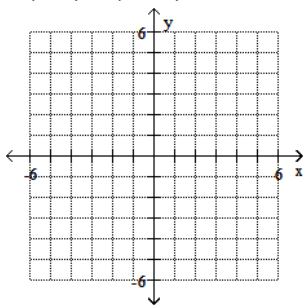


**SHORT ANSWER. Write the word or phrase that best completes each statement or answers the question.**

Plot the ordered pairs on the rectangular coordinate system provided.

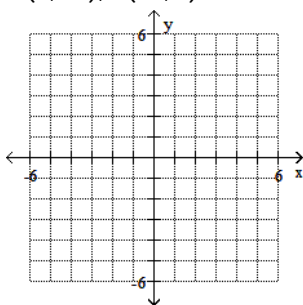
1)  $A(5, 6)$ ,  $B(-4, 4)$

1) \_\_\_\_\_



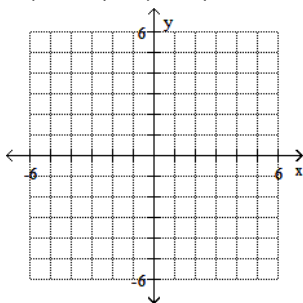
2)  $A(4, -1)$ ,  $B(-1, 5)$

2) \_\_\_\_\_

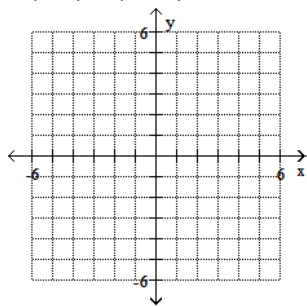


3)  $A(-3, -6)$ ,  $B(-5, 3)$

3) \_\_\_\_\_

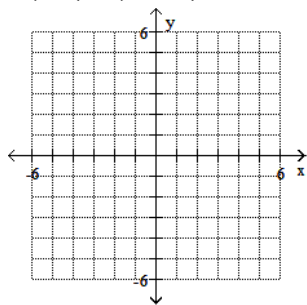


4)  $A(4, 5)$ ,  $B(6, -3)$



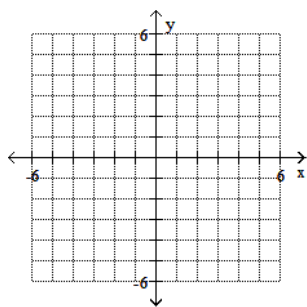
4) \_\_\_\_\_

5)  $A(4, 5)$ ,  $B(-5, -3)$



5) \_\_\_\_\_

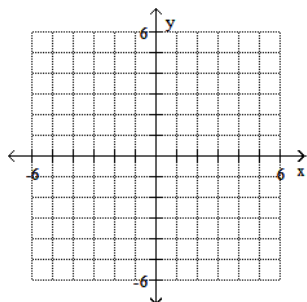
6)  $A(-\frac{2}{3}, -4)$ ,  $B(-5, 6)$



6) \_\_\_\_\_

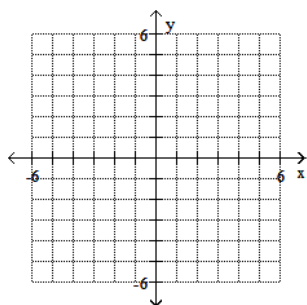
7) A(0, -3), B (0, 1)

7) \_\_\_\_\_



8) A(-1, 0), B (5, 0)

8) \_\_\_\_\_



**MULTIPLE CHOICE. Choose the one alternative that best completes the statement or answers the question.**

List the quadrant(s) in which the given point is located.

9) (10, 17)

A) III

B) II

C) I

D) IV

9) \_\_\_\_\_

10) (-6, 20)

A) II

B) I

C) IV

D) III

10) \_\_\_\_\_

11) (-15, -3)

A) I

B) IV

C) II

D) III

11) \_\_\_\_\_

12) (6, -11)

A) I

B) III

C) IV

D) II

12) \_\_\_\_\_

13) (-6, 0)

A) IV

B) On an axis

C) III

D) II

13) \_\_\_\_\_

14)  $\left(\frac{9}{14}, -\frac{17}{22}\right)$  14) \_\_\_\_\_  
 A) IV B) III C) II D) I

15) The first coordinate is positive. 15) \_\_\_\_\_  
 A) I, IV B) II, III C) III, IV D) I, II

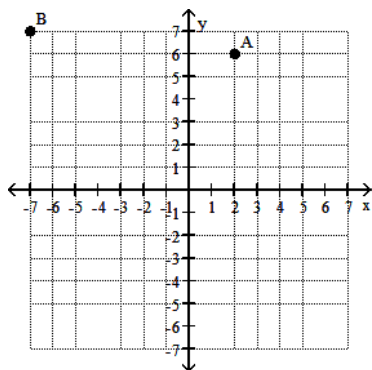
16) The second coordinate is negative. 16) \_\_\_\_\_  
 A) I, IV B) III, IV C) II, III D) I, II

17) The coordinates have the same sign. 17) \_\_\_\_\_  
 A) I, III B) III, IV C) II, IV D) I, II

18)  $(-5.4, -2.4)$  18) \_\_\_\_\_  
 A) IV B) I C) II D) III

Find the coordinates of the labeled points.

19) 19) \_\_\_\_\_



A) A(2, 7); B(6, 7)

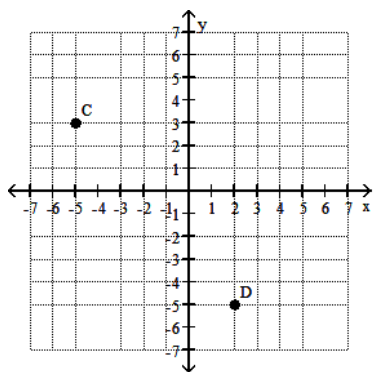
C) A(2, 6); B(-7, 7)

B) A(2, 6); B(7, -7)

D) A(6, 20); B(7, -7)

20)

20) \_\_\_\_\_



A)  $C(-5, 3)$ ;  $D(2, -5)$

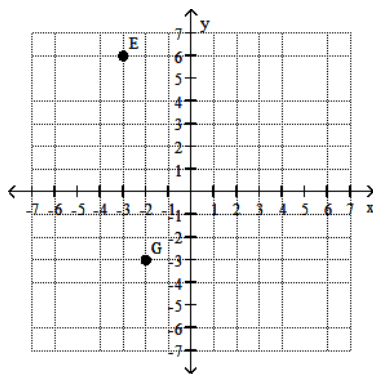
B)  $C(-5, -5)$ ;  $D(3, -5)$

C)  $C(3, 6)$ ;  $D(-5, 2)$

D)  $C(-5, 3)$ ;  $D(-5, 2)$

21)

21) \_\_\_\_\_



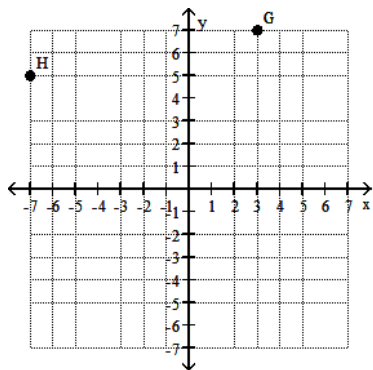
A)  $E(6, 10)$ ;  $G(-3, -2)$

B)  $E(-3, 6)$ ;  $G(-3, -2)$

C)  $E(-3, 6)$ ;  $G(-2, -3)$

D)  $E(-3, -3)$ ;  $G(6, -3)$

22)



22) \_\_\_\_\_

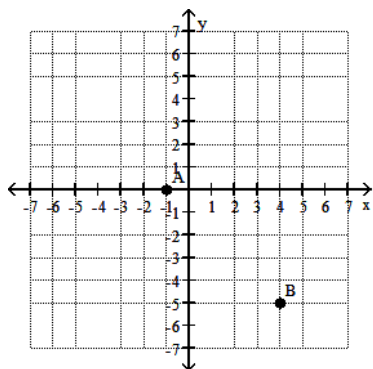
A)  $G(3, 5)$ ;  $H(7, 5)$

C)  $G(7, 22)$ ;  $H(5, -7)$

B)  $G(3, 7)$ ;  $H(5, -7)$

D)  $G(3, 7)$ ;  $H(-7, 5)$

23)



23) \_\_\_\_\_

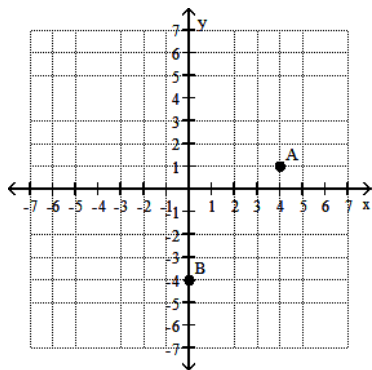
A)  $A(-1, 0)$ ;  $B(4, -5)$

C)  $A(-1, 1)$ ;  $B(4, -5)$

B)  $A(-1, 0)$ ;  $B(-4, -5)$

D)  $A(1, 0)$ ;  $B(4, -5)$

24)

A)  $A(4, 1)$ ;  $B(0, 4)$ C)  $A(4, -1)$ ;  $B(1, -4)$ B)  $A(-4, 1)$ ;  $B(0, 4)$ D)  $A(4, 1)$ ;  $B(0, -4)$ 

24) \_\_\_\_\_

Determine whether the given ordered pair is a solution of the equation.

25)  $x + y = 15$ ;  $(7, 8)$ 

A) Yes

B) No

25) \_\_\_\_\_

26)  $x + y = 10$ ;  $(5, 4)$ 

A) Yes

B) No

26) \_\_\_\_\_

27)  $x - y = 16$ ;  $(4, 8)$ 

A) No

B) Yes

27) \_\_\_\_\_

28)  $3x + y = 10$ ;  $(2, 4)$ 

A) No

B) Yes

28) \_\_\_\_\_

29)  $2x + 5y = 24$ ;  $(2, 4)$ 

A) Yes

B) No

29) \_\_\_\_\_

30)  $2x - 2y = 18$ ;  $(4, 5)$ 

A) No

B) Yes

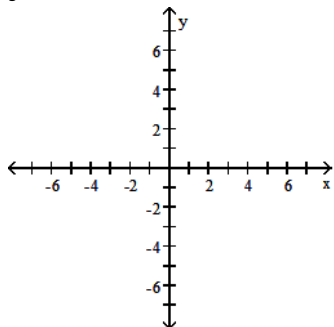
30) \_\_\_\_\_

**SHORT ANSWER. Write the word or phrase that best completes each statement or answers the question.**

Show that the two ordered pairs are solutions to the given equation. Then use the graph of the two points to determine another solution. Answers may vary.

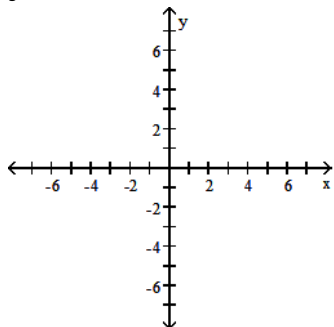
31)  $y = x - 5$ ;  $(6, 1)$ ,  $(1, -4)$

31) \_\_\_\_\_



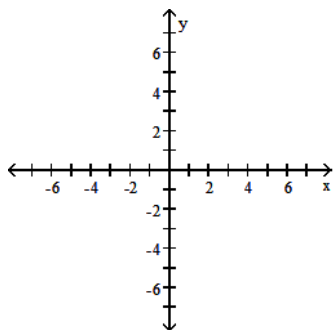
32)  $y = x + 2$ ;  $(0, 2)$ ,  $(-1, 1)$

32) \_\_\_\_\_



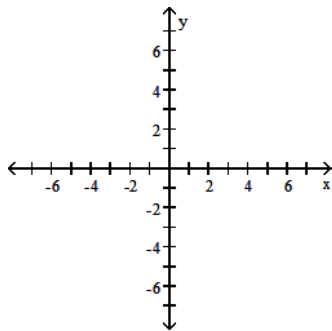
33)  $y = \frac{1}{2}x + 5$ ;  $(4, 7)$ ,  $(-4, 3)$

33) \_\_\_\_\_



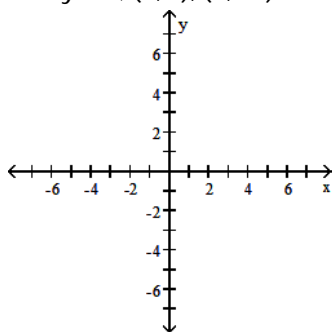


34)  $y = \frac{1}{2}x - 3$ ; (6, 0), (0, -3)



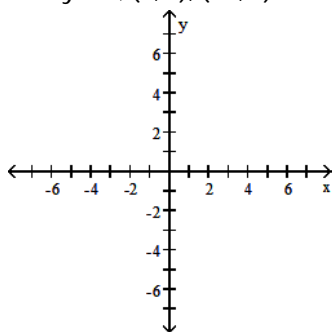
34) \_\_\_\_\_

35)  $2x + y = 8$ ; (3, 2), (6, -4)



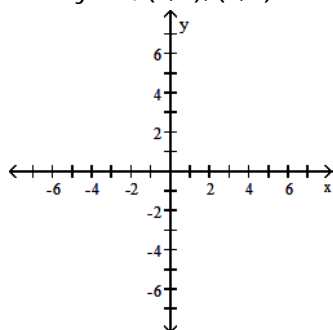
35) \_\_\_\_\_

36)  $x + 2y = 8$ ; (2, 3), (-6, 7)



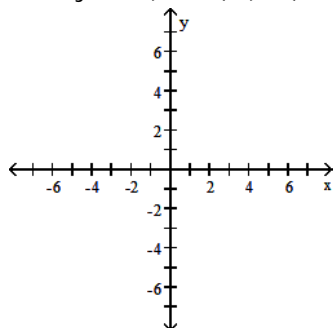
36) \_\_\_\_\_

37)  $6x - 2y = 6$ ;  $(1, 0)$ ,  $(3, 6)$



37) \_\_\_\_\_

38)  $3x - 3y = 9$ ;  $(-1, -4)$ ,  $(3, 0)$

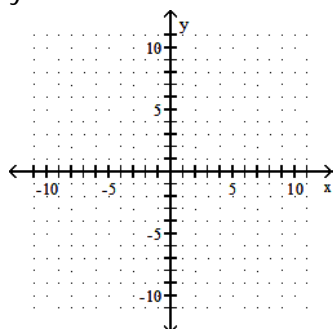


38) \_\_\_\_\_

**MULTIPLE CHOICE. Choose the one alternative that best completes the statement or answers the question.**

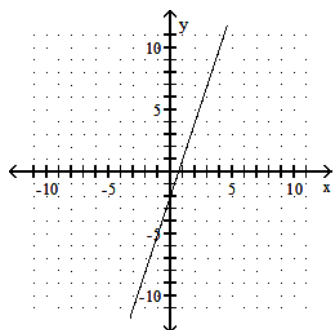
Graph the linear equation.

39)  $y = 3x + 2$

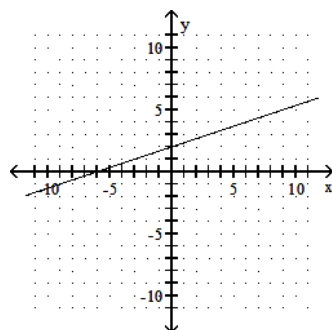


39) \_\_\_\_\_

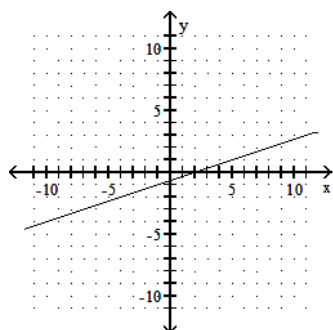
A)



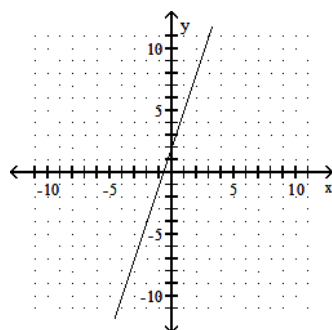
B)



C)

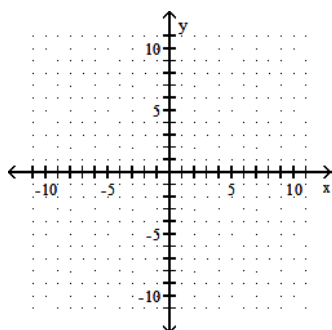


D)

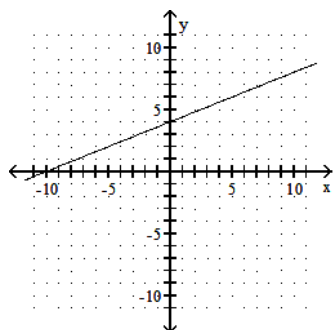


40)  $y = \frac{2}{5}x - 4$

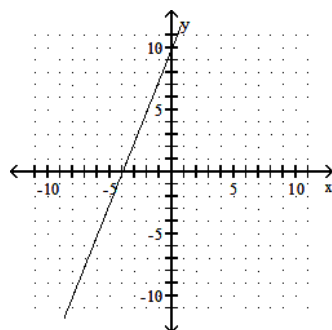
40) \_\_\_\_\_



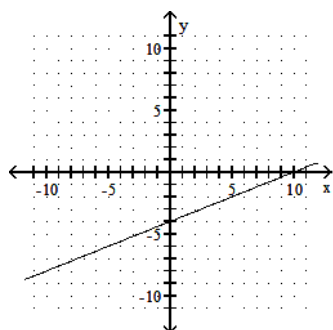
A)



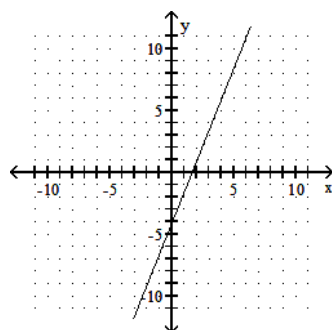
B)



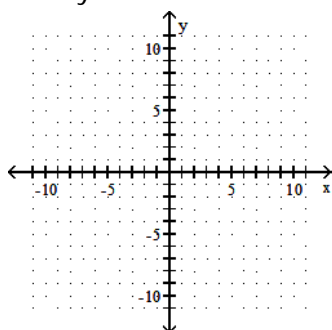
C)



D)

