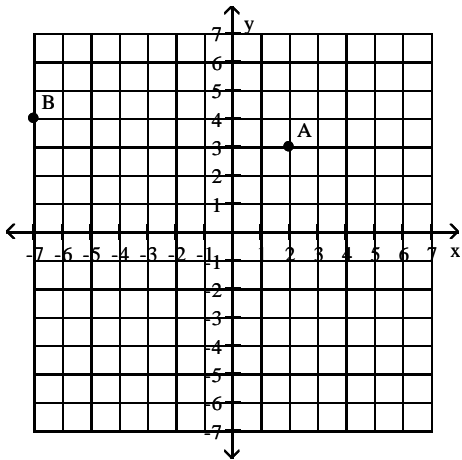


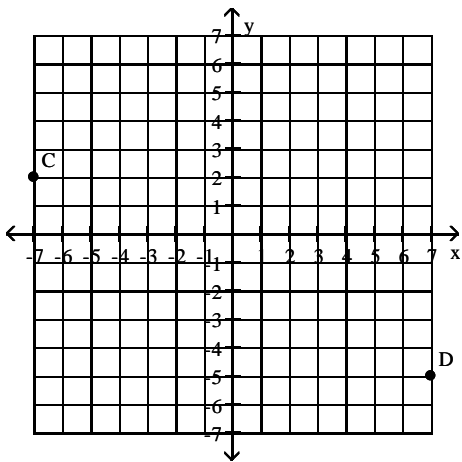
Name \_\_\_\_\_

Give the ordered pairs that correspond to the points labeled in the figure.

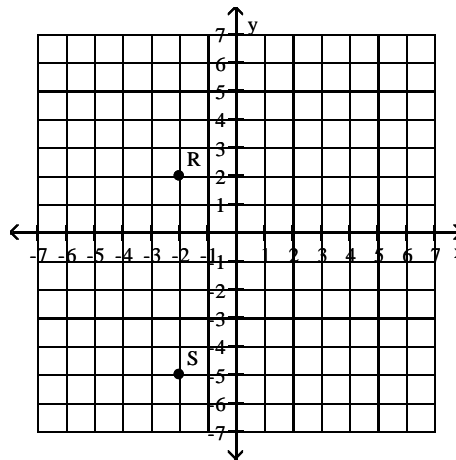
1)



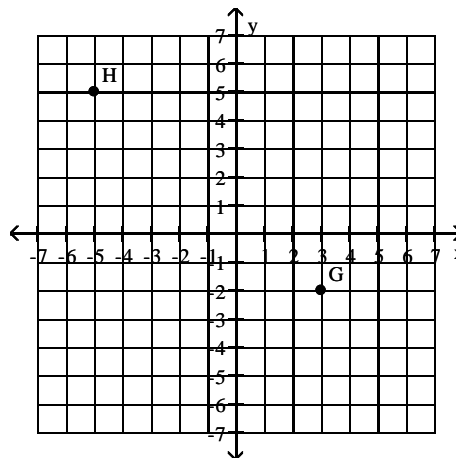
2)



3)



4)



