

Quiz #6 LINEAR FUNCTIONS**ALGEBRA 2**

1. Determine whether a given function or equation is linear or not.

a. $4x + 2y = 7$

e. $29 = 3x + 2y$

b. $y = \frac{1}{3}x - 14$

f. $f(x) = 4 - x$

c. $3x^2 + 8y^2 = 16$

g. $y = -x^2 + 3x + 2$

d. $y = \frac{\sqrt{x+2}}{12}$

h. $f(x) = \frac{3}{x} - 1$

2. Find the x- and y-intercepts of each line.

a. $2x - 6y = 18$

c. $x = 2y$

b. $y = 6x + 4$

d. $-8x + 3y = 12$

3. Write the following linear functions in standard form and identify the values of A, B and C.

a. $5y = 4x - 2$

b. $y = \frac{4}{3}x - 5$

4. What is the slope of the line $2(x - 5) = -6y$?

5. Find the slope of the line that passes through these points.

a. $(-5, 4)$ and $(2, 4)$

c. $(5, -2)$ and $(5, 7)$

b. $(8, -3)$ and $(-5, 1)$

d. $(12, -4)$ and $(6, -3)$

6. Graph the following using the given information.

a. slope = $\frac{2}{7}$, through $(-6, 3)$

b. slope = -4 , y-intercept = 3

c. x-intercept = -2 , y-intercept = -8

7. Determine if each line is vertical or horizontal. Then graph the line.

a. $y = 12$

b. $x = -7$

c. $x = 1/3$

d. $y = -5$

8. Robbie's cash register contained \$75 when he opened the store. After 12 hours, the register contained \$1485. Find the average sales per hour.

9. Write the equation in slope - intercept form ($y = mx + b$).

a. $5x - 7y = 15$

c. $4y = 9x - 5$

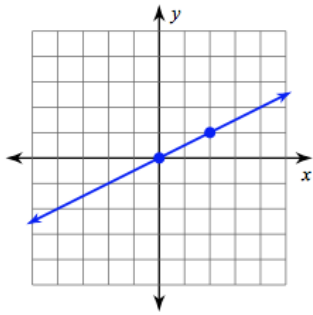
b. $\frac{1}{6}x = 4 + y$

d. $2x + 3y + 8 = -12$

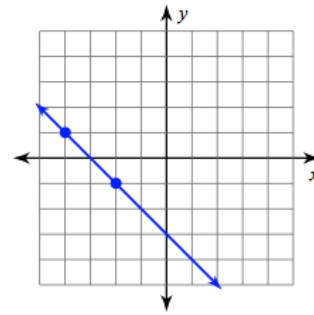
10-13.

Find the slope of each line.

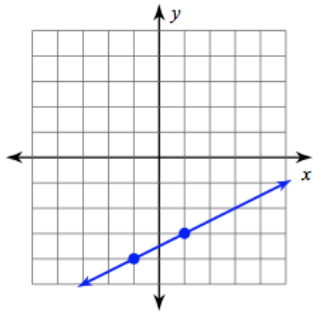
1)



2)



3)



4)