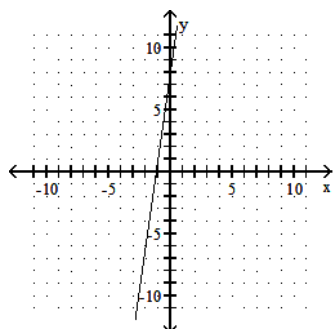


41)  $-x + 7y = -8$

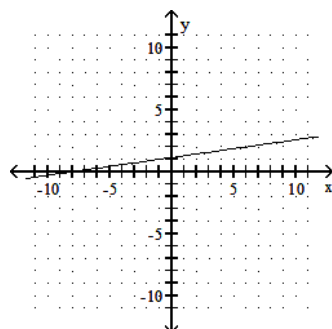


41) \_\_\_\_\_

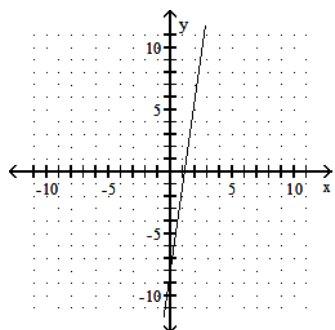
A)



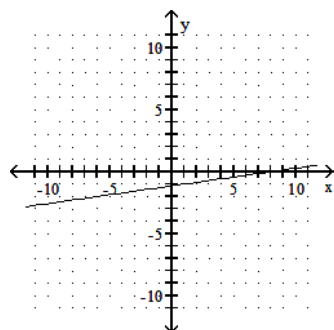
B)



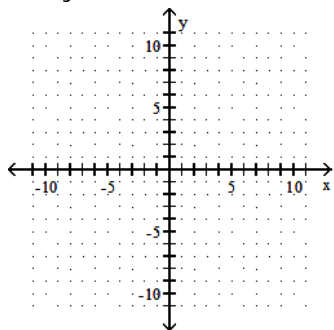
C)



D)

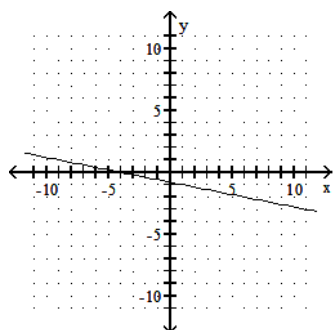


42)  $x + 5y = 4$

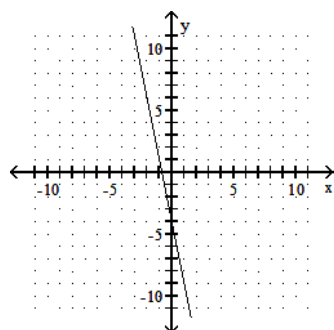


42) \_\_\_\_\_

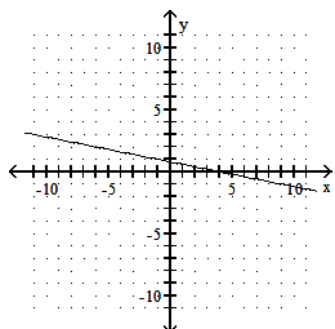
A)



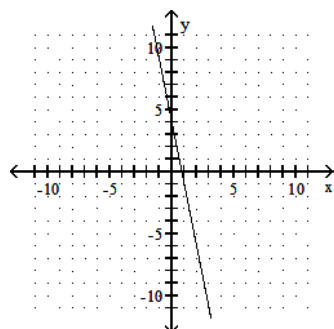
B)



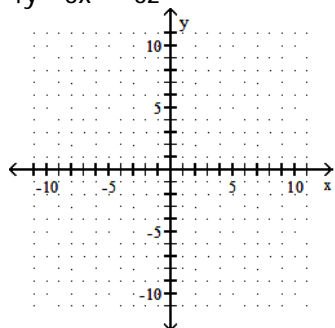
C)



D)

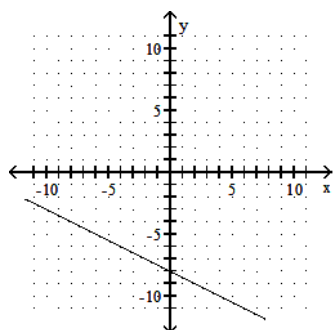


43)  $4y - 8x = -32$

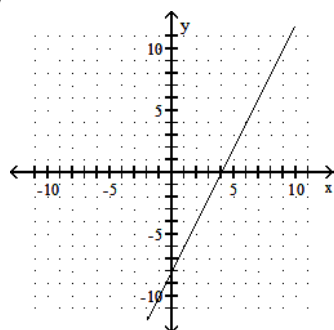


43) \_\_\_\_\_

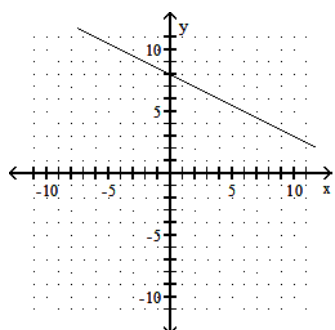
A)



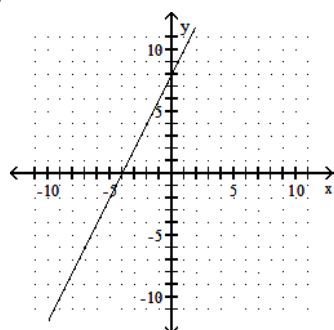
B)



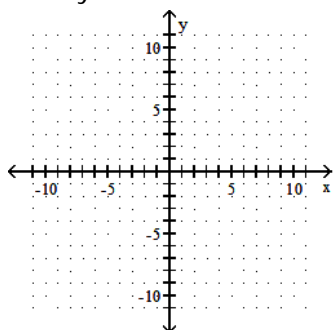
C)



D)

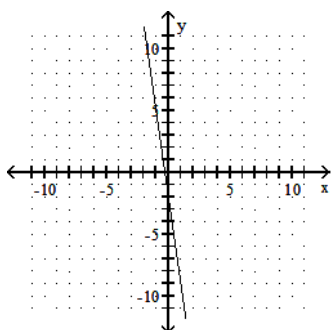


44)  $-7x - y = -2$

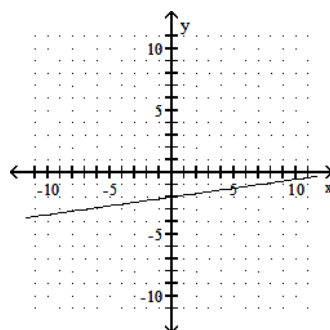


44) \_\_\_\_\_

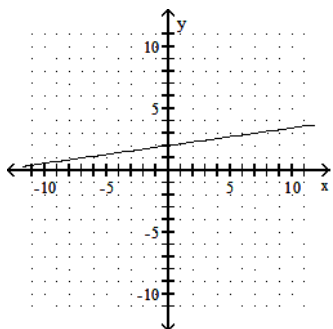
A)



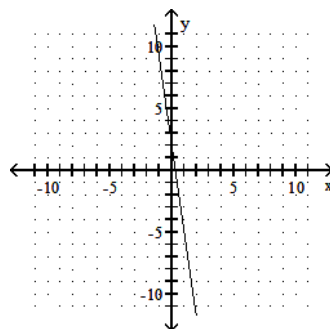
B)



C)

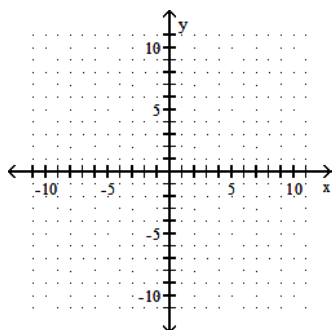


D)

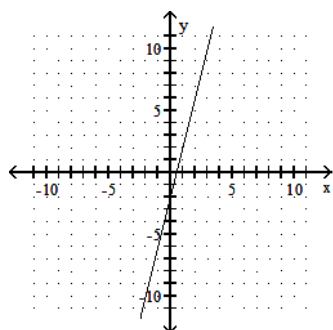


45)  $y = \frac{1}{4}x + \frac{1}{2}$

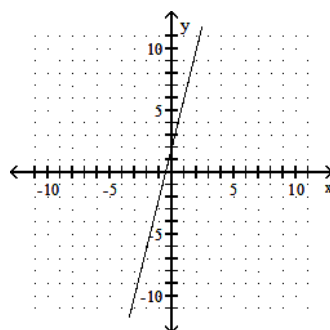
45) \_\_\_\_\_



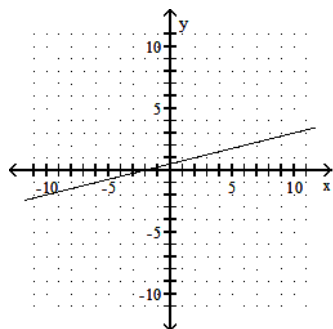
A)



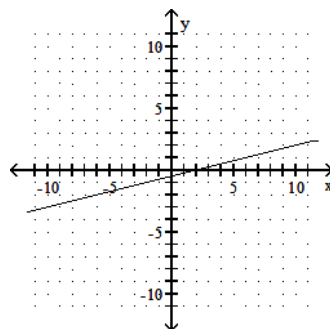
B)



C)

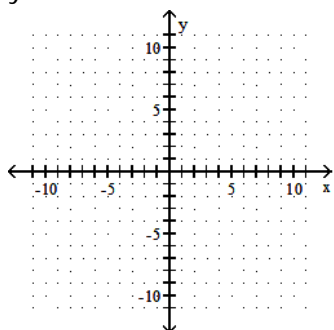


D)



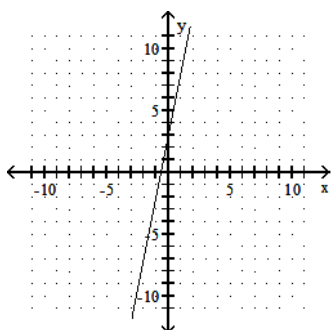


46)  $y = 5x$

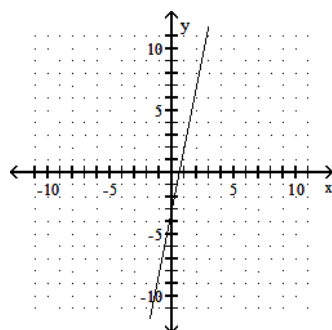


46) \_\_\_\_\_

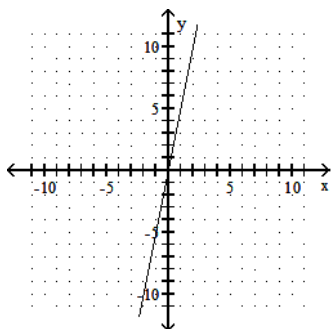
A)



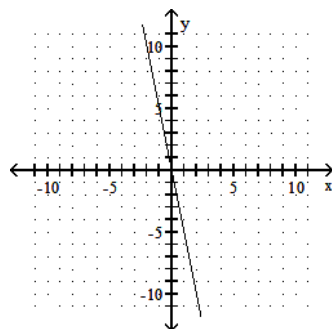
B)



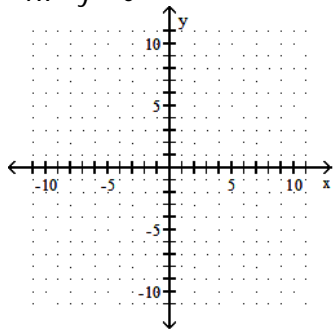
C)



D)

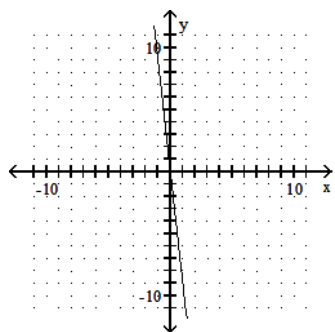


47)  $-9x - y = 0$

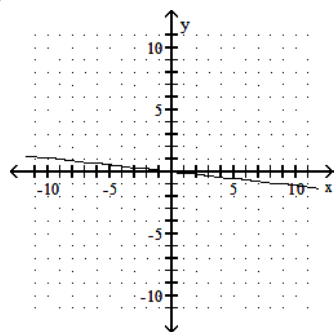


47) \_\_\_\_\_

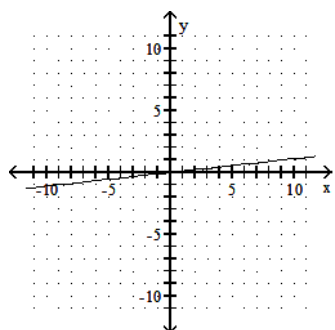
A)



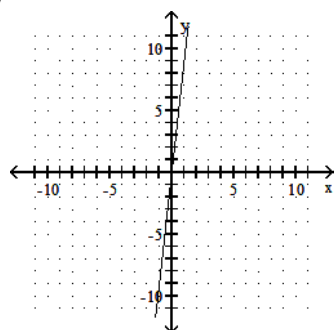
B)



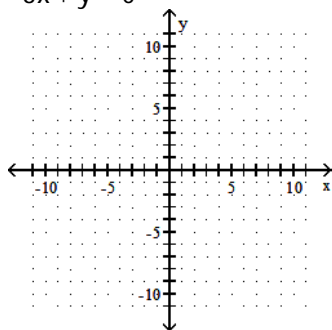
C)



D)

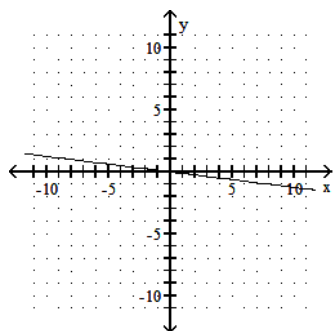


48)  $-8x + y = 0$

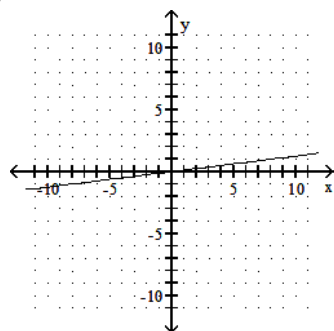


48) \_\_\_\_\_

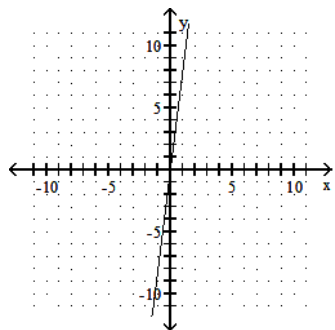
A)



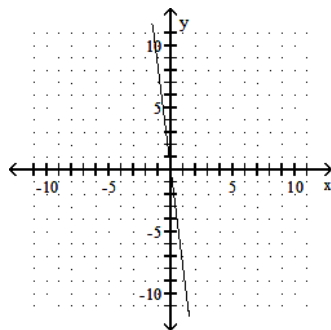
B)



C)



D)



Find the coordinates of the y-intercept for the given equation.

49)  $y = x + 13$

A)  $(0, 1)$

B)  $(13, 0)$

C)  $(0, 13)$

D)  $(13, 13)$

49) \_\_\_\_\_

50)  $y = x - 7$

A)  $(0, 1)$

B)  $(0, 7)$

C)  $(-7, 0)$

D)  $(0, -7)$

50) \_\_\_\_\_

51)  $y = \frac{2}{5}x$

A)  $\left(1, \frac{2}{5}\right)$

B)  $\left(0, \frac{2}{5}\right)$

C)  $\left(\frac{2}{5}, 0\right)$

D)  $(0, 0)$

51) \_\_\_\_\_

52)  $y = 5x + 8$

A)  $(5, 8)$

B)  $(0, 8)$

C)  $(0, 5)$

D)  $(8, 0)$

52) \_\_\_\_\_

53)  $y = 9x - 7$

A)  $(0, 7)$

B)  $(0, -7)$

C)  $(-7, 0)$

D)  $(9, -7)$

53) \_\_\_\_\_

54)  $x + y = 8$

A)  $(0, 8)$

B)  $(0, -8)$

C)  $(-8, 0)$

D)  $(0, -1)$

54) \_\_\_\_\_

55)  $x + 5y = 2$

A)  $(0, 10)$

B)  $\left(0, \frac{2}{5}\right)$

C)  $(5, 10)$

D)  $(10, 0)$

55) \_\_\_\_\_

56)  $2x - 5y = -10$

A)  $(0, -10)$

B)  $(2, 5)$

C)  $(0, 2)$

D)  $(0, -2)$

56) \_\_\_\_\_

57)  $2y + 2x = -1$

A)  $(-1, 0)$

B)  $\left(0, -\frac{1}{2}\right)$

C)  $\left(-\frac{1}{2}, 0\right)$

D)  $(0, -1)$

57) \_\_\_\_\_

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

58) \_\_\_\_\_

A)  $(5, 0)$

B)  $(-5, 0)$

C)  $\left(0, \frac{4}{5}\right)$

D)  $(0, -5)$

Solve the problem.

59) The value  $V$ , in dollars, of a shopkeeper's inventory software program is given by  $V = -20t + 350$ , where  $t$  is the number of years since the shopkeeper first bought the program. Find the value of the software after 0 years, 4 years, and 10 years.

59) \_\_\_\_\_

A) \$350, \$270, and \$150

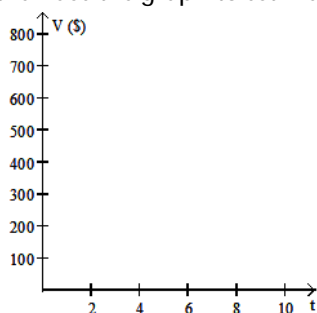
B) \$350, \$270, and \$210

C) \$350, \$430, and \$150

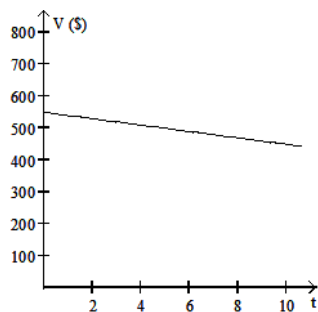
D) \$330, \$270, and \$150

60) The value  $V$ , in dollars, of a shopkeeper's inventory software program is given by  $V = -10t + 550$ , where  $t$  is the number of years since the shopkeeper first bought the program. Graph the equation and then use the graph to estimate the value of the software after 5 years.

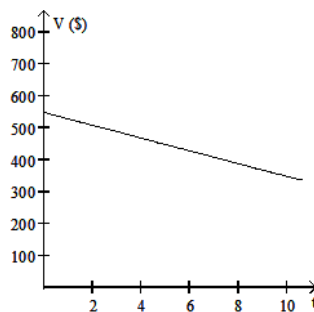
60) \_\_\_\_\_



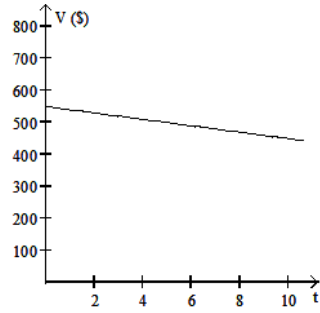
A) \$550



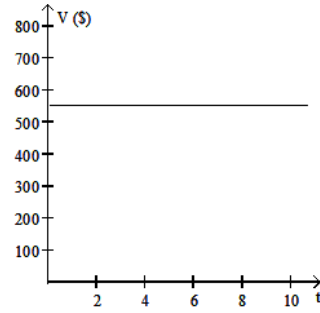
B) \$510



C) \$500



D) \$490



61) The value  $V$ , in dollars, of a shopkeeper's inventory software program is given by  $V = -20t + 350$ , where  $t$  is the number of years since the shopkeeper first bought the program. After how many years is the value of the software \$310?

