work for classwork 1/11

$y = mx + b$

1.) $-3x + 2y = 2$

$+3x \quad\quad +3x$

$\frac{2y}{2} = \frac{3x}{2} + \frac{2}{2}$

$y = \frac{3}{2}x + 1$ equation

$m = \frac{3}{2}$ $b = (0, 1)$

$y = mx + b$

2.) $x - 4y = 8$

$-x \quad\quad -x$

$\frac{-4y}{-4} = \frac{-1x}{-4} + \frac{8}{-4}$

$y = \frac{1}{4}x - 2$

equation

$m = \frac{1}{4}$ $b = (0, -2)$

$y = mx + b$

3.) $2x + y = -3$

$-2x \quad\quad -2x$

$y = -2x - 3$

equation

$m = \frac{-2}{1}$ $b = (0, -3)$

$y = mx + b$

4.) $2x + 3y = 6$

$-2x \quad\quad -2x$

$\frac{3y}{3} = \frac{-2x}{3} + \frac{6}{3}$

$y = \frac{-2}{3}x + 2$

equation $m = \frac{-2}{3}$ $b = (0, 2)$

$y = mx + b$

5.) $3x - y = 1$

$-3x \quad -3x$

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

$y = 3x - 1$

$m = \frac{3}{1} \quad b = (0, -1)$

$y = mx + b$

6.) $-3x - 5y = 10$

$+3x \quad +3x$

$\frac{-5y}{-5} = \frac{3x}{5} + \frac{10}{-5}$

$y = \frac{-3}{5}x - 2$

$m = \frac{-3}{5} \quad b = (0, -2)$

$y = mx + b$

7.) $4x + 3y = 0$

$-4x \quad -4x$

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

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

$m = -\frac{4}{3} \quad b = (0, 0)$

$mx + b = y$

*8.) $2x - 2y + 5 = 0$

$-2y \quad -2y$

$\frac{2x}{2} + \frac{5}{2} = \frac{-2y}{-2}$

$1x + \frac{5}{2} = y$

or

$y = mx + b$

$2x - 2y + 5 = 0$

$-5 \quad -5$

$2x - 2y = -5$

$-2x \quad -2x$

$\frac{-2y}{-2} = \frac{-2x}{-2} - \frac{5}{-2}$

$y = 1x + \frac{5}{2}$

$m = \frac{1}{1} \quad b = (0, 2.5)$

$y = mx + b$

9.) $y - 3 = 0$

$+3 \quad +3$

$y = 3$

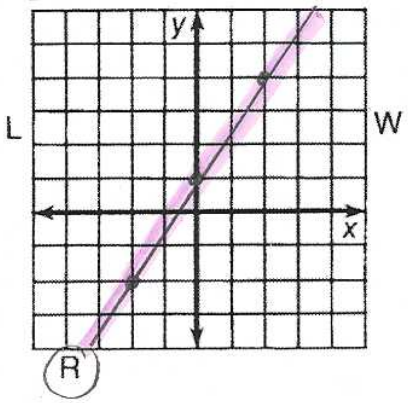
horizontal line

p. 75

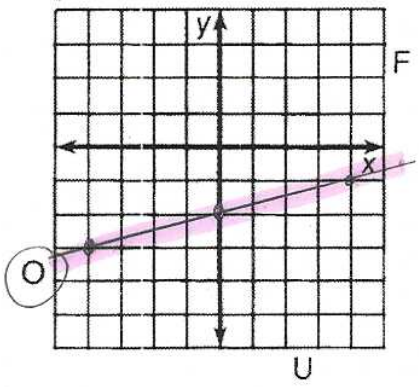
Why Does a Poor Man Drink Coffee?

Use the slope and *y*-intercept to graph each equation below. The graph, if extended, will cross a letter. Print this letter in each box that contains the number of that exercise.

