

Unit 2 Discussion Example – Post 1: Initial Thread

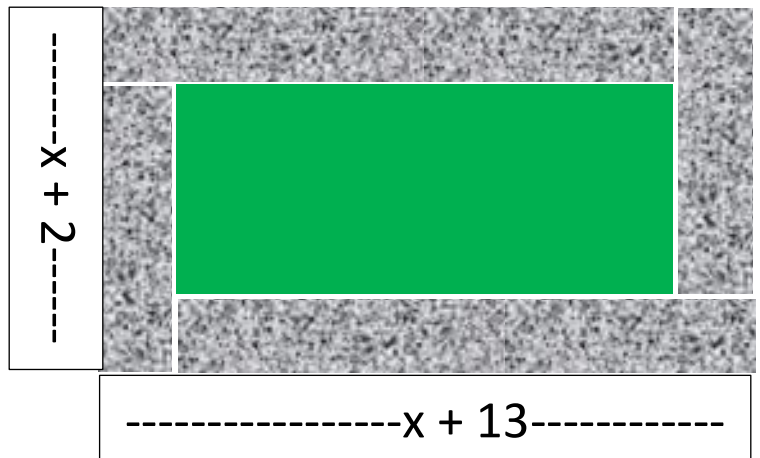
Putting It Together and Taking It Apart

- a) I will choose a rectangle with area, $A = \text{length} * \text{width}$
- b) The length of my bed will be 13 feet and then I will add a walkway of unknown dimension, x . The total length is $(13 + x)$ or $(x + 13)$.
The width of my garden is 2 feet and then I will add a walkway to that of unknown dimension but the same as around the length, x . The total width would be $(2 + x)$ or $(x + 2)$.

c)



(Image by Paul Neumann from Pixabay)



d) Length, $l = x + 13$ feet

Width, $w = x + 2$ feet

To find the area, I need to calculate $A = l * w$

Area = $(x + 13)(x + 2)$ I can FOIL this to get:

$$\text{First} = x * x = x^2$$

$$\text{Inner} = 13 * x = 13x$$

$$\text{Outer} = x * 2 = 2x$$

$$\text{Last} = 13 * 2 = 26$$

$$= x^2 + 13x + 2x + 26$$

$$x^2 + 15x + 26 \text{ square feet}$$