A) 4 yr

B) 3 yr

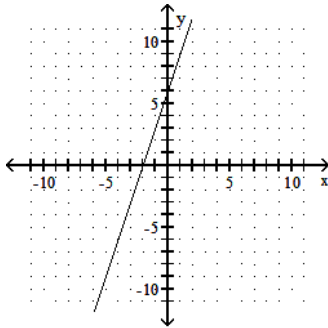
C) 2 yr

D) 1 yr

61) \_\_\_\_\_

Find the coordinates of the y-intercept and the coordinates of the x-intercept.

62)



A) (0, 0), (-2, 6)

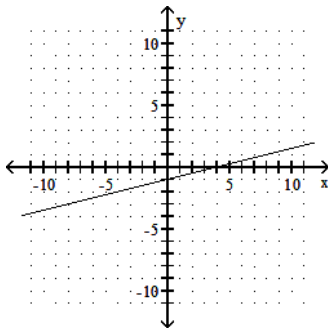
B) (0, -2), (6, 0)

C) (6, -2), (0, 0)

D) (0, 6), (-2, 0)

62) \_\_\_\_\_

63)



A) (0, 0), (4, -1)

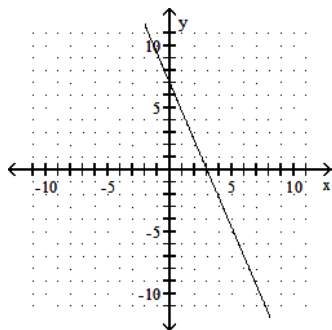
B) (0, 4), (-1, 0)

C) (0, -1), (4, 0)

D) (-1, 4), (0, 0)

63) \_\_\_\_\_

64)



64) \_\_\_\_\_

A)  $(0, 0), (3, 7)$

B)  $(0, 7), (3, 0)$

C)  $(0, 3), (7, 0)$

D)  $(7, 3), (0, 0)$

Find the coordinates of the y-intercept and the x-intercept, in that order.

65)  $x + y = -4$

A)  $(-2, 0), (-2, 0)$

C)  $(-4, -2), (-2, -4)$

B)  $(0, -2), (0, -2)$

D)  $(-4, 0), (0, -4)$

65) \_\_\_\_\_

66)  $2x + y = 10$

A)  $(0, 8), (0, -6)$

B)  $(5, 0), (0, 10)$

C)  $(8, 0), (-6, 0)$

D)  $(10, -6), (8, 10)$

66) \_\_\_\_\_

67)  $3x + y = -9$

A)  $(-4, 0), (3, 0)$

B)  $(-9, 3), (-4, -9)$

C)  $(-3, 0), (0, -9)$

D)  $(0, -4), (0, 3)$

67) \_\_\_\_\_

68)  $-2x + y = 2$

A)  $(2, -6), (-4, 2)$

B)  $(0, -4), (0, -6)$

C)  $(-4, 0), (-6, 0)$

D)  $(-1, 0), (0, 2)$

68) \_\_\_\_\_

69)  $-3x + 3y = -3$

A)  $(0, -2), (0, -9)$

B)  $(1, -9), (-2, -3)$

C)  $(1, 0), (0, -1)$

D)  $(-2, 0), (-9, 0)$

69) \_\_\_\_\_

70)  $-2x - 2y = 6$

A)  $(-1, 0), (4, 0)$

B)  $(0, -1), (0, 4)$

C)  $(-3, 4), (-1, 6)$

D)  $(0, -3), (-3, 0)$

70) \_\_\_\_\_

71)  $3x - 4y = 7$

A)  $(4, 0), (0, 11)$

B)  $\left(\frac{7}{3}, 0\right), \left(0, \frac{7}{4}\right)$

C)  $\left(-\frac{7}{4}, 0\right), \left(0, \frac{7}{3}\right)$

D)  $\left(\frac{7}{3}, 0\right), \left(0, -\frac{7}{4}\right)$

71) \_\_\_\_\_

72)  $7y - 11 = 3x$

A)  $\left(\frac{11}{3}, 0\right), \left(0, -\frac{11}{7}\right)$

C)  $(-14, 0), (0, 4)$

B)  $\left(\frac{11}{7}, 0\right), \left(0, -\frac{11}{3}\right)$

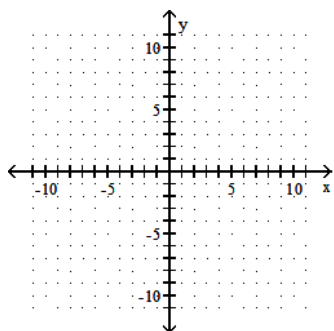
D)  $\left(-\frac{11}{3}, 0\right), \left(0, \frac{11}{7}\right)$

72) \_\_\_\_\_

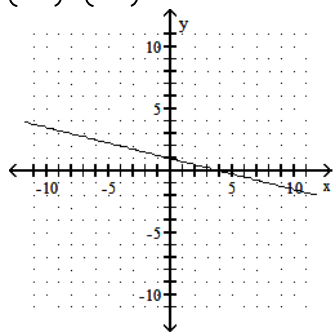
Find the x- and y-intercepts for the equation. Then graph the equation.

73)  $x + 4y = 4$

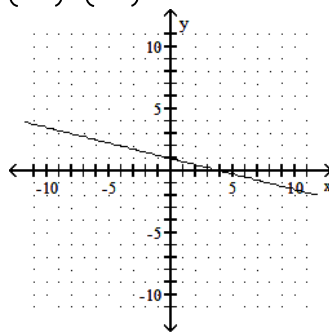
73) \_\_\_\_\_



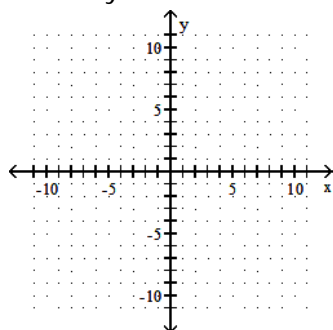
A)  $(4, 0), (0, 1)$



B)  $(1, 0), (0, 4)$

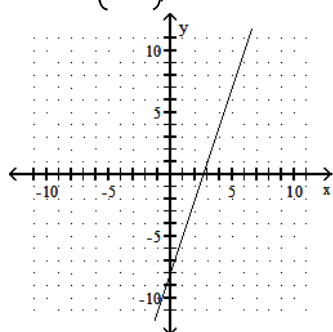


74)  $3x - 8 = y$

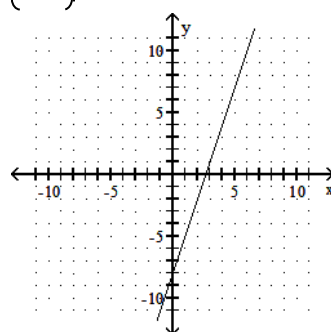


74) \_\_\_\_\_

A)  $(-8, 0), \left(0, \frac{8}{3}\right)$

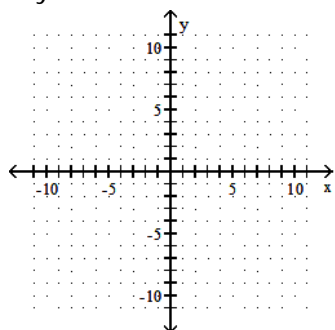


B)  $\left(\frac{8}{3}, 0\right), (0, -8)$



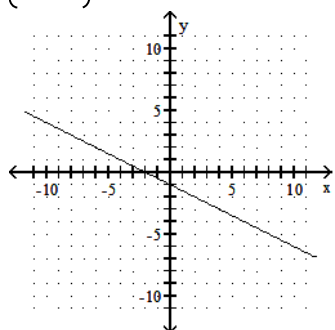


75)  $16y - 4x = -8$

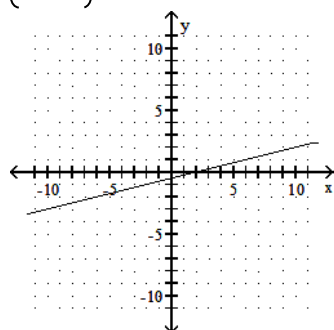


75) \_\_\_\_\_

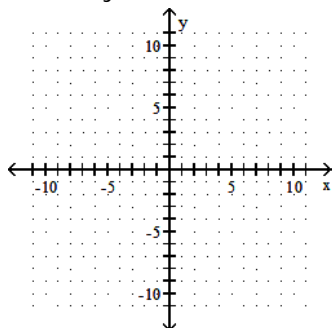
A)  $\left(0, -\frac{1}{2}\right), (-2, 0)$



B)  $\left(0, -\frac{1}{2}\right), (2, 0)$

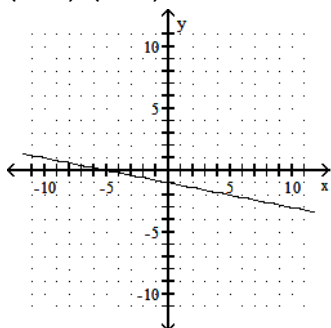


76)  $-5x - 25y = 25$

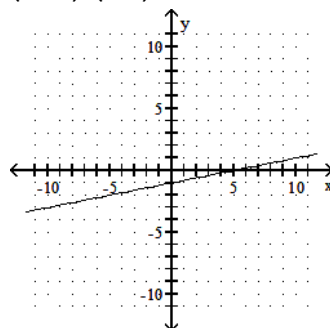


76) \_\_\_\_\_

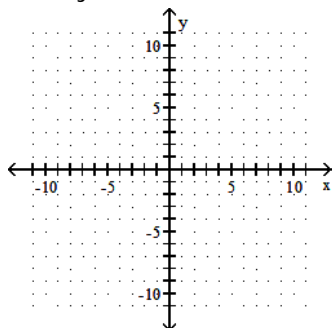
A)  $(0, -1), (-5, 0)$



B)  $(0, -1), (5, 0)$

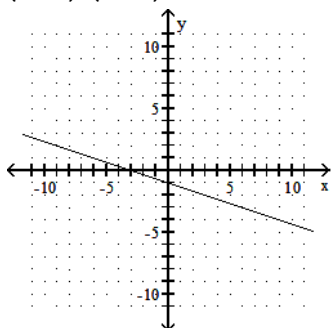


77)  $2x - 6y = 6$

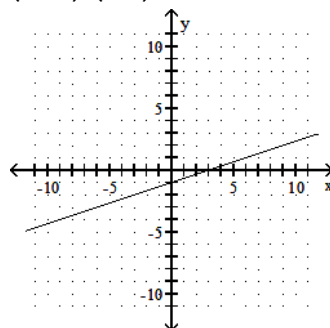


77) \_\_\_\_\_

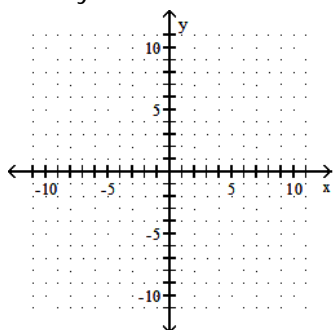
A)  $(0, -1), (-3, 0)$



B)  $(0, -1), (3, 0)$

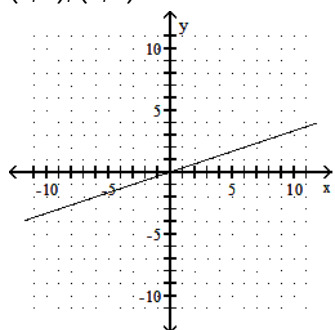


78)  $2x - 6y = 0$

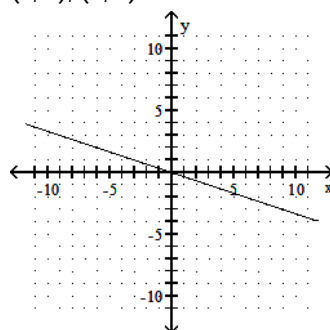


78) \_\_\_\_\_

A)  $(0, 0), (0, 0)$

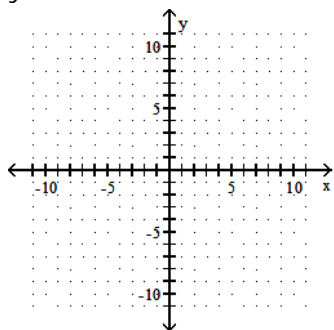


B)  $(0, 0), (0, 0)$



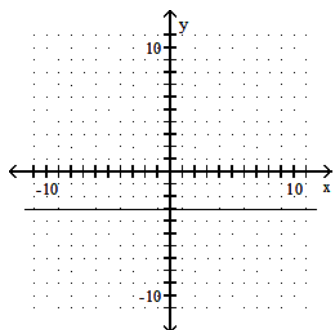
Graph.

79)  $y = 3$

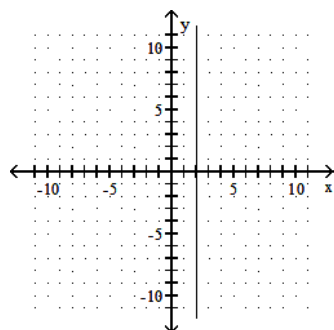


79) \_\_\_\_\_

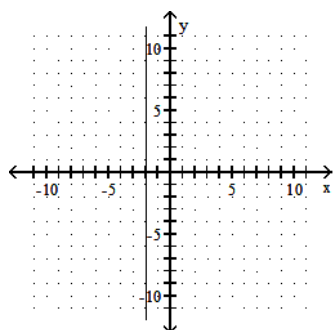
A)



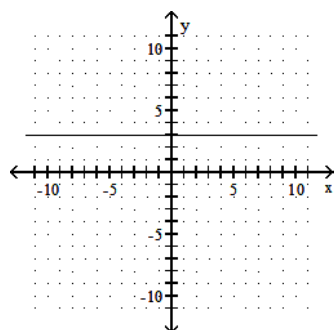
B)



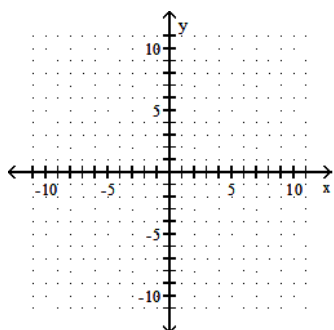
C)



D)

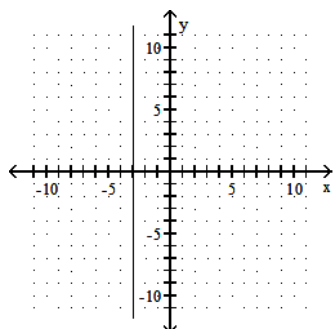


80)  $x = -2$

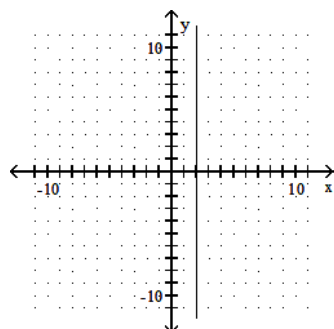


80) \_\_\_\_\_

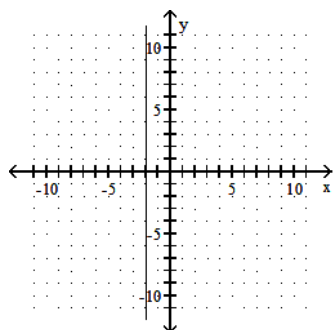
A)



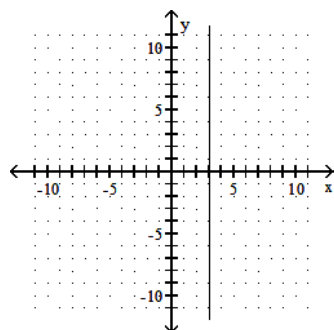
B)



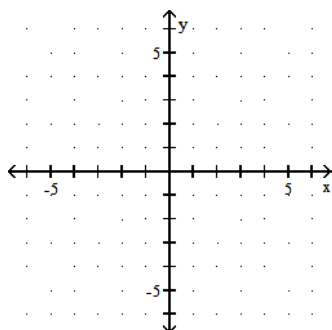
C)



D)

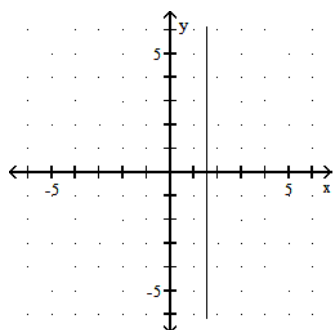


81)  $y = \frac{3}{2}$

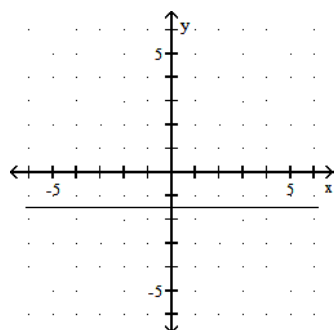


81) \_\_\_\_\_

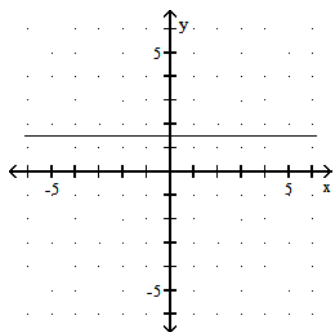
A)



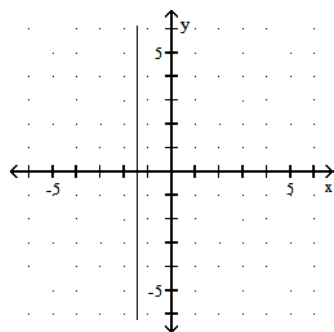
B)



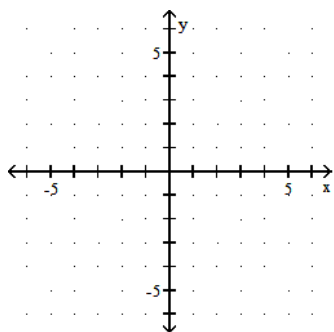
C)



D)