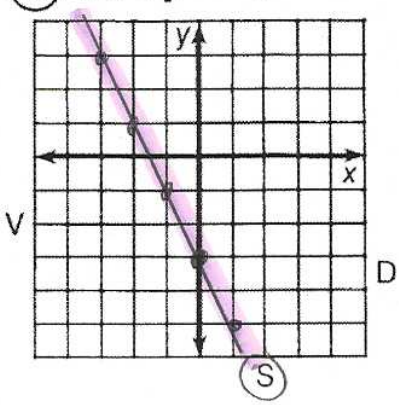
(1) $-3x + 2y = 2$



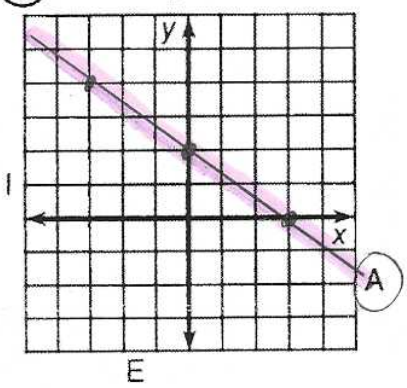
(2) $x - 4y = 8$



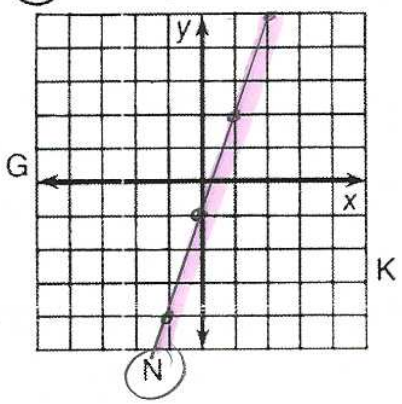
(3) $2x + y = -3$



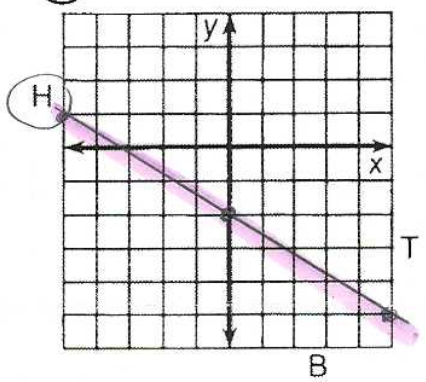
(4) $2x + 3y = 6$



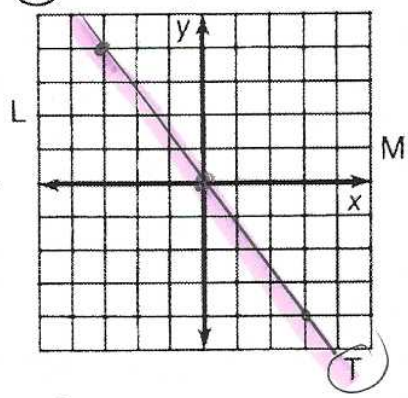
(5) $3x - y = 1$



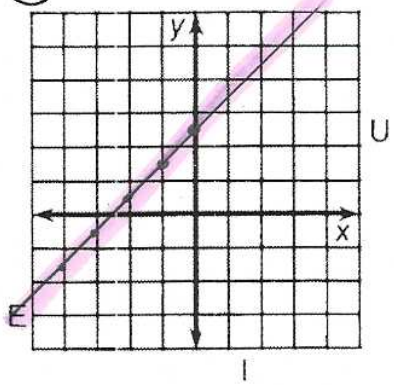
(6) $-3x - 5y = 10$



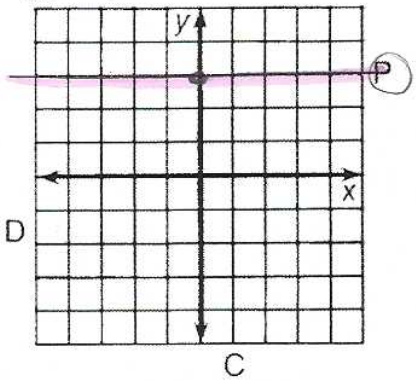
(7) $4x + 3y = 0$



(8) $2x - 2y + 5 = 0$



(9) $y - 3 = 0$



6	8	6	4	3	5	2	9	1	2	9	8	1	7	8	4
H	E	H	A	S	N	O	P	R	O	P	E	R	T	E	A