

DO NOW

Identify each of the following as:

- a. General linear equation $Ax + By = C$
- b. Horizontal line equation $y = \#$
- c. Vertical line equation $x = \#$
- d. Not a linear equation

1. b $y = 7$
2. d $x^2 + 3y = 9$
3. a $\frac{y}{x} = -2 \Rightarrow y = -2x$
4. a $5x - 4y = 10$
5. c $2x = -16$
6. b $y = -3$
7. d $xy = 15$
8. a $3y = -6x + 8$

Page 1

3.3 The Slope of a Line - Day 2

$m = \text{slope or rate of change}$

$$m = \frac{\text{rise}}{\text{run}} = \frac{y_2 - y_1}{x_2 - x_1} = \frac{\Delta y}{\Delta x}$$

$\Delta \leftarrow \text{delta}$

Find the slope of the line or rate of change represented by each table of values.

9.

x	y
-3	1
-2	3
-1	5

 $\leftarrow \text{Pt 1}$
 $\leftarrow \text{Pt 2}$

$$m = \frac{y_2 - y_1}{x_2 - x_1} = \frac{3 - 1}{-2 - (-3)} = \frac{2}{-2 + 3} = \frac{2}{1} = 2$$

$m = 2$

10.

x	y
4	1
1	4
-2	7

$$m = \frac{y_2 - y_1}{x_2 - x_1} = \frac{4 - 1}{1 - 4} = \frac{3}{-3} = -1$$

$m = -1$

Page 2

HOMEWORK

Worksheet HW 3.3 - Slope of a
Line - Day 2

Page 3