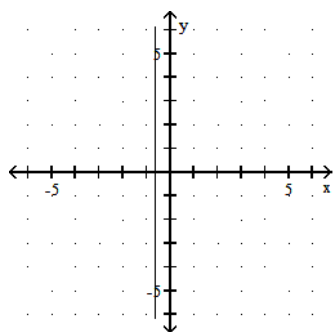


82)  $x = \frac{2}{3}$

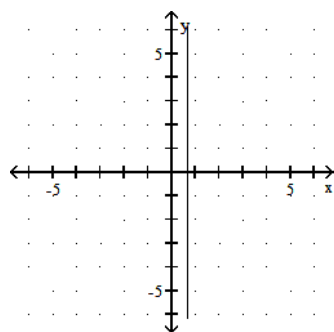


82) \_\_\_\_\_

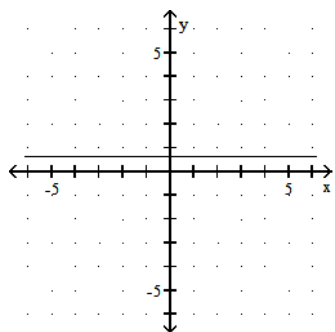
A)



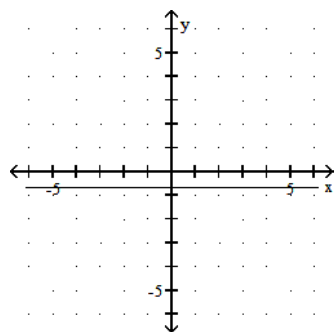
B)



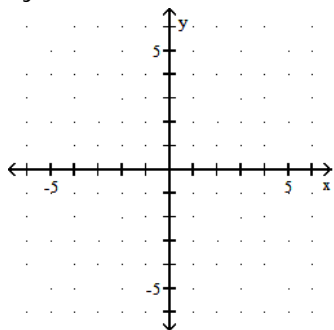
C)



D)

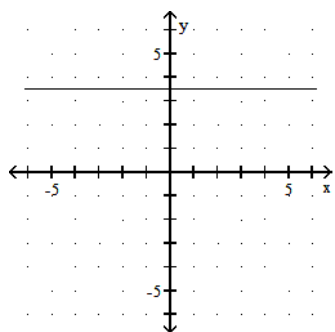


83)  $2y = 7$

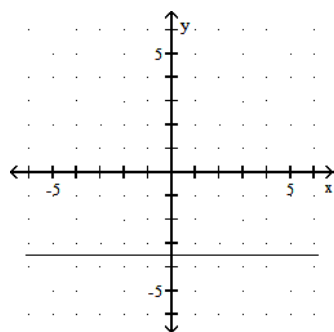


83) \_\_\_\_\_

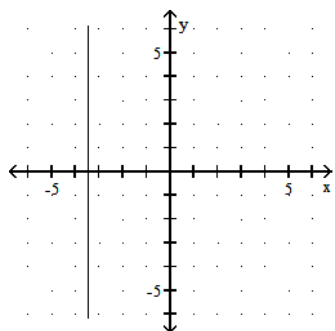
A)



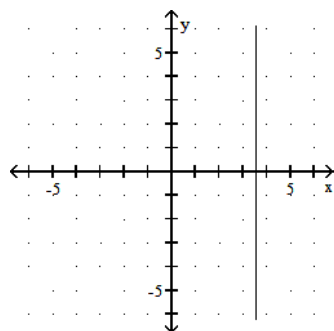
B)



C)



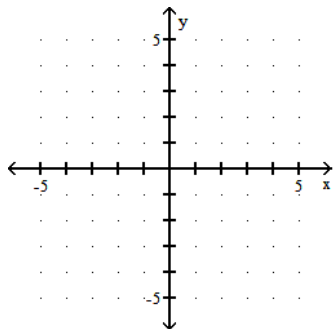
D)



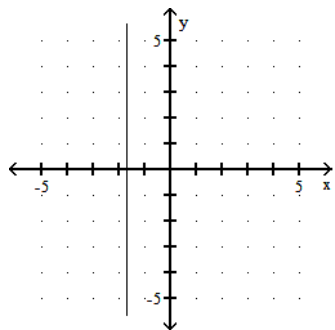


84)  $-3x = -5$

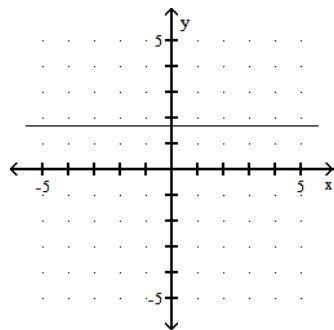
84) \_\_\_\_\_



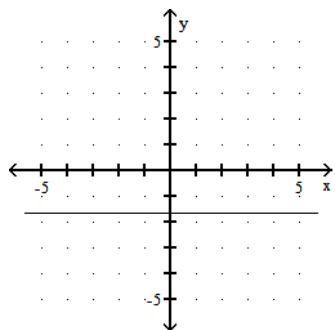
A)



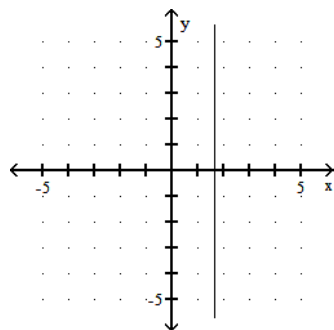
B)



C)

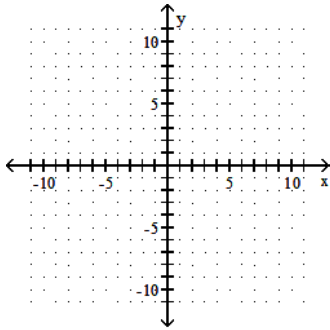


D)

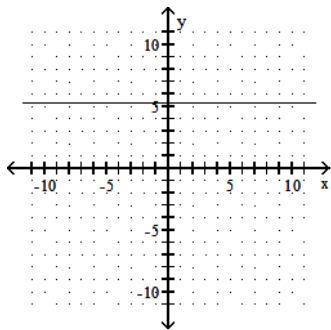


85)  $-4x + 21 = 0$

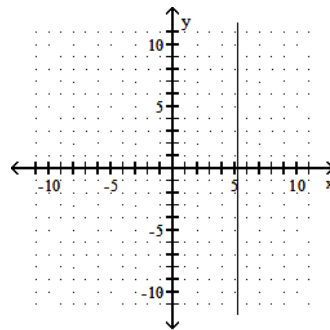
85) \_\_\_\_\_



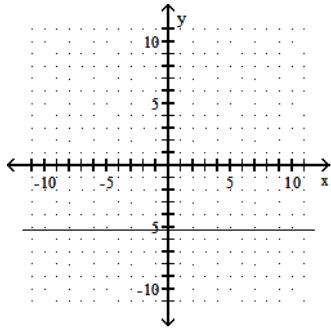
A)



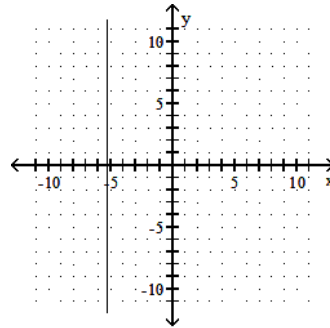
B)



C)

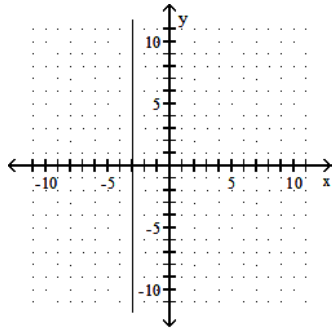


D)



Write an equation for the graph.

86)



86) \_\_\_\_\_

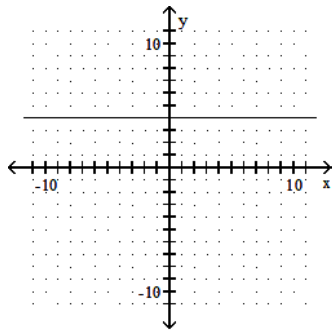
A)  $x = -3$

B)  $y = -3$

C)  $y = x - 3$

D)  $y = x - 6$

87)



87) \_\_\_\_\_

A)  $y = x + 8$

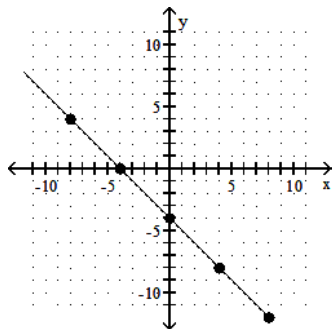
B)  $y = 4$

C)  $x = 4$

D)  $y = x + 4$

Find the slope of the line.

88)



88) \_\_\_\_\_

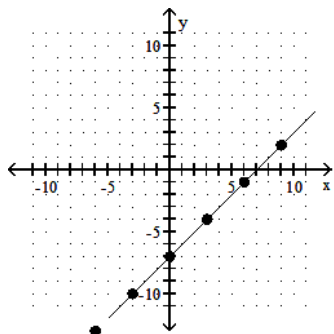
A)  $-4$

B)  $-1$

C)  $1$

D)  $4$

89)



89) \_\_\_\_\_

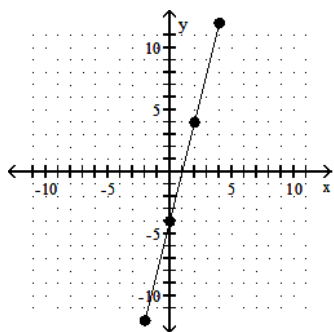
A) -7

B) 1

C) -1

D) 7

90)



90) \_\_\_\_\_

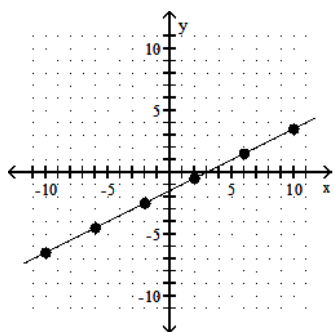
A) 4

B)  $-\frac{1}{4}$

C)  $\frac{1}{4}$

D) -4

91)



91) \_\_\_\_\_

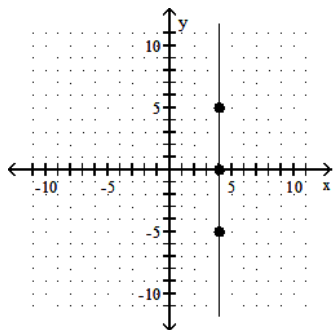
A)  $-\frac{1}{2}$

B)  $\frac{1}{2}$

C) -2

D) 2

92)



92) \_\_\_\_\_

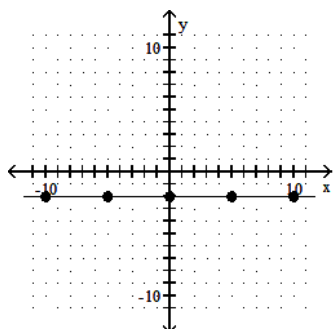
A) Undefined

B) 4

C) 0

D)  $\frac{3}{2}$

93)



93) \_\_\_\_\_

A)  $\frac{7}{-4}$

B) 0

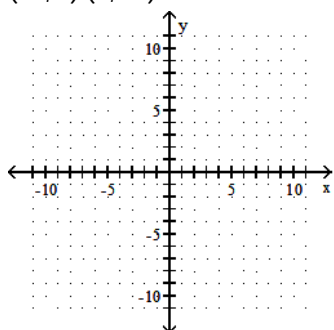
C) -2

D) Undefined

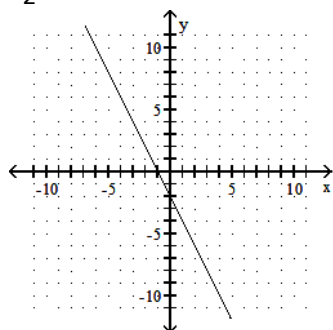
Graph the line containing the given pair of points and find the slope.

94) (-2, 0) (0, -1)

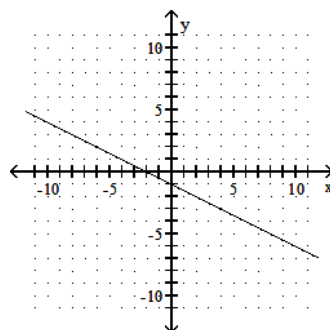
94) \_\_\_\_\_



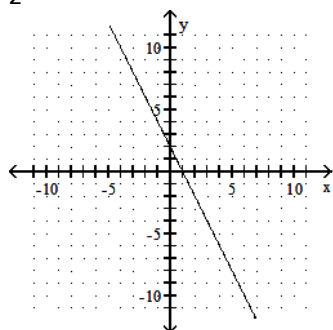
A) -2



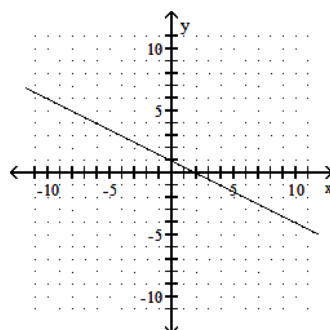
B)  $-\frac{1}{2}$



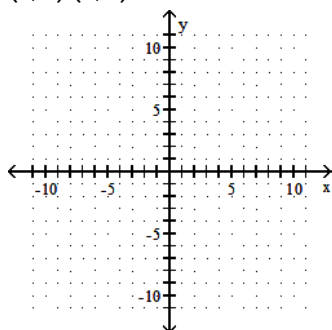
C) 2



D)  $\frac{1}{2}$

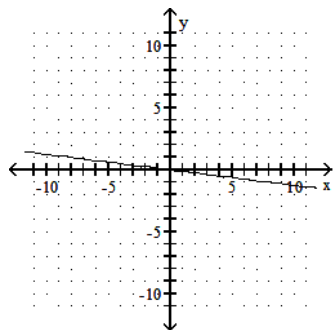


95) (1, 8) (0, 0)

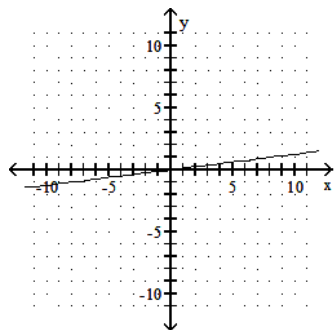


95) \_\_\_\_\_

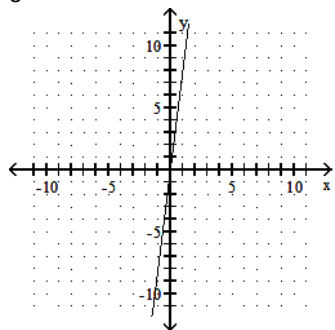
A)  $-\frac{1}{8}$



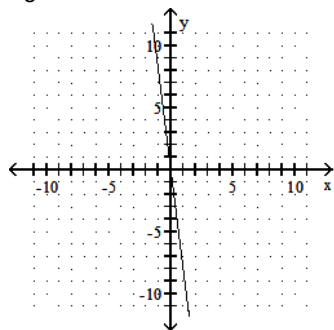
B)  $\frac{1}{8}$



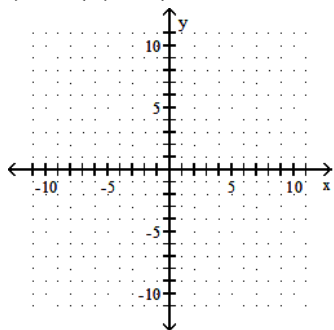
C) 8



D) -8

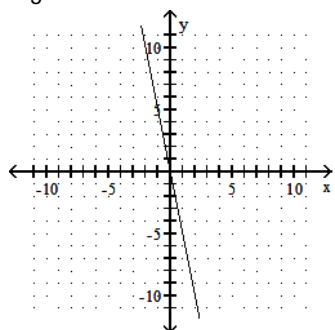


96) (2, -10) (-1, 5)

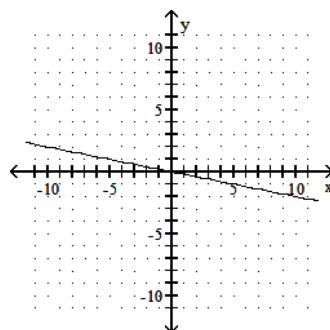


96) \_\_\_\_\_

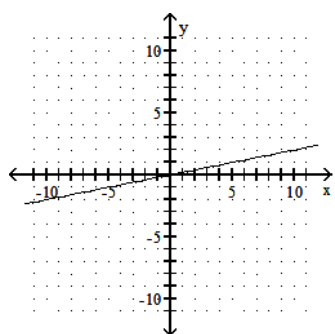
A) - 5



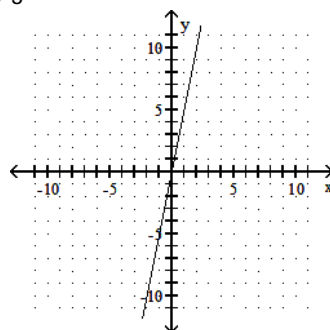
B)  $-\frac{1}{5}$



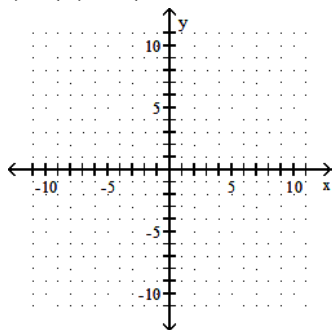
C)  $\frac{1}{5}$



D) 5



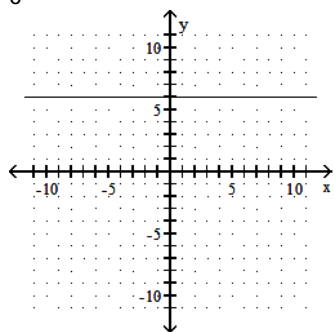
97) (3, 6) (-4, 6)



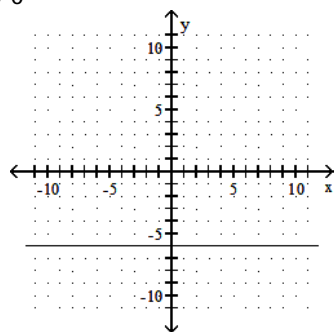
97) \_\_\_\_\_



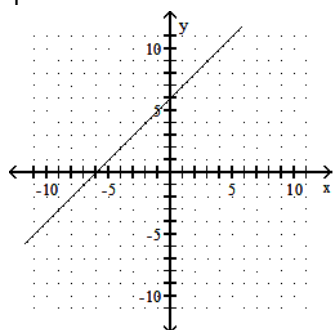
A) 0



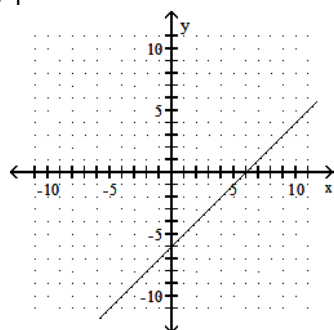
B) 0



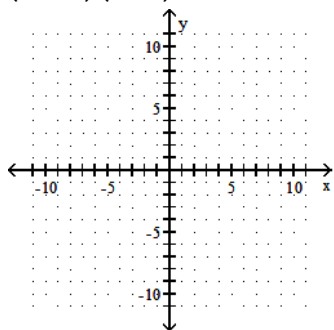
C) 1



D) 1

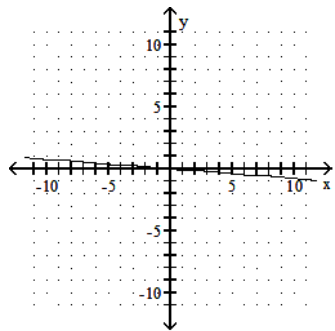


98)  $(-4, -5)$   $(9, -4)$

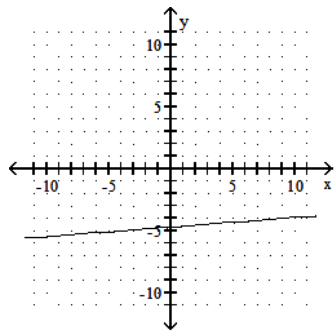


98) \_\_\_\_\_

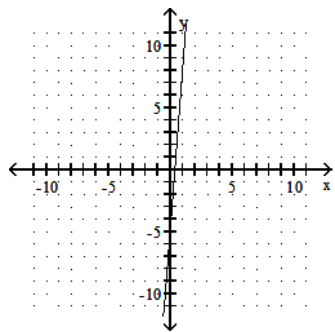
A)  $-\frac{1}{13}$



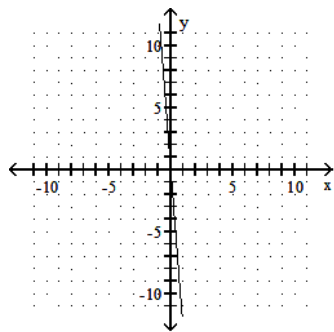
B)  $\frac{1}{13}$



C) 13



D) -13



Find the slope of the line going through the pair of points.

