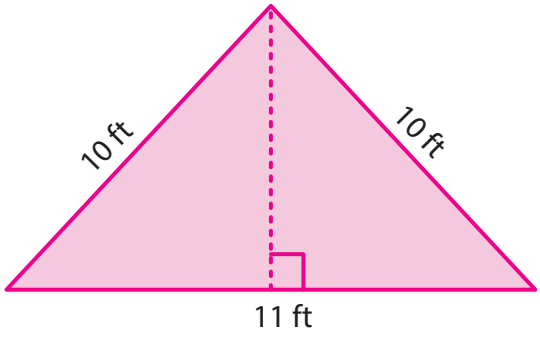
Area = _____

2)



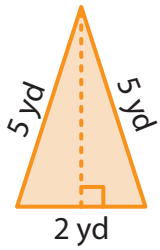
Area = _____

3)



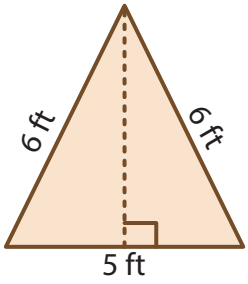
Area = _____

4)



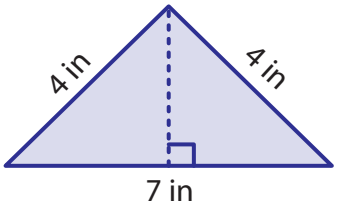
Area = _____

5)



Area = _____

6)



Area = _____

AREA OF ISOSCELES TRIANGLE

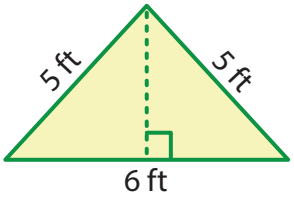
Name _____

Score _____

Answer key

AT:32

Example : Find the area of the triangle and round it to two decimal places.



$$\text{Height}(h) = \sqrt{a^2 - \frac{b^2}{4}}$$

$a = 5$ ft, $b = 6$ ft

$$h = \sqrt{5^2 - \frac{6^2}{4}} = \sqrt{25 - \frac{36}{4}}$$

$$= \sqrt{25 - 9} = \sqrt{16} = \mathbf{4\ ft}$$

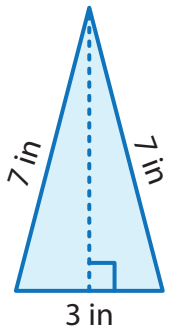
$$\text{Area} = \frac{1}{2} \times b \times h$$

$$= \frac{1}{2} \times 6 \times 4$$

$$= \mathbf{12\ ft^2}$$

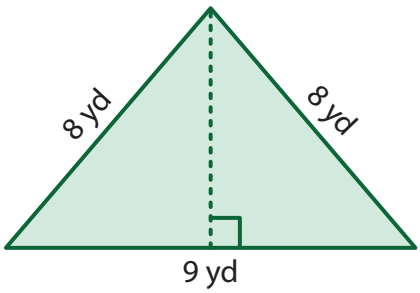
Find the area of the triangle and round it to two decimal places.

1)



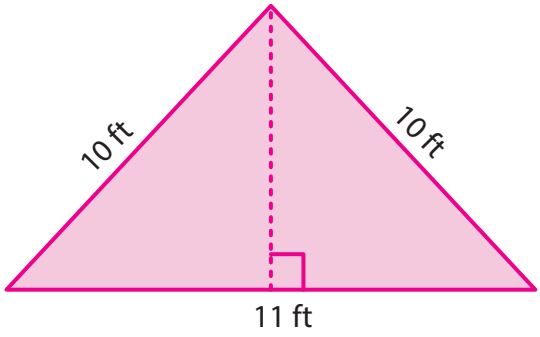
Area = **10.26 in²**

2)



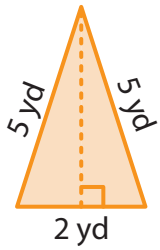
Area = **29.76 yd²**

3)



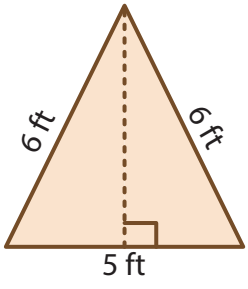
Area = **45.93 ft²**

4)



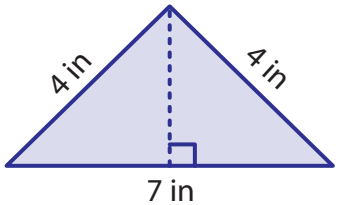
Area = **4.9 yd²**

5)



Area = **13.64 ft²**

6)



Area = **6.78 in²**