

Math 1- Writing Linear Functions Review for TEST
Identify the slope and y-intercept for each equation.

Name: _____ Per: _____

1. $y = 2x + 3$

2. $y = \frac{3}{2}x - 4$

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

Find the slope of each line and write an equation in slope-intercept form

4. Line through (5, 7) and (3, 1)

5. Line through (6,6) and (-2, -2)

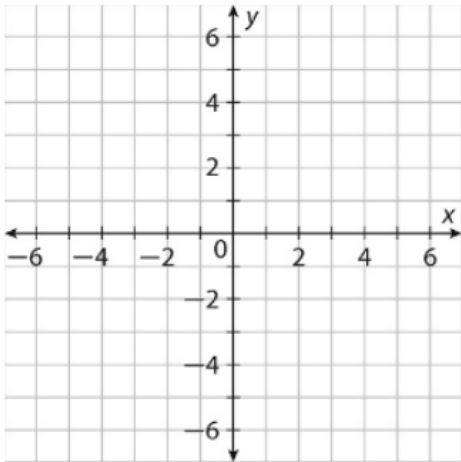
Write the equation of each line in slope-intercept form.

6. line with a slope of 2 passing through (4,2).

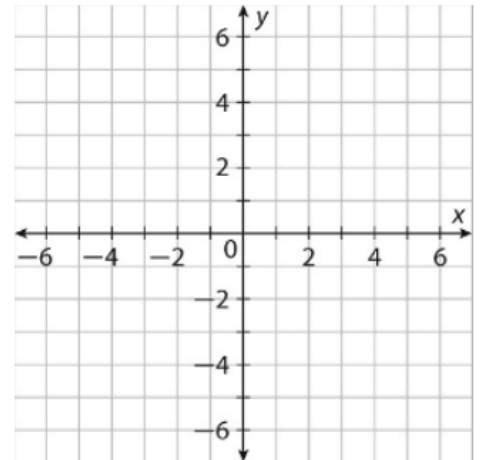
7. Line with a slope $\frac{2}{3}$ passing through (3,-1)

Graph the line described by each equation.

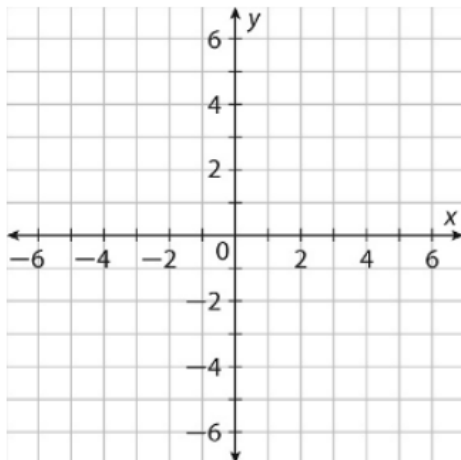
8. $y = -3x + 1$



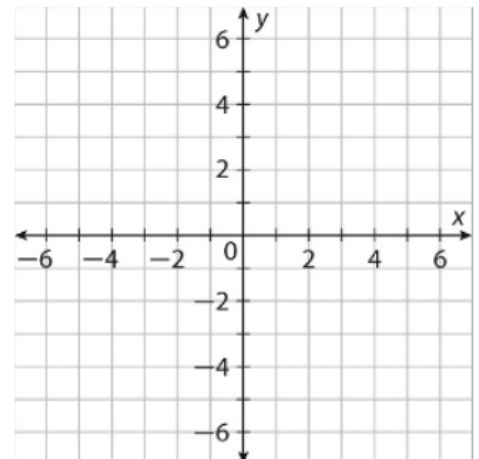
9. $y = \frac{3}{4}x - 3$



10. $x - 2y = 4$



11. $-2x + 3y = -15$



For each situation, determine the slope and y-intercept of the graph of the equation that describes the situation and interpret what they mean. Then write an equation in slope-intercept form and use it to solve the problem.

12. Alex gets a job and receives a \$600 signing bonus. After that, he makes \$250 a day. How much would he make in 30 days?

13. Identify the steeper line.

1. $y = 2x + 2$ or $y = 4x + 15$

2. $y = -3x - 2$ or $y = -5x + 7$

14. Each transformation is performed on the line with the equation $y = 7x + 2$. Write the equation of the new line.

a. vertical translation down 3 units

b. shifted up 5 units and slope decreased by 4

15. Describe the transformation(s) on the graph of the parent function $f(x) = x$ that results in the graph of $g(x)$.

a. $g(x) = -2x + 8$

b. $g(x) = \frac{1}{4}x - 3$

16. For each linear functions graphed on the coordinate grid, state the value of m , and the value of b , then write the equation in slope-intercept form.

a. $f(x)$: $m =$ _____, $b =$ _____, $y =$ _____

b. $g(x)$: $m =$ _____, $b =$ _____, $y =$ _____

c. $h(x)$: $m =$ _____, $b =$ _____, $y =$ _____