99) (8, -7), (-4, -1)

A) -5

B) -2

C)  $-\frac{1}{5}$

D)  $-\frac{1}{2}$

99) \_\_\_\_\_

100) (6, -4), (6, -5)

A)  $\frac{1}{7}$

B) -1

C) 7

D) Undefined

100) \_\_\_\_\_

101) (-6, -9), (1, -9)

A) 0

B) 1

C) -3

D) 3

101) \_\_\_\_\_

102) (6, 0), (0, 8)

A) 3.33

B) -1.33

C) 0.75

D) 1.33

102) \_\_\_\_\_

103) (6.5, 0.5), (3.8, -4.4)

A) -4.9

B) -2.7

C) -1.8

D) 1.8

103) \_\_\_\_\_

104)  $(\frac{1}{3}, -3), (\frac{1}{2}, 4)$

A) - 42

B) 42

C)  $\frac{7}{6}$

D)  $\frac{1}{42}$

104) \_\_\_\_\_

Find the slope of the line.

105)  $2x + 5y = 21$

A)  $\frac{2}{5}$

B)  $-\frac{5}{2}$

C)  $\frac{5}{2}$

D)  $-\frac{2}{5}$

105) \_\_\_\_\_

106)  $-3y = -2x - 12$

A)  $\frac{3}{2}$

B)  $-\frac{2}{3}$

C)  $-\frac{3}{2}$

D)  $\frac{2}{3}$

106) \_\_\_\_\_

107)  $2x - 3y = 10$

A)  $\frac{3}{2}$

B)  $-\frac{2}{3}$

C)  $-\frac{3}{2}$

D)  $\frac{2}{3}$

107) \_\_\_\_\_

108)  $4x - 5y = -35$

A)  $-1\frac{1}{4}$

B)  $1\frac{1}{4}$

C)  $\frac{4}{5}$

D)  $-\frac{4}{5}$

108) \_\_\_\_\_

109)  $x = 3$

A) 3

B) -3

C) 0

D) Undefined

109) \_\_\_\_\_

110)  $y = -3$

A) 3

B) -3

C) 0

D) Undefined

110) \_\_\_\_\_

Solve the problem.

111) Kannanaski Rapids drops 69 ft vertically over a horizontal distance of 883 ft. What is the slope of the rapids?

A) -12.8

B) -69

C) -0.078

D) -0.001

111) \_\_\_\_\_

112) Over one particular stretch of road, the Whitepoint Highway rises 462 ft over a horizontal distance of 3800 ft. Find the grade of the road.

A) 3%

B) 6.1%

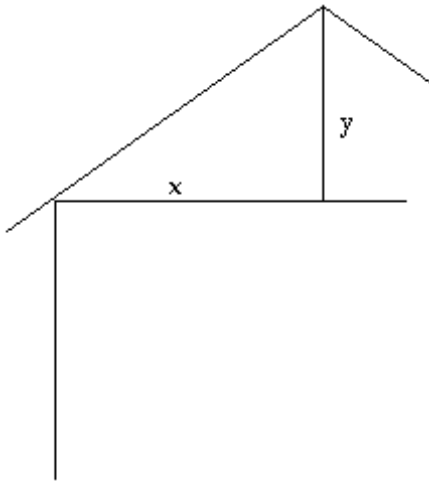
C) 0.08%

D) 12.2%

112) \_\_\_\_\_

113)

113) \_\_\_\_\_



Let  $x = 28$  and  $y = 7$ . Find the pitch of the roof.

A)  $\frac{1}{3}$

B)  $\frac{1}{2}$

C)  $\frac{1}{6}$

D)  $\frac{1}{4}$

114) An old house has a basement stairway that has steps with 7.25 inch risers and 7 inch treads. What is the slope of the stairway?

114) \_\_\_\_\_

A) 10.36

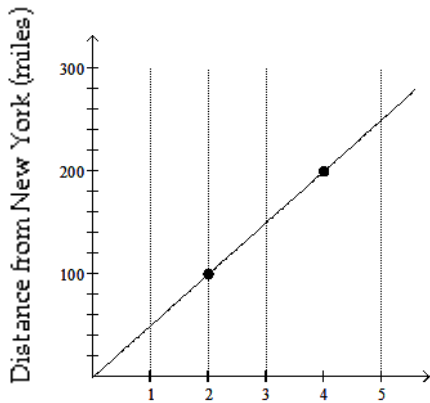
B) 0.97

C) 1.04

D) -0.25

115) The following graph shows data for a recent train ride from New York to Toronto. Find the rate of change of the distance from New York with respect to time, in miles per hour.

115) \_\_\_\_\_



Time of Day (PM)

A) 50 miles per hour

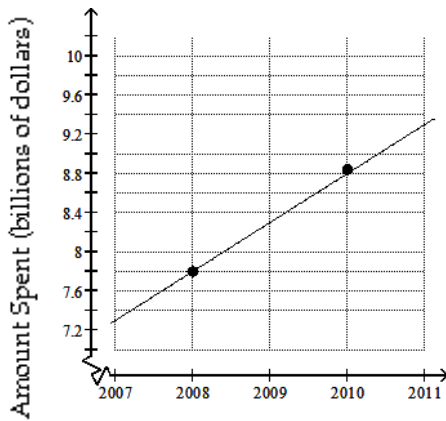
B) 40 miles per hour

C) 100 miles per hour

D) 55 miles per hour

- 116) Data regarding the amount spent by a government department is represented in the following graph. Find the rate of change of the amount spent with respect to time, in billions per year.

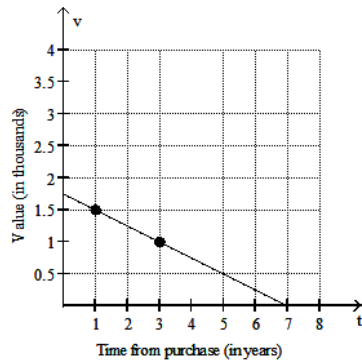
116) \_\_\_\_\_



Year

- A) Increase of \$0.13 billion per year  
 B) Decrease of \$0.33 billion per year  
 C) Decrease of \$0.23 billion per year  
 D) Increase of \$0.23 billion per year
- 117) The value of a particular computer system is represented in the following graph. Find the rate of change of the value of the computer system with respect to time, in dollars per year.

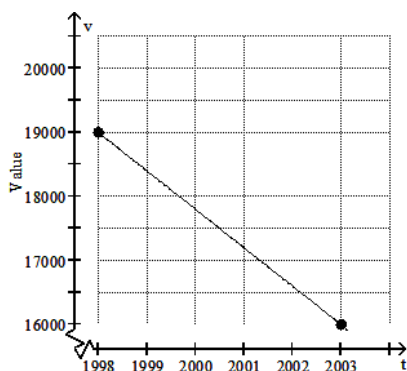
117) \_\_\_\_\_



- A) -\$500 per year  
 B) -\$250 per year  
 C) -\$750 per year  
 D) -\$1000 per year

- 118) The value of a particular car is represented in the following graph. Find the rate of change of the value of the car with respect to time, in dollars per year.

118) \_\_\_\_\_



- A) -\$400 per year      B) -\$650 per year      C) -\$500 per year      D) -\$600 per year

Answer the question.

- 119) True or False? The y-coordinate is positive in quadrants I and IV.

119) \_\_\_\_\_

- A) False      B) True

- 120) True or False? The ordered pair (0, 0) determines a point in quadrant I with x-coordinate 0 and y-coordinate 0.

120) \_\_\_\_\_

- A) False      B) True

**SHORT ANSWER. Write the word or phrase that best completes each statement or answers the question.**

- 121) Explain how you would find the x intercept of a line with an equation of the form  $Ax + By = C$ .

121) \_\_\_\_\_

- 122) What can you say about the graph of  $Ax + By = C$  if B is equal to zero?

122) \_\_\_\_\_

- 123) What can you say about a line if every point on the line has the same x coordinate?

123) \_\_\_\_\_

- 124) Is it possible for the x-intercept and the y-intercept of a straight line to be at the same point? Explain your answer.

124) \_\_\_\_\_

- 125) What is the y-intercept of the line  $y = b$ ?

125) \_\_\_\_\_

- 126) Does every straight line have an x-intercept? If not, give an example of an equation whose graph does not have an x-intercept.

126) \_\_\_\_\_

**MULTIPLE CHOICE. Choose the one alternative that best completes the statement or answers the question.**

Find the slope and the y-intercept of the line.

127)  $y = -8x - 5$

A) Slope -8; y-intercept (0, 5)

C) Slope -5; y-intercept (0, -8)

B) Slope -8; y-intercept (0, -5)

D) Slope -8; y-intercept (-5, 0)

127) \_\_\_\_\_

128)  $4x + 5y = 26$

A) Slope  $-\frac{1}{4}$ ; y-intercept  $\left(0, \frac{5}{26}\right)$

C) Slope  $\frac{1}{4}$ ; y-intercept  $\left(0, \frac{5}{26}\right)$

B) Slope  $-\frac{4}{5}$ ; y-intercept  $\left(0, \frac{26}{5}\right)$

D) Slope  $\frac{4}{5}$ ; y-intercept  $\left(0, \frac{26}{5}\right)$

128) \_\_\_\_\_

129)  $5x + 9y = 61$

A) Slope  $1\frac{4}{5}$ ; y-intercept  $\left(0, \frac{9}{61}\right)$

C) Slope  $\frac{5}{9}$ ; y-intercept  $\left(0, \frac{61}{9}\right)$

B) Slope  $-\frac{5}{9}$ ; y-intercept  $\left(0, \frac{61}{9}\right)$

D) Slope  $-1\frac{4}{5}$ ; y-intercept  $\left(0, \frac{9}{61}\right)$

129) \_\_\_\_\_

130)  $-6x + 9y = 9$

A) Slope -1; y-intercept (0, 1)

C) Slope  $\frac{2}{3}$ ; y-intercept (0, 1)

B) Slope  $-\frac{2}{3}$ ; y-intercept (0, -1)

D) Slope 1; y-intercept (0, -1)

130) \_\_\_\_\_

131)  $-4x + 5y = -10$

A) Slope  $-1\frac{1}{4}$ ; y-intercept (0, -2)

C) Slope  $1\frac{1}{4}$ ; y-intercept (0, 2)

B) Slope  $\frac{4}{5}$ ; y-intercept (0, -2)

D) Slope  $-\frac{4}{5}$ ; y-intercept (0, 2)

131) \_\_\_\_\_

132)  $y = -7$

A) Slope 0; y-intercept (0, 0)

C) Slope 0; y-intercept (0, -7)

B) Slope undefined; y-intercept (0, -7)

D) Slope -7; y-intercept (0, 0)

132) \_\_\_\_\_

Find an equation of the line with the given slope and y-intercept.

133) Slope = -9, y-intercept = (0, -3)

A)  $y = -9x - 3$

B)  $y = -3x - 9$

C)  $y = -9x + 3$

D)  $y = -9x + 9$

133) \_\_\_\_\_

134) Slope = -3, y-intercept = (0, -28)

A)  $y = -28x + 3$

B)  $y = -3x - 28$

C)  $y = -3x + 28$

D)  $y = -28x - 3$

134) \_\_\_\_\_

135) Slope = -8.9, y-intercept = (0, 2.02)

A)  $y = 2.02x - 8.9$

C)  $y = 8.9x + 2.02$

B)  $y = -8.9x + 2.02$

D)  $y = 2.02x + 8.9$

135) \_\_\_\_\_

136) Slope =  $-\frac{2}{3}$ , y-intercept = (0, 3)

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

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

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

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

136) \_\_\_\_\_

137) Slope = 0, y-intercept = (0, 2)

A)  $y = 2x$

B)  $x = 2$

C)  $y = 0$

D)  $y = 2$

137) \_\_\_\_\_

138) Slope = 3, y-intercept = (0, 0)

A)  $x = 3y$

B)  $y = x + 3$

C)  $y = 3x$

D)  $y = 3$

138) \_\_\_\_\_

139) Slope =  $-\frac{5}{4}$ , y-intercept = (0, 7)

A)  $y = \frac{5}{4}x - 7$

B)  $y = \frac{5}{4}x + 7$

C)  $y = -\frac{5}{4}x + 7$

D)  $y = -\frac{5}{4}x - 7$

139) \_\_\_\_\_

140) Slope =  $\frac{5}{4}$ , y-intercept = (0, -1)

A)  $y = \frac{5}{4}x + 1$

B)  $y = -\frac{5}{4}x - 1$

C)  $y = -\frac{5}{4}x + 1$

D)  $y = \frac{5}{4}x - 1$

140) \_\_\_\_\_

141) Slope = 4, y-intercept =  $\left(0, -\frac{4}{5}\right)$

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

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

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

D)  $y = 4x + \frac{4}{5}$

141) \_\_\_\_\_

Find an equation of the line containing the given point and having the given slope. Write the equation in slope-intercept form.

142) (4, 2),  $m = -4$

A)  $y = -4x + 18$

B)  $y = -\frac{1}{4}x + 18$

C)  $y = -4x + \frac{1}{18}$

D)  $y = -4x - 18$

142) \_\_\_\_\_

143) (8, -3),  $m = -4$

A)  $y = -4x + 30$

B)  $y = -4x + 27$

C)  $y = -4x + 29$

D)  $y = 4x + 28$

143) \_\_\_\_\_

144) (-5, 6),  $m = -9$

A)  $y = -9x - 40$

B)  $y = 9x - 41$

C)  $y = -9x - 47$

D)  $y = -9x - 39$

144) \_\_\_\_\_



- 145) (12, -1),  $m = -\frac{1}{3}$  145) \_\_\_\_\_  
 A)  $y = \frac{1}{3}x - 3$  B)  $y = -\frac{1}{3}x + 5$  C)  $y = -\frac{1}{3}x + 3$  D)  $y = -\frac{1}{3}x + \frac{11}{3}$
- 146) (2, 3),  $m = -\frac{3}{4}$  146) \_\_\_\_\_  
 A)  $y = -\frac{3}{4}x + \frac{2}{9}$  B)  $y = -\frac{4}{3}x + \frac{9}{2}$  C)  $y = -\frac{3}{4}x - \frac{9}{2}$  D)  $y = -\frac{3}{4}x + \frac{9}{2}$
- 147) (3, 2),  $m = -\frac{3}{7}$  147) \_\_\_\_\_  
 A)  $y = -\frac{3}{7}x - \frac{23}{7}$  B)  $y = -\frac{7}{3}x - \frac{7}{23}$  C)  $y = -\frac{3}{7}x + \frac{7}{23}$  D)  $y = -\frac{3}{7}x + \frac{23}{7}$
- 148) (0, 3),  $m = \frac{2}{5}$  148) \_\_\_\_\_  
 A)  $y = \frac{2}{5}x + 3$  B)  $y = -\frac{2}{5}x + 3$  C)  $y = -\frac{5}{2}x + \frac{1}{3}$  D)  $y = \frac{2}{5}x - \frac{1}{3}$
- 149) (0, 3),  $m = -\frac{3}{7}$  149) \_\_\_\_\_  
 A)  $y = -\frac{3}{7}x - 3$  B)  $y = -\frac{3}{7}x + 3$  C)  $y = -\frac{7}{3}x + 3$  D)  $y = -\frac{3}{7}x + \frac{1}{3}$
- 150) (-9, 7),  $m = 0$  150) \_\_\_\_\_  
 A)  $y = 7$  B)  $y = \frac{7}{9}x + 0$  C)  $x = -9$  D)  $y = \frac{9}{7}x + 0$
- 151) (-3, 0),  $m = 2$  151) \_\_\_\_\_  
 A)  $y = -3x + 2$  B)  $y = -2x - 3$  C)  $y = 2x + 6$  D)  $y = 3x + 2$
- Find an equation of the line that contains the given pair of points. Write the equation in the form  $y = mx + b$ .
- 152) (-9, -2) and (0, -4) 152) \_\_\_\_\_  
 A)  $y = -\frac{2}{9}x - 4$  B)  $y = \frac{7}{4}x - 4$  C)  $y = \frac{2}{9}x - 4$  D)  $y = -\frac{7}{4}x - 4$
- 153) (-5, 0) and (8, 5) 153) \_\_\_\_\_  
 A)  $y = -\frac{5}{3}x + \frac{55}{3}$  B)  $y = \frac{5}{13}x + \frac{25}{13}$  C)  $y = -\frac{5}{13}x + \frac{25}{13}$  D)  $y = \frac{5}{3}x + \frac{55}{3}$
- 154) (-2, 0) and (7, 4) 154) \_\_\_\_\_  
 A)  $y = \frac{4}{9}x + \frac{8}{9}$  B)  $y = \frac{2}{3}x + \frac{26}{3}$  C)  $y = -\frac{2}{3}x + \frac{26}{3}$  D)  $y = -\frac{4}{9}x + \frac{8}{9}$

155)  $(-7, 5)$  and  $(-4, -2)$  155) \_\_\_\_\_  
 A)  $y = \frac{7}{3}x - \frac{34}{3}$  B)  $y = -6x + 22$  C)  $y = -\frac{7}{3}x - \frac{34}{3}$  D)  $y = 6x + 22$

156)  $(3, 2)$  and  $(3, -9)$  156) \_\_\_\_\_  
 A)  $x = -9$  B)  $x = 3$  C)  $y = 2$  D)  $y = 3$

157)  $(2, -2)$  and  $(-10, -2)$  157) \_\_\_\_\_  
 A)  $y = -10$  B)  $x = 2$  C)  $x = -2$  D)  $y = -2$

Solve the problem.

