

1. Two ways to graph a linear equation are _____ or _____
2. Two ways to write a linear equation are _____ form and _____ form. Write an example for each form of a linear equation
3. Write the formula to solve for the slope given (x_1, y_1) and (x_2, y_2)
4. Write a line that is parallel to $y = 4x + 3$ and goes through the point $(1, 8)$
5. Write a perpendicular line to $y = -3x - 12$ and goes through the point $(6, -4)$
6. Sketch a graph for the following (Remember to label your x and y axis)
 - A) $4x + 3y = 12$
 - B) $y = \frac{1}{2}x - 7$

7. In order to be considered a function, a graph must pass the _____

8. Use $f(x) = 3x + 2$ and $g(x) = x^2 - 5$ to find:

$$(f + g)(x) =$$

$$(f - g)(x) =$$

$$(f \cdot g)(x) =$$

$$(f/g)(x) =$$

$$f(g(x)) =$$

$$g(f(x)) =$$