Before we begin, are there any questions from last day's work?

6.1.2, 6.1.3   5-8, 12-16, 19, 20, 22

Today's Learning Goal(s):

By the end of the class, I will be able to:

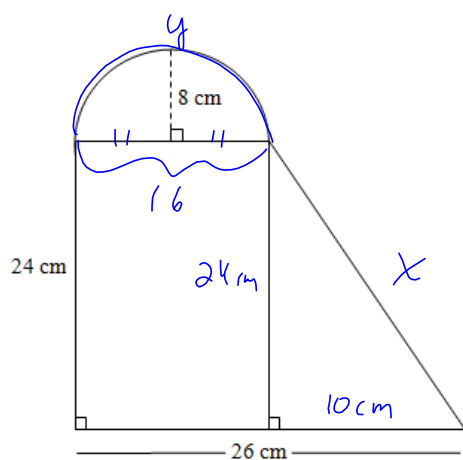a) calculate the perimeter and area of any 2-dimensional figure.

Today's work: 6.2.1   6cd, 8abd(ef), 9,10,(11)

6.2.2 (Formula Sheet)

6.2.1 Area of 2D Geometric Figures
        (including composite figures)

Date: _Dec. 6/19_

Ex. 1 a) Calculate the perimeter of the figure.
     b) Calculate the area of the figure. *(use the same diagram on the next slide)*

$$P = \underline{\quad} + | + \cap + \searrow$$

$$\doteq 26 + 24 + 25.133 + 26$$

$$\doteq 101.133 \text{ cm}$$

$$\cap = \tfrac{1}{2} \text{ Circ.}$$

$$y = \tfrac{1}{2}(2\pi r)$$

$$= \pi r$$

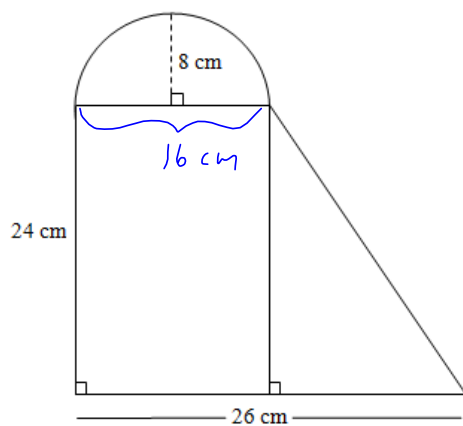$$= \pi(8)$$

$$\doteq 25.133$$

$$x^2 = 24^2 + 10^2$$

$$= 676$$

$$x = \sqrt{676}$$

$$= 26$$

101.133 cm

b) Calculate the area of the figure.

604.531 cm²

8 cm

16 cm

24 cm

26 cm

$A_{total} = A_{\frac{1}{2}circle} + A_{TRAPEZOD}$

$= \frac{1}{2}\pi r^2 + \frac{1}{2}h(a+b)$

$= \frac{1}{2}\pi(8)^2 + \frac{1}{2}(24)(26+16)$

$\doteq 100.531 + 504$

$\doteq 604.531 \ cm^2$