158) Suppose the sales of a particular brand of appliance satisfy the relationship  $y = 100x + 2100$ , where  $y$  represents the number of sales in year  $x$ , with  $x = 0$  corresponding to 1982. Find the number of sales in 1997. 158) \_\_\_\_\_  
 A) 7100 sales B) 3600 sales C) 3500 sales D) 7200 sales

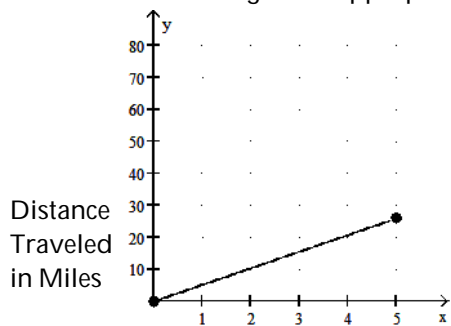
159) Assume that the sales of a certain appliance dealer are approximated by a linear function. Suppose that sales were \$7000 in 1982 and \$76,500 in 1987. Let  $x = 0$  represent 1982. Find the equation giving yearly sales  $y$ . 159) \_\_\_\_\_  
 A)  $S(x) = 69,500x + 76,500$  B)  $S(x) = 13,900x + 76,500$   
 C)  $S(x) = 13,900x + 7000$  D)  $S(x) = 69,500x + 7000$

160) Let  $y = -17x + 174$  represent the number of students present in a large class, where  $x$  represents the number of hours of study required weekly. What is the rate of change of the number of students in the class with respect to the number of hours of study? 160) \_\_\_\_\_  
 A) -174 B) 17 C) -17 D) 174

161) Suppose  $y = mx + b$  is a mathematical model for actual time as a function of estimated time, where  $y$  represents actual time and  $x$  represents estimated time and  $m$  and  $b$  are constants. If  $m = 1.3$  and  $b = -4$ , find  $y$  when  $x$  is 120 min. 161) \_\_\_\_\_  
 A) 114.8 min B) 152 min C) 125.2 min D) 160 min

162) Find the rate of change. Use appropriate units.

162) \_\_\_\_\_



Number of Hours Spent Traveling

A) 0.2 miles per hour

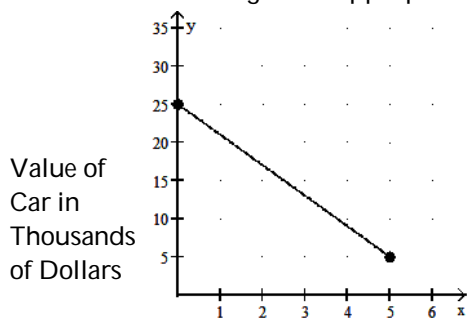
B) 3.2 miles per hour

C) 0.3 miles per hour

D) 5.2 miles per hour

163) Find the rate of change. Use appropriate units.

163) \_\_\_\_\_



Number of Years of Use

A) -\$4.00 thousand per year

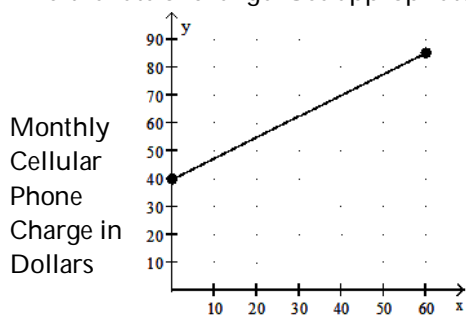
B) \$4.00 thousand per year

C) \$5.00 thousand per year

D) -\$5.00 thousand per year

164) Find the rate of change. Use appropriate units.

164) \_\_\_\_\_



Minutes Cellular Phone is Used

A) \$0.24 per minute

B) \$2.63 per minute

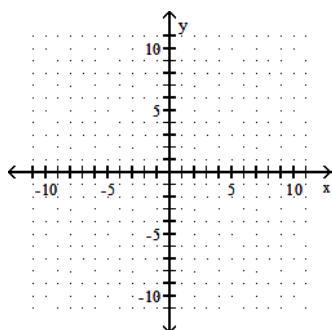
C) \$1.33 per minute

D) \$0.75 per minute

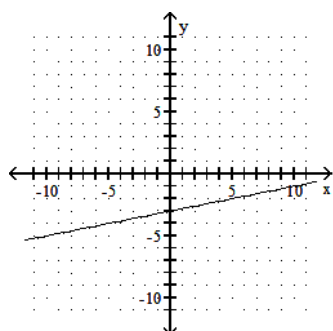
Draw a line that has the given slope and y-intercept.

165) Slope  $\frac{1}{5}$ ; y-intercept (0, 3)

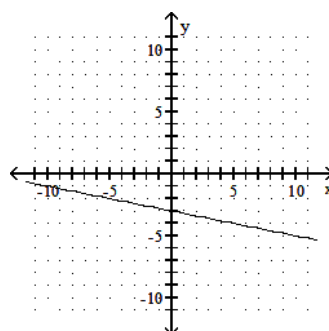
165) \_\_\_\_\_



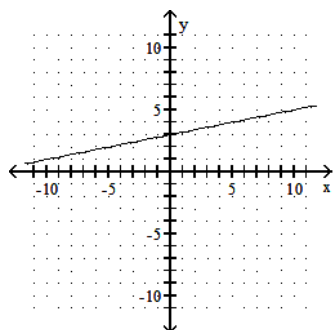
A)



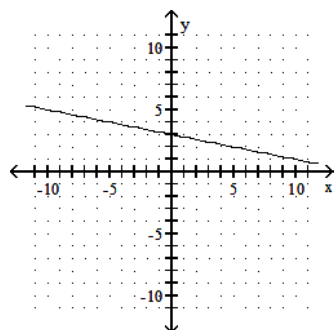
B)



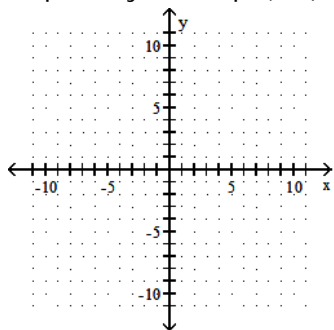
C)



D)

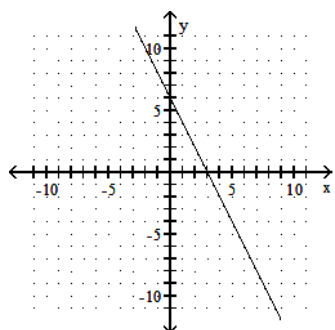


166) Slope - 2; y-intercept (0, 6)

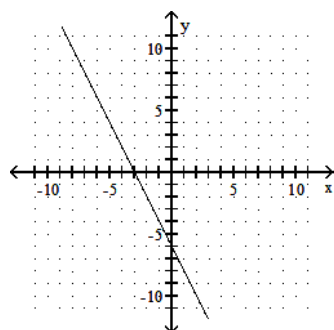


166) \_\_\_\_\_

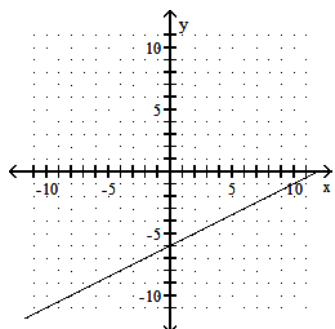
A)



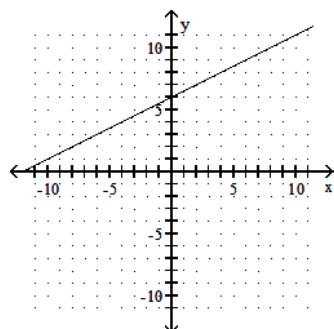
B)



C)

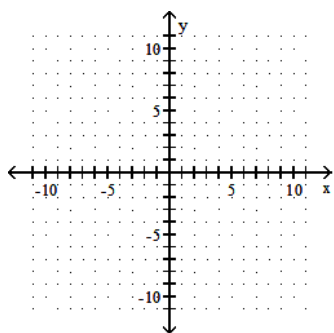


D)

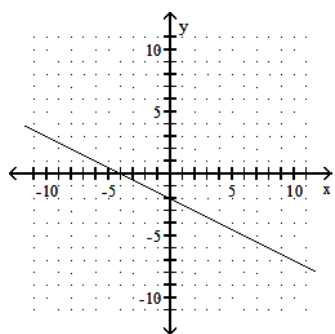


167) Slope  $-\frac{1}{2}$ ; y-intercept (0, 2)

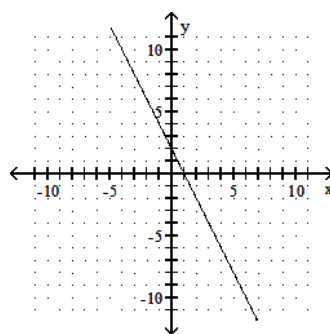
167) \_\_\_\_\_



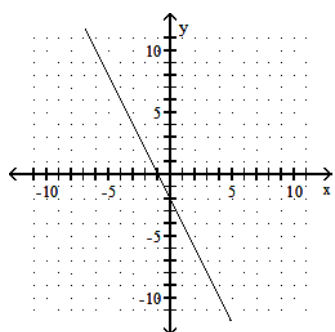
A)



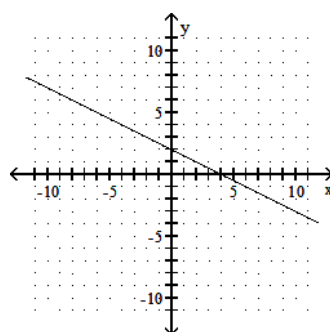
B)



C)

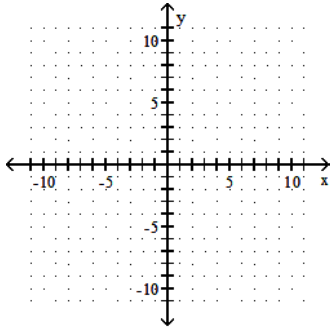


D)

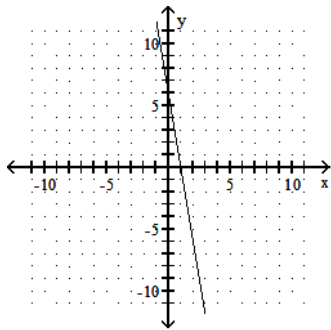


168) Slope  $-\frac{1}{6}$ ; y-intercept (0, 6)

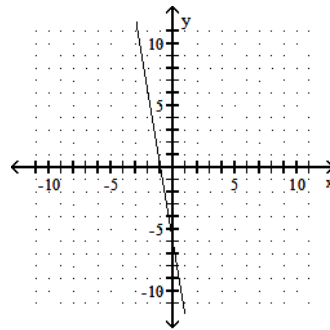
168) \_\_\_\_\_



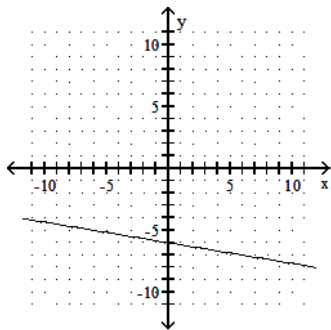
A)



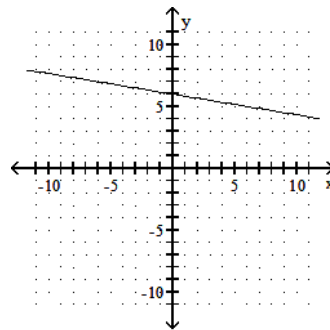
B)



C)

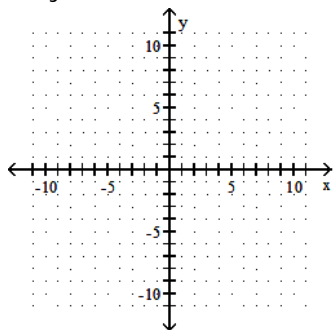


D)



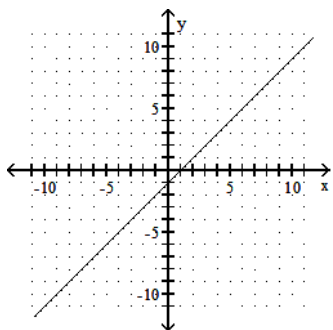
Graph using the slope and the y-intercept.

169)  $x + y = -1$

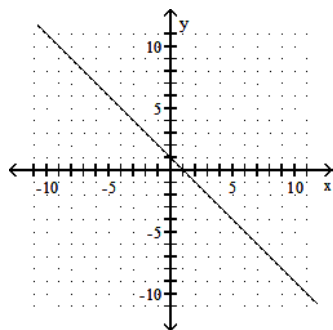


169) \_\_\_\_\_

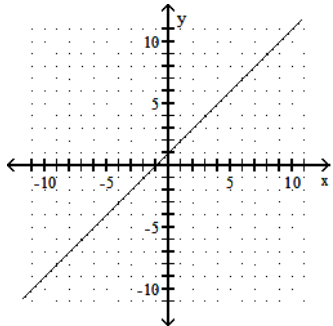
A)



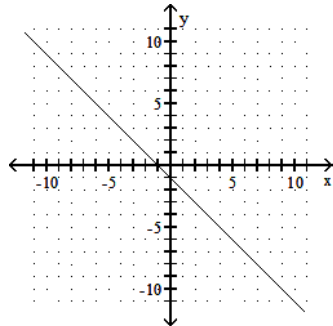
B)



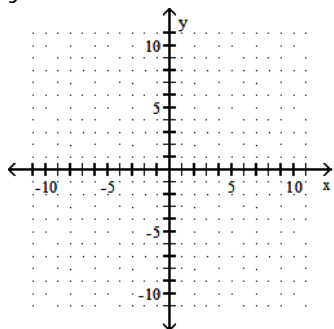
C)



D)



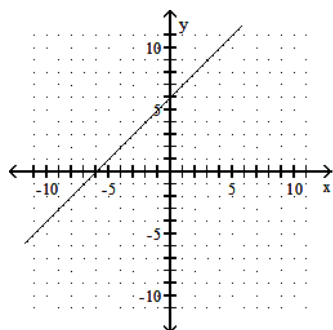
170)  $y = x - 6$



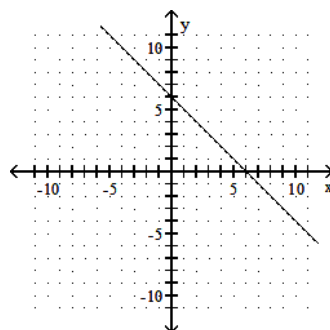
170) \_\_\_\_\_



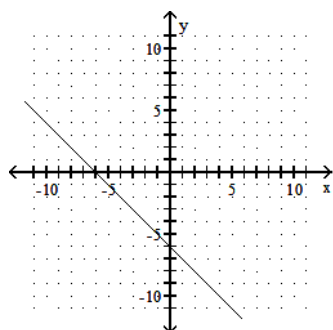
A)



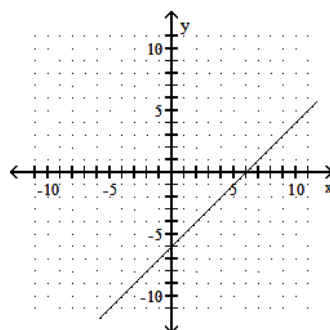
B)



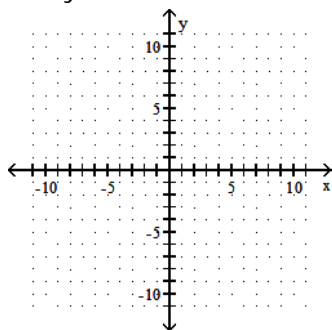
C)



D)

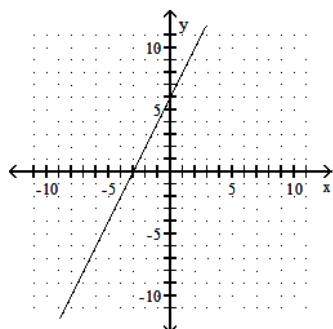


171)  $2x - y = -6$

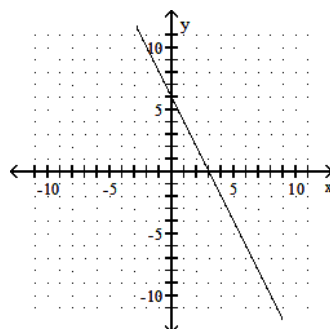


171) \_\_\_\_\_

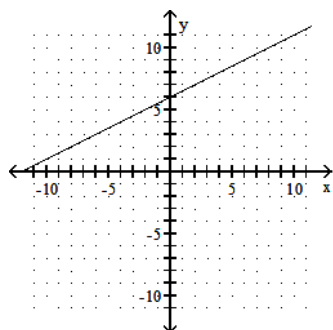
A)



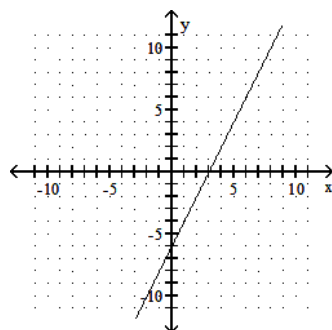
B)



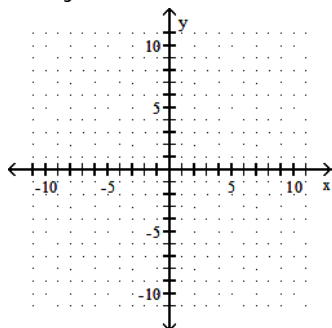
C)



D)

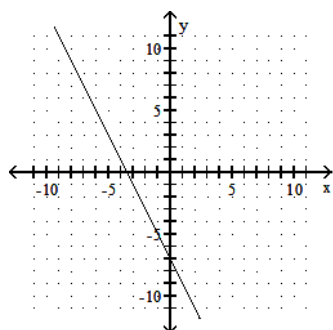


172)  $2x - y = 7$

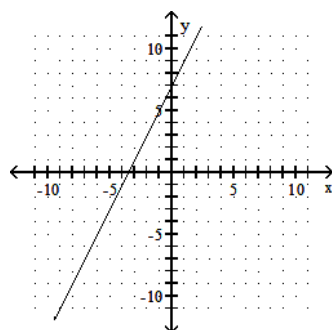


172) \_\_\_\_\_

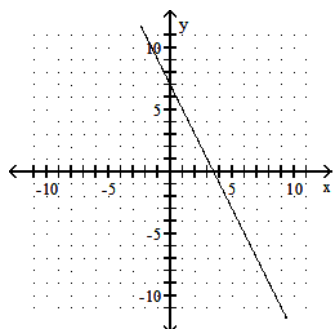
A)



