

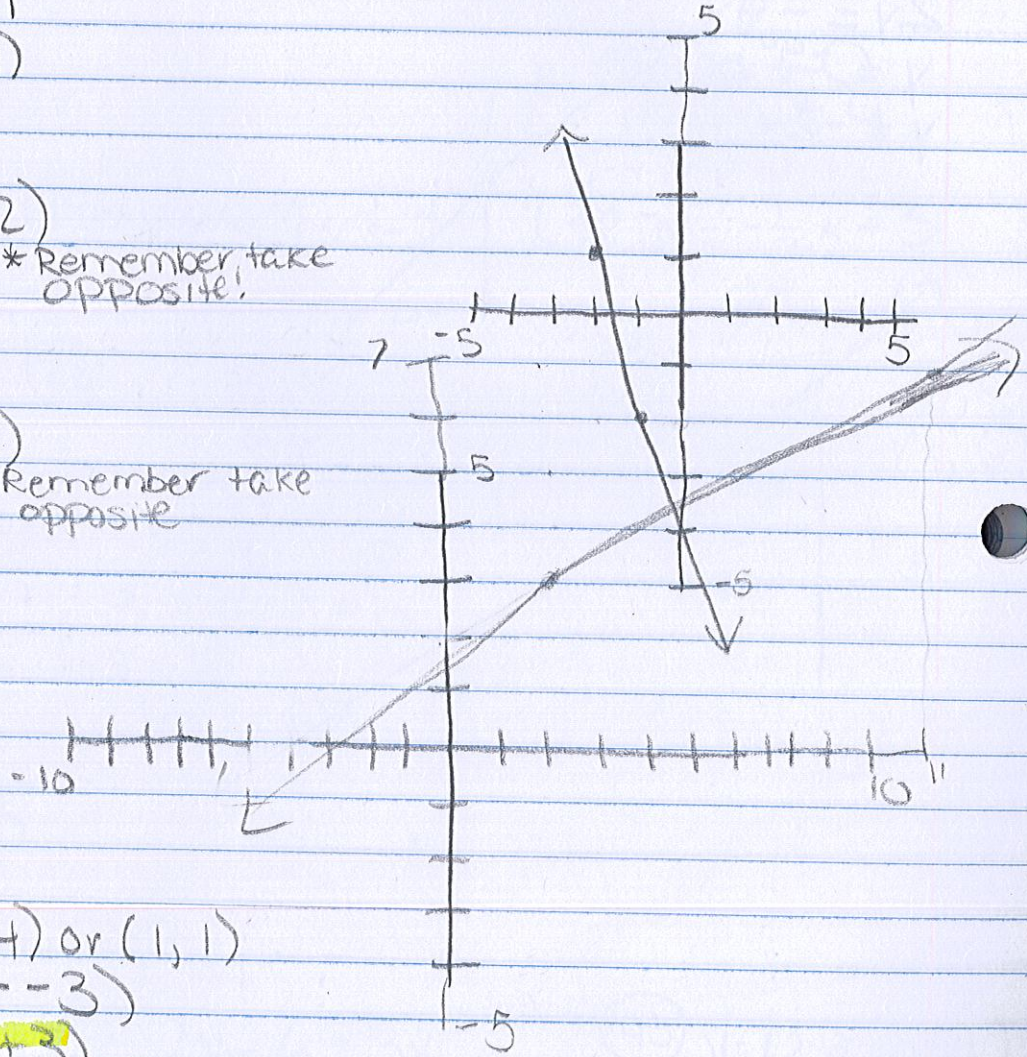
Pg. 318 (9-29 odd)

⑨ $(4, 2)$ $m = -\frac{5}{3}$
 $y - 2 = -\frac{5}{3}(x - 4)$

⑪ $(4, 0)$ $m = -1$
 $y - 0 = -1(x - 4)$
 $y = -1(x - 4)$

⑬ $y - 1 = -3(x + 2)$
point $(-2, 1)$ * Remember take opposite!
slope $= -3$

⑮ $y - 2 = \frac{4}{9}(x - 3)$
point $(3, 2)$ * Remember take opposite
slope $= \frac{4}{9}$



⑰ Slope $\circ \circ \circ \frac{3}{4}$
point $\circ \circ \circ (-3, 4)$ or $(1, 1)$
 $y - 4 = -\frac{3}{4}(x - -3)$
 $y - 4 = -\frac{3}{4}(x + 3)$
OR
 $y - 1 = -\frac{3}{4}(x - 1)$

