

Topic 13 Quiz Review Homework

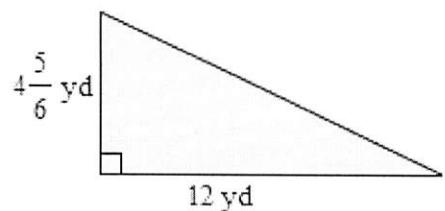
Name _____

1. Find the base of the rectangle as a fraction in simplest form if the area of the rectangle 12 square units.

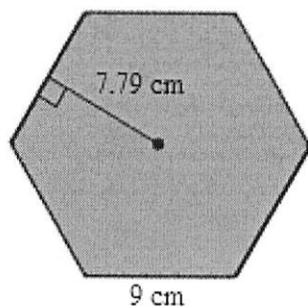
$$2\frac{2}{3}$$



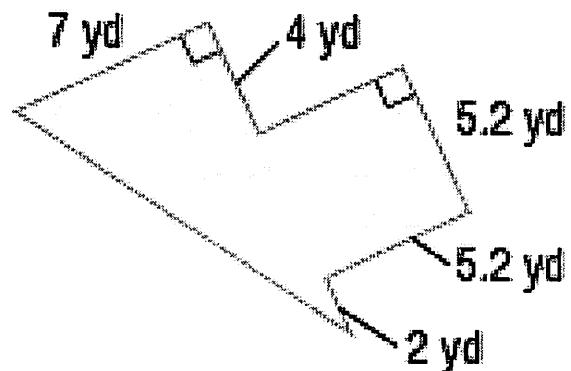
2. Find the area of the right triangle as a fraction in simplest form.



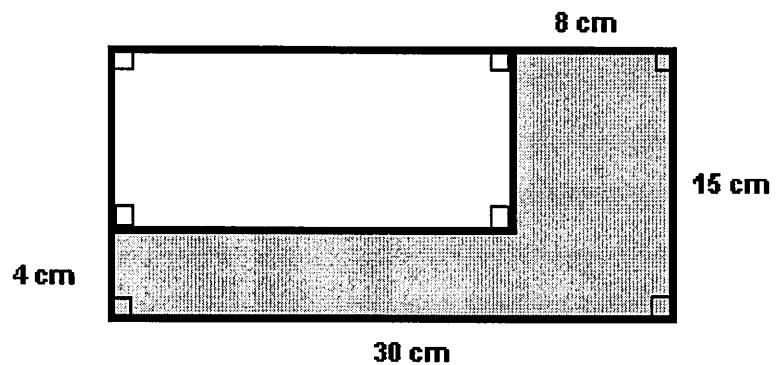
3. Find the area of the regular hexagon to the nearest whole cm.



4. Find the area of the figure. Round to the *nearest tenth*.



5. Find the area of the shaded region.



1. Find the base of the rectangle as a fraction in simplest form if the area of the rectangle 12 square units.

12

$$A = b \cdot h$$

$$A = 12$$

$$b = ?$$

$$h = 2\frac{2}{3} \text{ or } \frac{8}{3}$$

$$\begin{aligned} 12 &= b \cdot \frac{8}{3} \\ 12 &\div \frac{8}{3} = b \\ 12 \div 8 &= b \\ 3 &= b \end{aligned}$$

\rightarrow

$b = \frac{9}{2} = 4\frac{1}{2} \text{ units}$

2. Find the area of the right triangle as a fraction in simplest form.

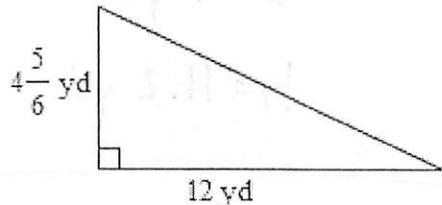
$$A = \frac{b \cdot h}{2}$$

$$A = ?$$

$$b = 12 \text{ yd}$$

$$h = 4\frac{5}{6} \text{ yd}$$

$$A = \frac{\frac{12}{1} \cdot \frac{29}{6}}{2} = \frac{58}{2}$$



$A = 29 \text{ yds}^2$

3. Find the area of the regular hexagon to the nearest whole cm.

Area Δ

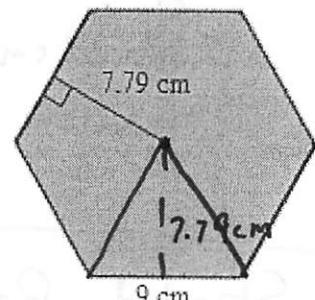
$$A = \frac{b \cdot h}{2}$$

$$A = \frac{9 \cdot 7.79}{2}$$

$$A = ?$$

$$b = 9 \text{ cm}$$

$$h = 7.79 \text{ cm}$$



$$A = 35.055 \times 6 \Delta's$$

$\text{Total Area: } 210.33 \approx 210 \text{ cm}^2$

4. Find the area of the figure. Round to the nearest tenth.

$$A = \frac{b \cdot h}{2}$$

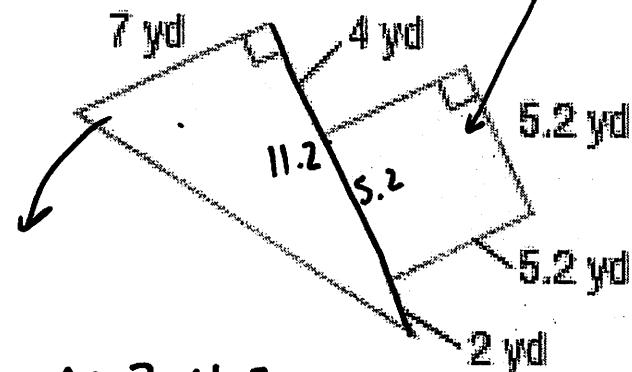
$$A = ?$$

$$b = 7 \text{ yd}$$

$$h = 11.2 \text{ yd}$$

$$A = \frac{7 \cdot 11.2}{2}$$

$$A = 39.2 \text{ yd}^2$$



$$A = b \cdot h$$

$$A = (5.2 \text{ yd} \times 5.2 \text{ yd})$$

$$A = 27.04 \text{ yd}^2$$

$$\boxed{\text{Total Area} = 66.24 \approx 66.2 \text{ yd}^2}$$

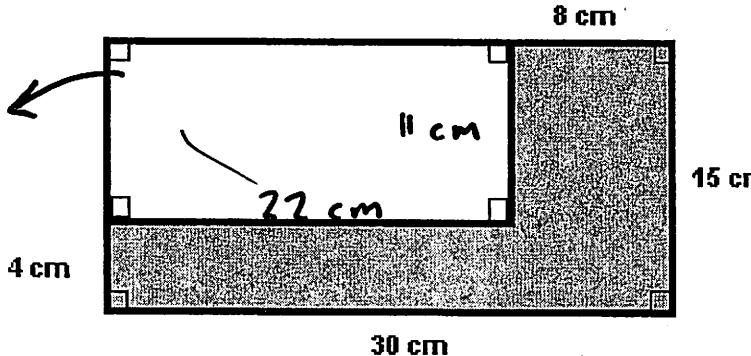
5. Find the area of the shaded region.

$$A = b \cdot h$$

$$A = ? \quad A = 22 \cdot 11$$

$$b = 22 \text{ cm} \quad A = 242 \text{ cm}^2$$

$$h = 11 \text{ cm}$$



Shaded Region

$$450 - 242 = 208 \text{ cm}^2$$

$$A = ? \quad A = 15 \cdot 30$$

$$b = 30 \text{ cm} \quad A = 450 \text{ cm}^2$$

Whole Shaded