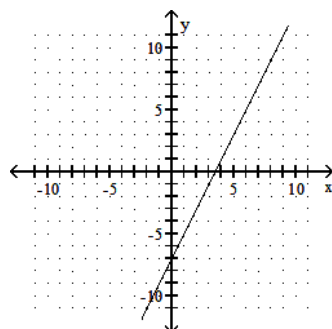
B)



C)

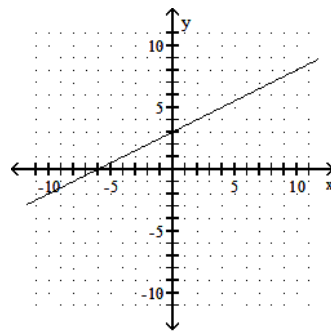
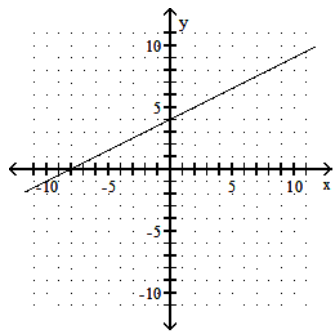
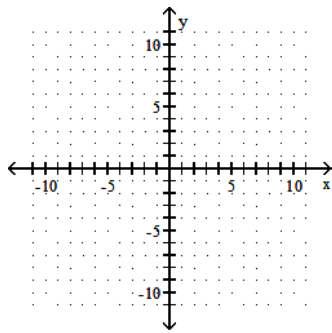


D)

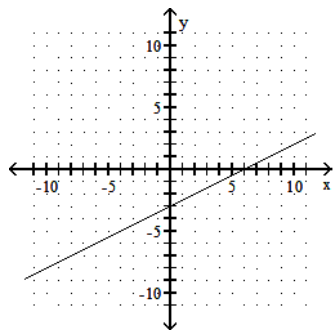


173)  $y = \frac{1}{2}x - 3$

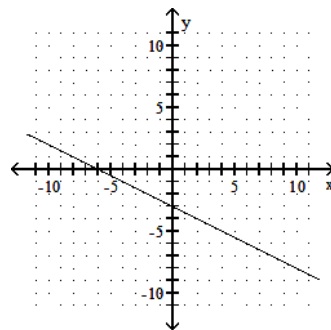
173) \_\_\_\_\_



A)



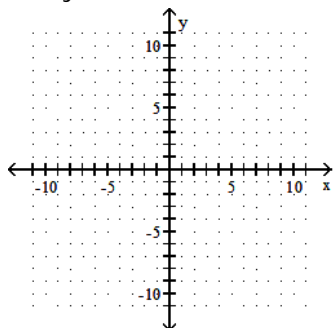
B)



C)

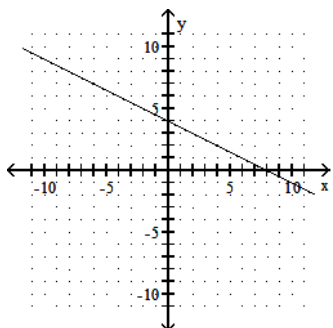
D)

174)  $x + 2y = 8$

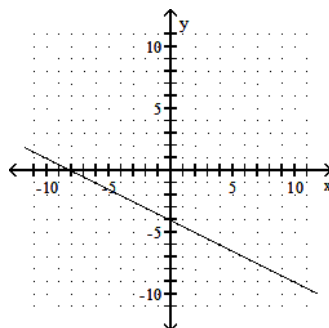


174) \_\_\_\_\_

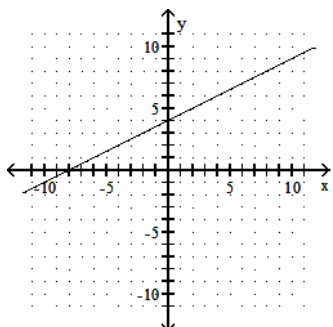
A)



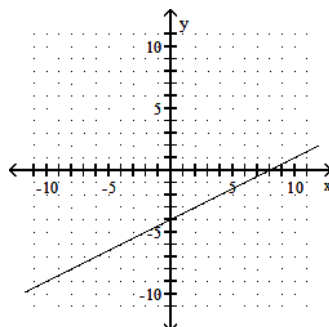
B)



C)



D)



Determine whether the graphs of the equations are parallel lines, perpendicular lines, or neither.

175)  $3x - 2y = -8$

$2x + 3y = -8$

A) Neither

B) Perpendicular

C) Parallel

175) \_\_\_\_\_

176)  $3x - 4y = 3$

$8x + 6y = 3$

A) Perpendicular

B) Neither

C) Parallel

176) \_\_\_\_\_

177)  $6x + 2y = 8$  177) \_\_\_\_\_  
 $12x + 4y = 18$   
 A) Parallel B) Neither C) Perpendicular

178)  $12x + 4y = 16$  178) \_\_\_\_\_  
 $5y - 24 = -15x$   
 A) Parallel B) Neither C) Perpendicular

179)  $4x - 6y = -8$  179) \_\_\_\_\_  
 $8x + 8y = -8$   
 A) Parallel B) Neither C) Perpendicular

180)  $y = 2x - 3$  180) \_\_\_\_\_  
 $8x + 4y = 8$   
 A) Neither B) Perpendicular C) Parallel

181)  $3x = -1$  181) \_\_\_\_\_  
 $9y = -1$   
 A) Perpendicular B) Parallel C) Neither

182)  $x = -2$  182) \_\_\_\_\_  
 $y = -8$   
 A) Parallel B) Perpendicular C) Neither

183)  $\frac{7}{16}x + \frac{y}{2} = 2$  183) \_\_\_\_\_  
 $-\frac{8}{7}x + y = -4$   
 A) Parallel B) Perpendicular C) Neither

Choose the ordered pair which is a solution of the inequality.

184)  $2x + 3y < 5$  184) \_\_\_\_\_  
 $\left(\frac{1}{2}, \frac{1}{2}\right), (3, 2), (1, 1), (2, 2)$   
 A) (2, 2) B)  $\left(\frac{1}{2}, \frac{1}{2}\right)$  C) (1, 1) D) (3, 2)

185)  $2x + 3y \leq 5$  185) \_\_\_\_\_  
 $(1, 2), (3, 2), (0, 2), (1, 1)$   
 A) (3, 2) B) (0, 2) C) (1, 2) D) (1, 1)

186)  $2x - 4y < 6$  186) \_\_\_\_\_  
 $(2, -2), (3, -1), (0, -2), (-1, 1)$   
 A) (2, -2) B) (0, -2) C) (3, -1) D) (-1, 1)

187)  $2x - 4y \leq 6$  187) \_\_\_\_\_  
 (3, -1), (1, -1), (0, -2), (2, -2)  
 A) (2, -2) B) (0, -2) C) (3, -1) D) (1, -1)

188)  $2x + 4y \geq 8$  188) \_\_\_\_\_  
 (0, 0), (3, 2), (1, 1), (1, 0)  
 A) (1, 1) B) (3, 2) C) (0, 0) D) (1, 0)

189)  $2x + 4y \geq 8$  189) \_\_\_\_\_  
 (0, 0), (1, 1), (0, 1), (2, 1)  
 A) (2, 1) B) (0, 1) C) (0, 0) D) (1, 1)

190)  $2x + 4y > 8$  190) \_\_\_\_\_  
 (0, 1), (0, 0), (2, 1), (2, 2)  
 A) (0, 0) B) (2, 1) C) (0, 1) D) (2, 2)

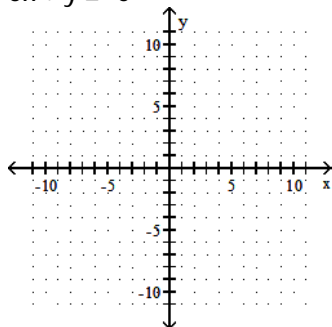
191)  $x + y > 0$  191) \_\_\_\_\_  
 (1, 0), (-1, 1), (0, 0), (1, -1)  
 A) (1, -1) B) (-1, 1) C) (1, 0) D) (0, 0)

192)  $x + y \geq 0$  192) \_\_\_\_\_  
 (0, -1), (1, -1), (-2, 1), (-1, 0)  
 A) (1, -1) B) (-1, 0) C) (0, -1) D) (-2, 1)

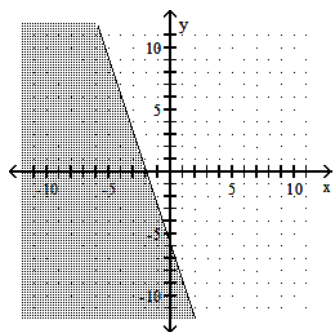
193)  $2x + 3y \leq 0$  193) \_\_\_\_\_  
 (1, -1), (1, 1), (-1, 1),  $\left(\frac{1}{2}, \frac{1}{3}\right)$   
 A) (-1, 1) B) (1, -1) C)  $\left(\frac{1}{2}, \frac{1}{3}\right)$  D) (1, 1)

Graph the linear inequality.

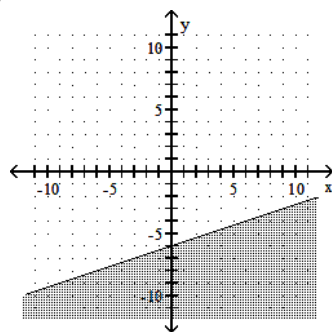
194)  $3x + y \leq -6$  194) \_\_\_\_\_



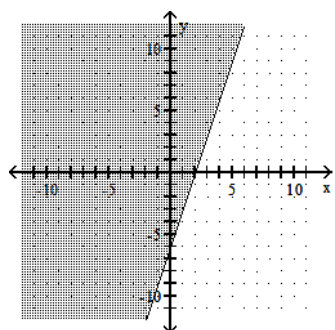
A)



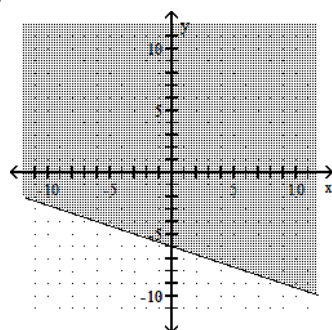
B)



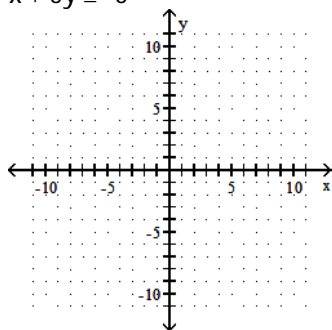
C)



D)

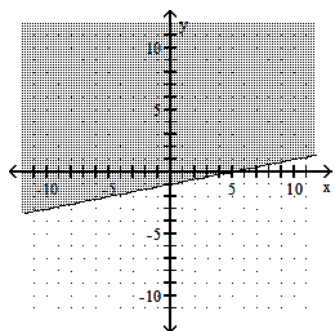


195)  $x + 5y \geq -5$

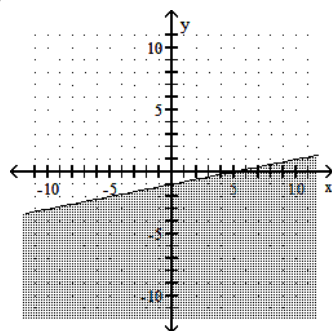


195) \_\_\_\_\_

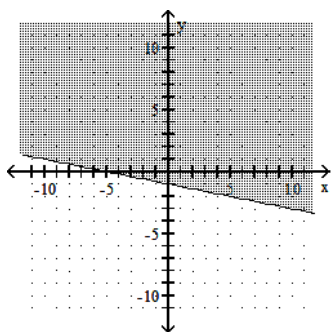
A)



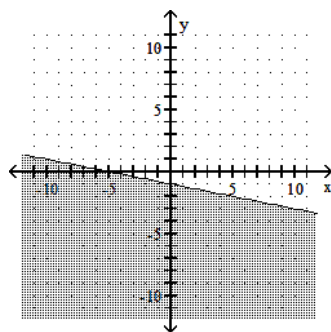
B)



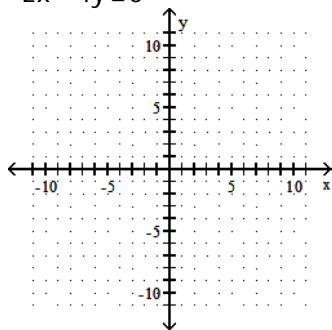
C)



D)

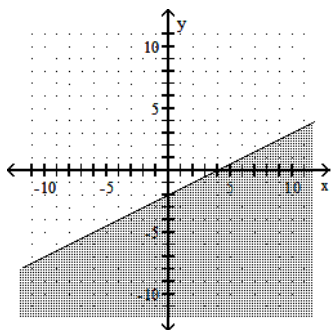


196)  $-2x - 4y \leq 8$

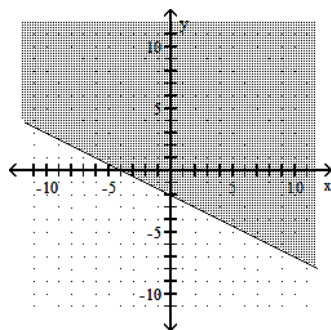


196) \_\_\_\_\_

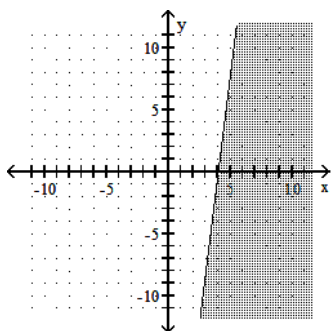
A)



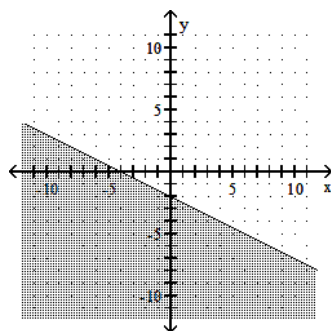
B)



C)



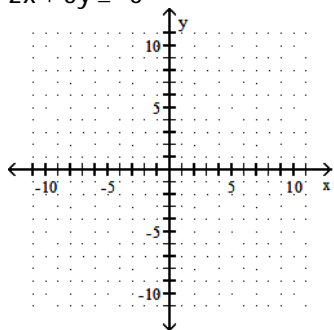
D)



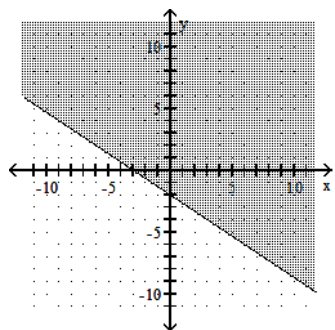


197)  $2x + 3y \geq -6$

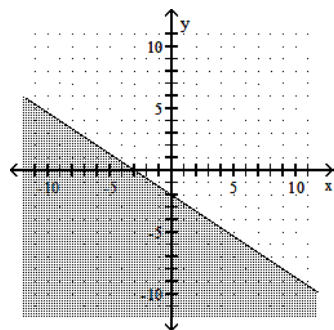
197) \_\_\_\_\_



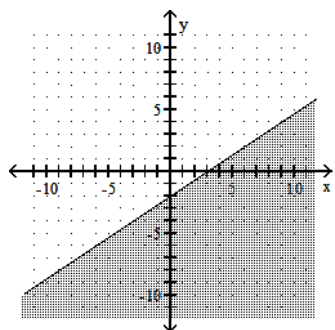
A)



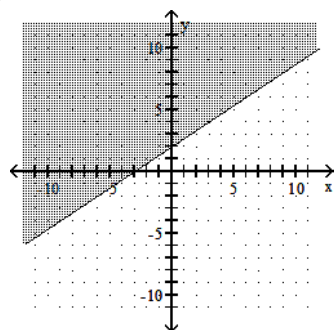
B)



C)

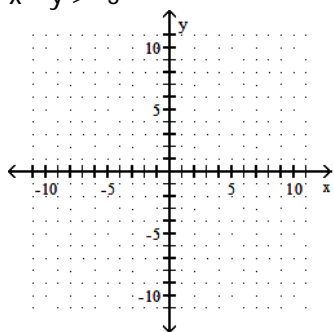


D)

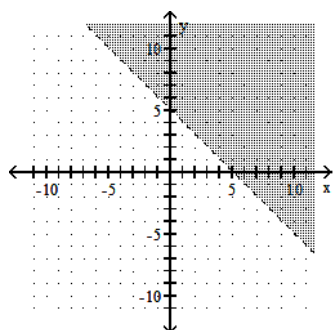


198)  $x - y > -5$

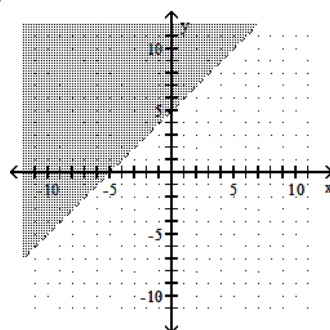
198) \_\_\_\_\_



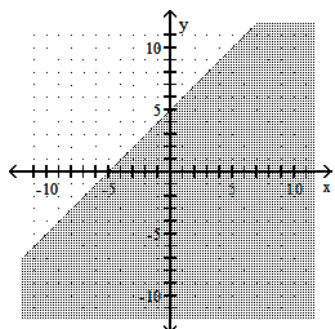
A)



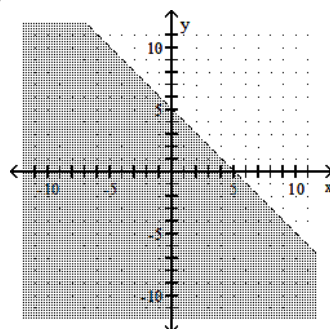
B)



C)

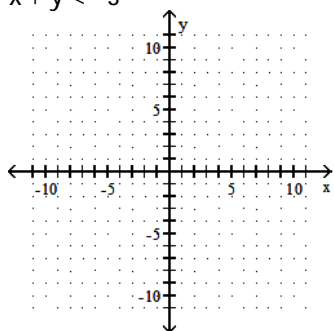


D)