⑲ $(1, 4)$ $\frac{1-4}{-1-1} = \frac{-3}{-2} = \frac{3}{2}$
 $(-1, 1)$
slope $y - 4 = \frac{3}{2}(x - 1)$
 $y - 4 = \frac{3}{2}x - \frac{3}{2} - \frac{3}{2}$
 $y - 4 = \frac{3}{2}x - 3$
 $y = \frac{3}{2}x + 1$

$$\textcircled{21} \begin{matrix} (-6, 6) \\ \rightarrow (3, 3) \end{matrix} \quad \frac{3-6}{3-(-6)} = \frac{-3}{9} = -\frac{1}{3}$$

Point Slope $y-3 = -\frac{1}{3}(x-3)$

$$y-3 = -\frac{1}{3}x + 1$$

+3 +3

$$y = -\frac{1}{3}x + 4$$

$\textcircled{23}$

Time	wages
1	8.50
3	25.50
6	51.00

I will use this point

$$\frac{25.50 - 8.50}{3 - 1} = \frac{17}{2} = 8.5$$

* Turn into decimal for real life situations

$$y = mx + b$$

Slope-int form: $8.50 = 8.50(1) + b$

$$8.50 = 8.50 + b$$

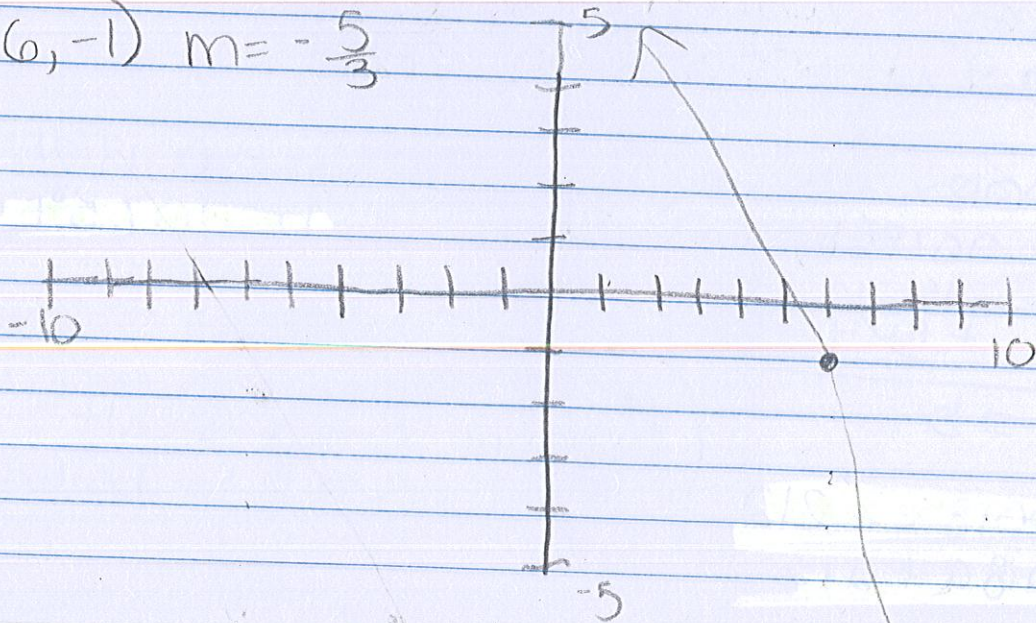
$$-8.50 \quad -8.50$$

$$0 = b$$

$$y = 8.50x$$

Slope = hourly wage
 y-int = Starting amount
 or
 amount already earned

$\textcircled{25} (6, -1) \quad m = -\frac{5}{3}$



I'm using this point

27

°F	°C
x	y
50	10
77	25

* you need to know °F to get °C, so IV = °F, DV = °C

$$\frac{25-10}{77-50} = \frac{15}{27} = \frac{5}{9}$$

$$y-10 = \frac{5}{9}(x-50)$$

substitute °F for x and °C for y

$$C-10 = \frac{5}{9}(F-50)$$

use this to find slope

To find °C when 59° F, substitute

$$C-10 = \frac{5}{9}(59-50)$$

$$C-10 = \frac{5}{9}(9)$$

$$C-10 = 5$$

$$C = 15^{\circ}\text{C}$$

29

alt	°F
x	y
8,000	197.6°
4,500	203.9°

$$\frac{203.9-197.6}{4500-8000} = \frac{6.3}{-3500} = -.0018$$

used this point

$$b = -.0018(2500) + 212$$

$$b = 207.5^{\circ}\text{F}$$

$$y = -.0018x + b$$

$$197.6 = -.0018(8,000) + b$$

$$197.6 = -14.4 + b$$

$$+14.4 \quad +14.4$$

$$212.0 = b$$

* change x to a for alt y to b for boiling

$$y = -.0018x + 212$$

$$b = -.0018a + 212$$