

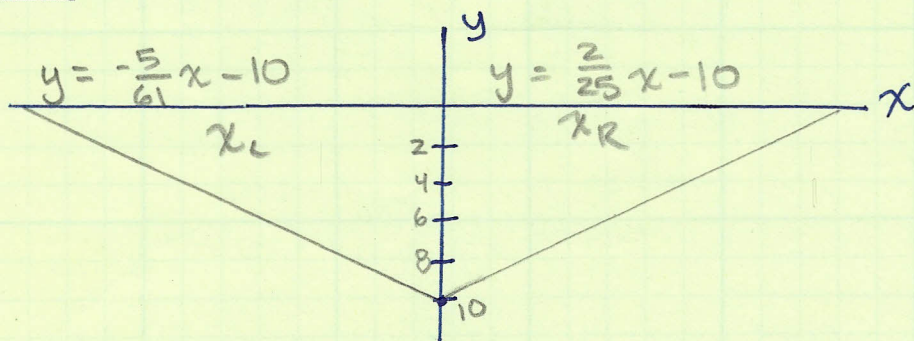
GRADED PROBLEMS

Ch. 2 Review, pg 116

59. FIND THE ANNUAL RATE OF CHANGE in number of Applications to medical school between 1982 and 1990.

$$\frac{\Delta y}{\Delta x} = \frac{29,000 - 36,000}{1990 - 1982} = \frac{-875 \text{ applications}}{\text{year}}$$

3.1 # 40 page 126 - Vietnam Veterans Memorial



a) How deep is the memorial where the two walls meet?

$$x = 0, \text{ so } \underline{\underline{10 \text{ feet}}}$$

b) How long is each section?

$$\text{where } y = 0; \quad 0 = \frac{2}{25}x - 10, \quad 10 = \frac{2}{25}x \quad x = \frac{250}{2}$$

$$\underline{\underline{x_R = 125 \text{ ft}}}$$

and

$$0 = -\frac{51}{61}x - 10$$

$$\underline{\underline{x_L = 10 \left(\frac{61}{5}\right) = 122 \text{ ft}}}$$

3.2 # 22 on page 134

$$-4x - 10y = 12$$

$$2(x + 5y = 2) \quad y = -\frac{1}{5}x + \frac{2}{5}$$

$$-4x - 10y = 12$$

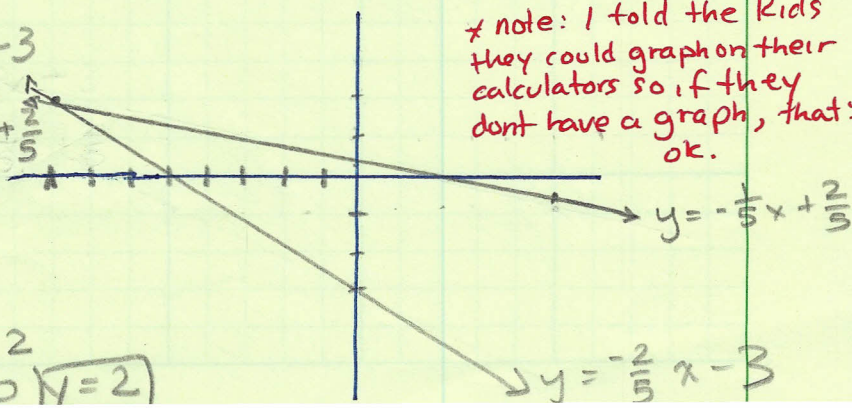
$$2x + 10y = 4$$

$$-2x = 16$$

$$\boxed{x = -8}$$

$$-8 + 5y = 2$$

$$5y = 10 \quad \underline{\underline{y = 2}}$$



* note: I told the kids they could graph on their calculators so, if they don't have a graph, that's ok.