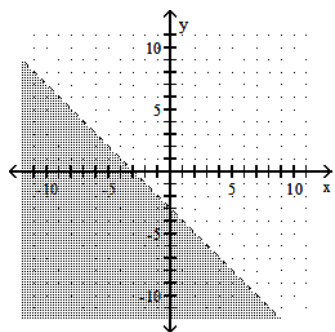


199)  $x + y < -3$

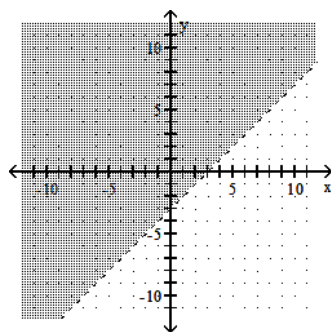
199) \_\_\_\_\_



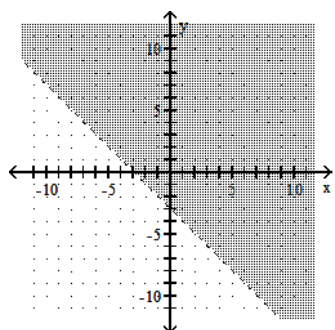
A)



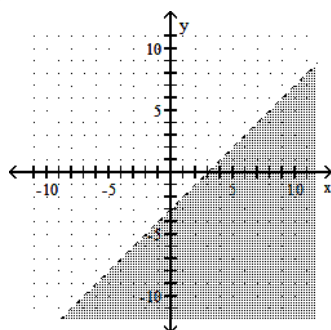
B)



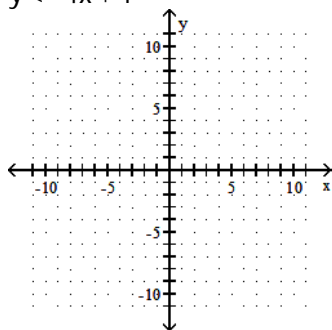
C)



D)

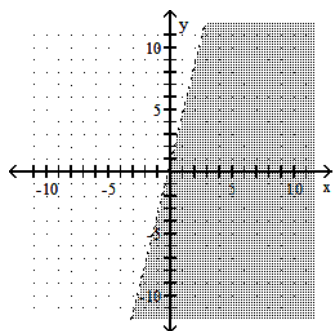


200)  $y < -4x + 1$

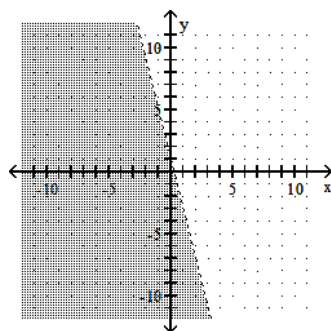


200) \_\_\_\_\_

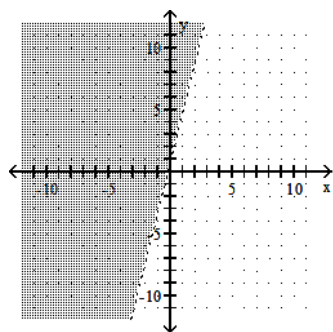
A)



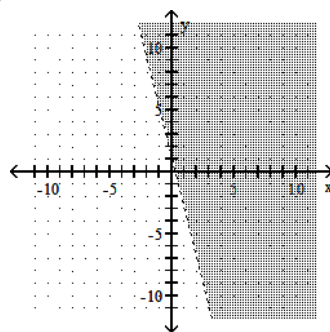
B)



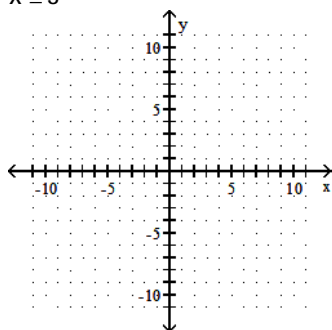
C)



D)

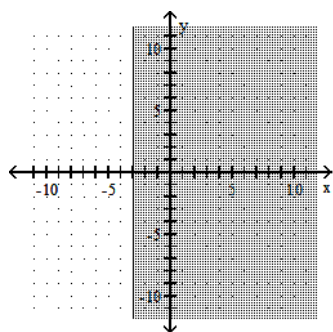


201)  $x \geq 3$

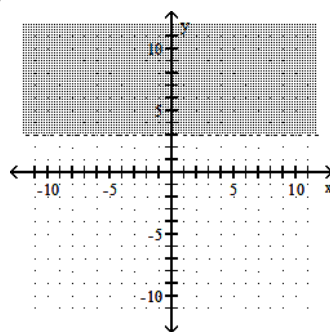


201) \_\_\_\_\_

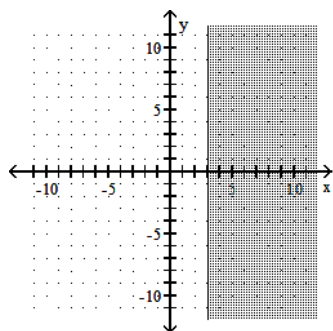
A)



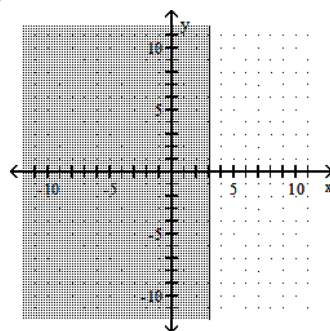
B)



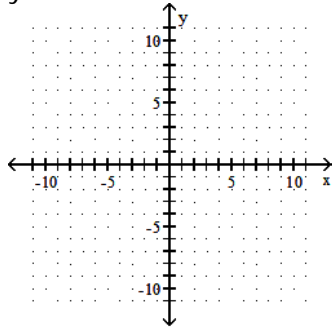
C)



D)

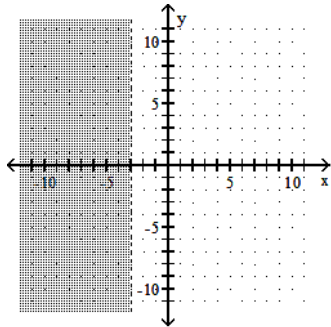


202)  $y < -3$

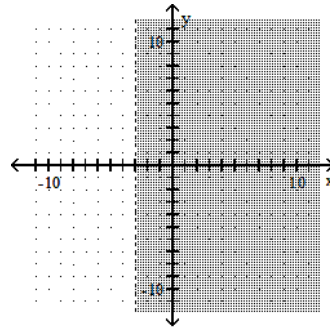


202) \_\_\_\_\_

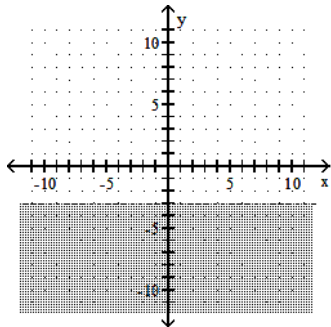
A)



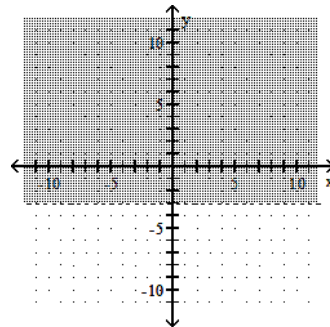
B)



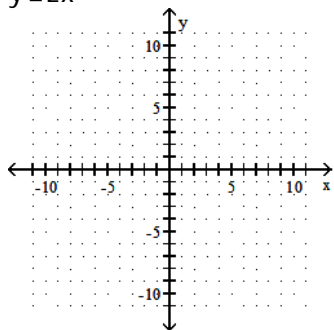
C)



D)

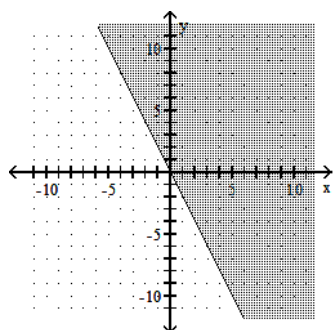


203)  $y \geq 2x$

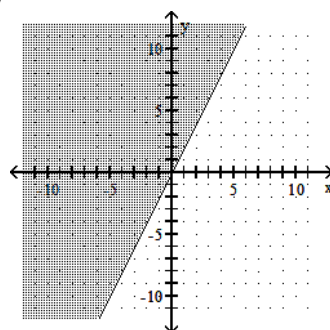


203) \_\_\_\_\_

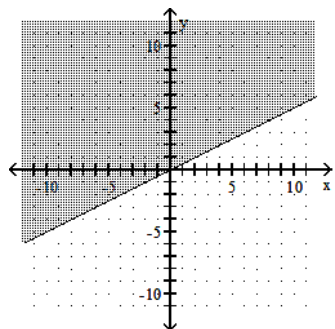
A)



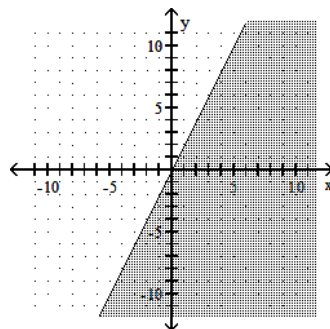
B)



C)

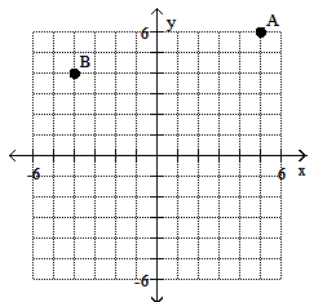


D)

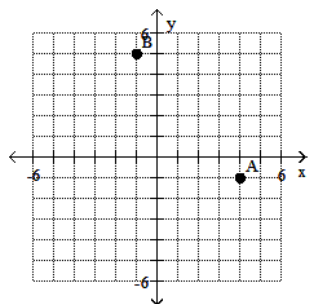


Answer Key  
Testname: UNTITLED1

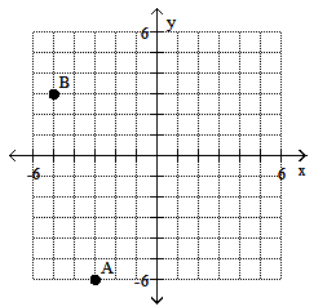
1)



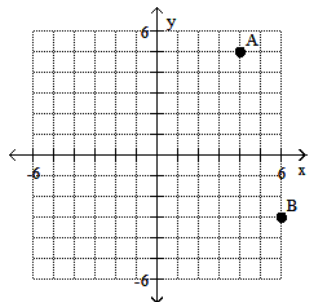
2)



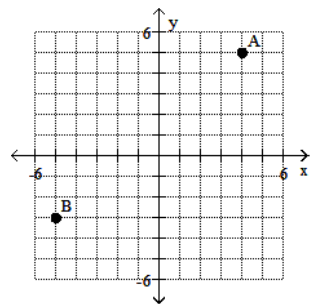
3)



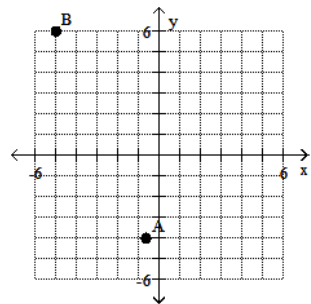
4)



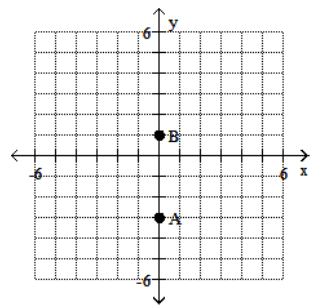
5)



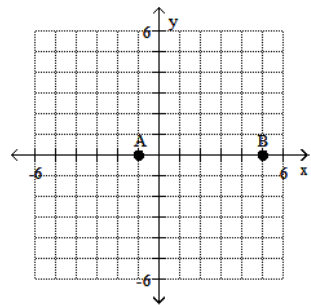
6)



7)



8)



9) C



Answer Key

Testname: UNTITLED1

10) A

11) D

12) C

13) B

14) A

15) A

16) B

17) A

18) D

19) C

20) A

21) C

22) D

23) A

24) D

25) A

26) B

27) A

28) B

29) A

30) A

31) Show that (6, 1) is a solution:

$$y = x - 5$$

$$1 \stackrel{?}{=} 6 - 5$$

$$1 \stackrel{?}{=} 1 \quad \text{TRUE}$$

Show that (1, -4) is a solution:

$$y = x - 5$$

$$-4 \stackrel{?}{=} 1 - 5$$

$$-4 \stackrel{?}{=} -4 \quad \text{TRUE}$$

Coordinates of the additional solution may vary but should satisfy  $y = x - 5$ .

32) Show that (0, 2) is a solution:

$$y = x + 2$$

$$2 \stackrel{?}{=} 0 + 2$$

$$2 \stackrel{?}{=} 2 \quad \text{TRUE}$$

Show that (-1, 1) is a solution:

$$y = x + 2$$

$$1 \stackrel{?}{=} -1 + 2$$

$$1 \stackrel{?}{=} 1 \quad \text{TRUE}$$

Coordinates of the additional solution may vary but should satisfy  $y = x + 2$ .

Answer Key

Testname: UNTITLED1

33) Show that (4, 7) is a solution:

$$y = \frac{1}{2}x + 5$$

$$7 =? \frac{1}{2}(4) + 5$$

$$7 =? 2 + 5$$

$$7 =? 7 \quad \text{TRUE}$$

Show that (-4, 3) is a solution:

$$y = \frac{1}{2}x + 5$$

$$3 =? \frac{1}{2}(-4) + 5$$

$$3 =? -2 + 5$$

$$3 =? 3 \quad \text{TRUE}$$

Coordinates of the additional solution may vary but should satisfy  $y = \frac{1}{2}x + 5$ .

34) Show that (6, 0) is a solution:

$$y = \frac{1}{2}x - 3$$

$$0 =? \frac{1}{2}(6) - 3$$

$$0 =? 3 - 3$$

$$0 =? 0 \quad \text{TRUE}$$

Show that (0, -3) is a solution:

$$y = \frac{1}{2}x - 3$$

$$-3 =? \frac{1}{2}(0) - 3$$

$$-3 =? 0 - 3$$

$$-3 =? -3 \quad \text{TRUE}$$

Coordinates of the additional solution may vary but should satisfy  $y = \frac{1}{2}x - 3$ .

35) Show that (3, 2) is a solution:

$$2x + y = 8$$

$$2(3) + 2 =? 8$$

$$6 + 2 =? 8$$

$$8 =? 8 \quad \text{TRUE}$$

Show that (6, -4) is a solution:

$$2x + y = 8$$

$$2(6) + (-4) =? 8$$

$$12 + (-4) =? 8$$

$$8 =? 8 \quad \text{TRUE}$$

Coordinates of the additional solution may vary but should satisfy  $2x + y = 8$ .

Answer Key

Testname: UNTITLED1

36) Show that (2, 3) is a solution:

$$x + 2y = 8$$

$$2 + 2(3) =? 8$$

$$2 + 6 =? 8$$

$$8 =? 8 \quad \text{TRUE}$$

Show that (-6, 7) is a solution:

$$x + 2y = 8$$

$$-6 + 2(7) =? 8$$

$$-6 + 14 =? 8$$

$$8 =? 8 \quad \text{TRUE}$$

Coordinates of the additional solution may vary but should satisfy  $x + 2y = 8$ .

37) Show that (1, 0) is a solution:

$$6x - 2y = 6$$

$$6(1) - 2(0) =? 6$$

$$6 - (0) =? 6$$

$$6 =? 6 \quad \text{TRUE}$$

Show that (3, 6) is a solution:

$$6x - 2y = 6$$

$$6(3) - 2(6) =? 6$$

$$18 - 12 =? 6$$

$$6 =? 6 \quad \text{TRUE}$$

Coordinates of the additional solution may vary but should satisfy  $6x - 2y = 6$ .

38) Show that (-1, -4) is a solution:

$$3x - 3y = 9$$

$$3(-1) - 3(-4) =? 9$$

$$-3 - (-12) =? 9$$

$$9 =? 9 \quad \text{TRUE}$$

Show that (3, 0) is a solution:

$$3x - 3y = 9$$

$$3(3) - 3(0) =? 9$$

$$9 - (0) =? 9$$

$$9 =? 9 \quad \text{TRUE}$$

Coordinates of the additional solution may vary but should satisfy  $3x - 3y = 9$ .

39) D

40) C

41) D

42) C

43) B

44) D

45) C

46) C

47) A

48) C

49) C

50) D

51) D

52) B

Answer Key

Testname: UNTITLED1

- 53) B
- 54) A
- 55) B
- 56) C
- 57) B
- 58) D
- 59) A
- 60) C
- 61) C
- 62) D
- 63) C
- 64) B
- 65) D
- 66) B
- 67) C
- 68) D
- 69) C
- 70) D
- 71) D
- 72) D
- 73) A
- 74) B
- 75) B
- 76) A
- 77) B
- 78) A
- 79) D
- 80) C
- 81) C
- 82) B
- 83) A
- 84) D
- 85) B
- 86) A
- 87) B
- 88) B
- 89) B
- 90) A
- 91) B
- 92) A
- 93) B
- 94) B

Answer Key

Testname: UNTITLED1

- 95) C
- 96) A
- 97) A
- 98) B
- 99) D
- 100) D
- 101) A
- 102) B
- 103) D
- 104) B
- 105) D
- 106) D
- 107) D
- 108) C
- 109) D
- 110) C
- 111) C
- 112) D
- 113) D
- 114) C
- 115) A
- 116) A
- 117) B
- 118) D
- 119) A
- 120) A
- 121) Let  $y = 0$  and solve for  $x$ .
- 122) The graph is a vertical line.
- 123) The line is vertical.
- 124) Yes. If the line passes through the origin, then both the  $x$ -intercept and the  $y$ -intercept are at  $(0, 0)$ .
- 125)  $(0, b)$
- 126) The  $x$ -intercept is the point where the line crosses the  $x$ -axis. Lines parallel to the  $x$ -axis do not intercept the  $x$ -axis.  
Thus the graph of any equation of the form  $y = b$  where  $b \neq 0$  has no  $x$ -intercept.
- 127) B
- 128) B
- 129) B
- 130) C
- 131) B
- 132) C
- 133) A
- 134) B
- 135) B
- 136) B

Answer Key

Testname: UNTITLED1

- 137) D
- 138) C
- 139) C
- 140) D
- 141) B
- 142) A
- 143) C
- 144) D
- 145) C
- 146) D
- 147) D
- 148) A
- 149) B
- 150) A
- 151) C
- 152) A
- 153) B
- 154) A
- 155) C
- 156) B
- 157) D
- 158) B
- 159) C
- 160) C
- 161) B
- 162) D
- 163) A
- 164) D
- 165) C
- 166) A
- 167) D
- 168) D
- 169) D
- 170) D
- 171) A
- 172) D
- 173) C
- 174) A
- 175) B
- 176) A
- 177) A
- 178) A

Answer Key

Testname: UNTITLED1

- 179) B
- 180) A
- 181) A
- 182) B
- 183) B
- 184) B
- 185) D
- 186) D
- 187) D
- 188) B
- 189) A
- 190) D
- 191) C
- 192) A
- 193) B
- 194) A
- 195) C
- 196) B
- 197) A
- 198) C
- 199) A
- 200) B
- 201) C
- 202) C
- 203) B