Math 4CST Name_____

Writing the Equations of Linear Functions

Write the slope-intercept form of the equation of each line given the slope and y-intercept.

1) Slope = –2, y-intercept = –3

2) Slope = $\frac{1}{2}$, y-intercept = 1

3) Slope = $-\frac{1}{5}$, y-intercept = –1

4) Slope = $-\frac{4}{5}$, y-intercept = –4

5) Slope = $\frac{7}{2}$, y-intercept = –5

6) Slope = $\frac{7}{5}$, y-intercept = 2

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

7) $5x - y = 6$

8) $3x - 2y = 8$

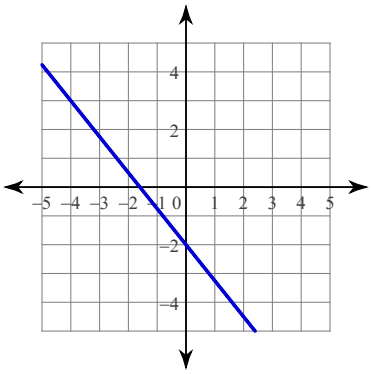
9) $2x - y = 5$

10) $13x - 2y = -14$

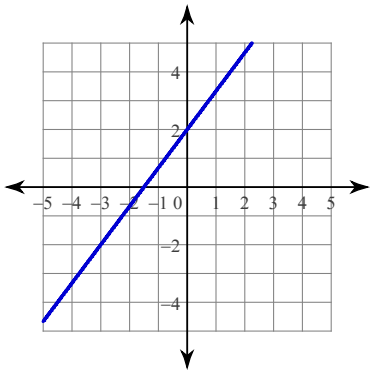
11) $x - 11y = -62$

12) $2x + y = 8$

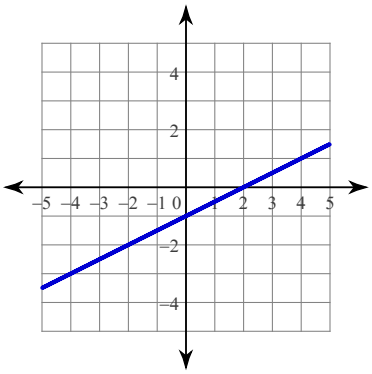
13)



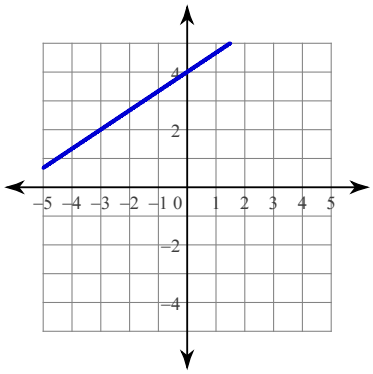
14)



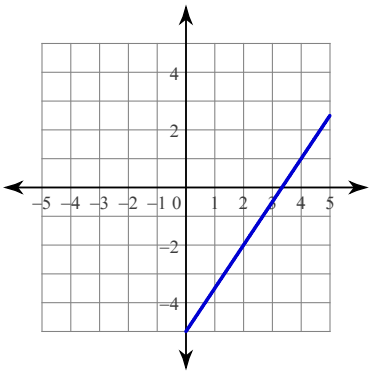
15)



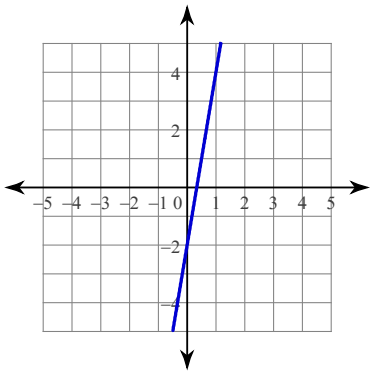
16)



17)



18)



19) $-5y - 17 = x$

20) $-5y + 10 = -7x$

21) $12 + 8x = 3y$

22) $-3x = -4y + 4$

23) $-5 + 10x + y = 0$

24) $5y + 3x - 10 = 0$

Write the slope-intercept form of the equation of the line through the given points.

25) through: $(3, -1)$ and $(0, 0)$

26) through: $(-1, 2)$ and $(5, 0)$

27) through: $(3, -3)$ and $(-1, 4)$

28) through: $(1, -2)$ and $(5, -5)$

29) through: $(3, -1)$ and $(2, -2)$

30) through: $(2, -5)$ and $(-2, -5)$

Answers to Writing the Equations of Linear Functions (ID: 1)

1) $y = -2x - 3$

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

3) $y = -\frac{1}{5}x - 1$

4) $y = -\frac{4}{5}x - 4$

5) $y = \frac{7}{2}x - 5$

6) $y = \frac{7}{5}x + 2$

7) $y = 5x - 6$

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

9) $y = 2x - 5$

10) $y = \frac{13}{2}x + 7$

11) $y = \frac{1}{11}x + \frac{62}{11}$

12) $y = -2x + 8$

13) $y = -\frac{5}{4}x - 2$

14) $y = \frac{4}{3}x + 2$

15) $y = \frac{1}{2}x - 1$

16) $y = \frac{2}{3}x + 4$

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

18) $y = 6x - 2$

19) $y = -\frac{1}{5}x - \frac{17}{5}$

20) $y = \frac{7}{5}x + 2$

21) $y = \frac{8}{3}x + 4$

22) $y = \frac{3}{4}x + 1$

23) $y = -10x + 5$

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

25) $y = -\frac{1}{3}x$

26) $y = -\frac{1}{3}x + \frac{5}{3}$

27) $y = -\frac{7}{4}x + \frac{9}{4}$

28) $y = -\frac{3}{4}x - \frac{5}{4}$

29) $y = x - 4$

30) $y = -5$