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

5)  $(-3, 3)$   
 $y = x + 6$

6)  $(4, 3)$   
 $y = x - 1$

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

8)  $(3, -1)$   
 $y = x - 2$

9)  $(-4, 4)$   
 $x - y = -8$

10)  $(-2, 1)$   
 $x - y = -3$

11)  $(6, 4)$   
 $x - y = -10$

12)  $(3, 5)$   
 $x - y = -8$

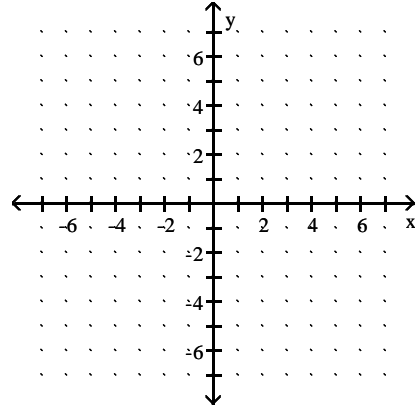
13)  $(-5, 3)$   
 $2x + 4y = 2$

14)  $(3, -3)$   
 $4x + 2y = 6$

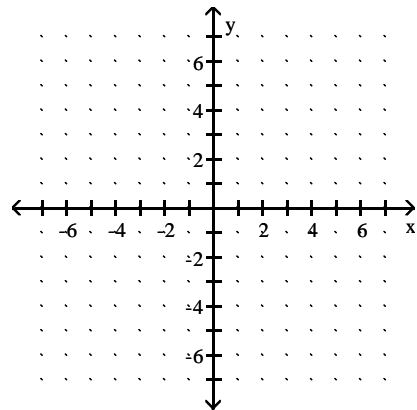
15)  $(5, 4)$   
 $3x + 2y = 7$

Graph the linear equation in two variables.

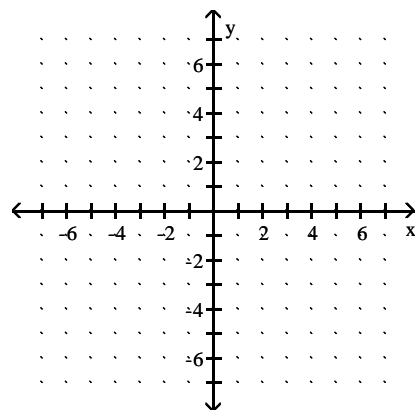
16)  $y = 5x$



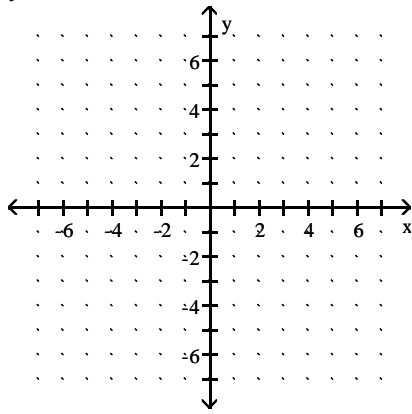
17)  $y = -5x$



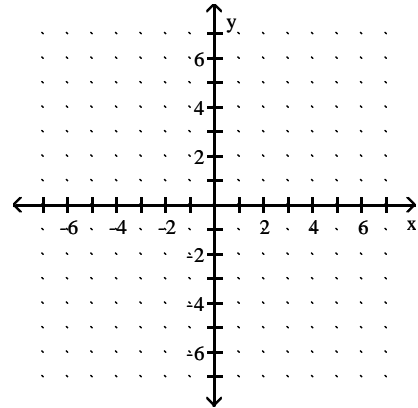
18)  $y = x - 3$



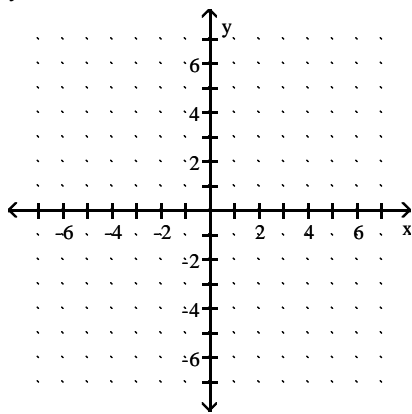
19)  $y = -x + 1$



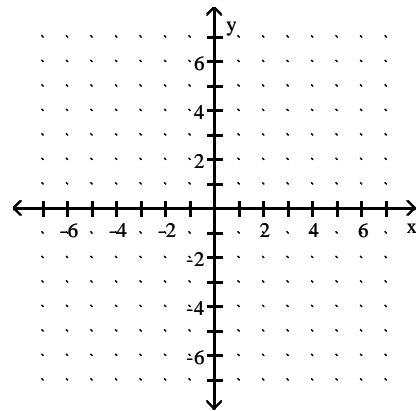
22)  $y = \frac{1}{2}x + 1$



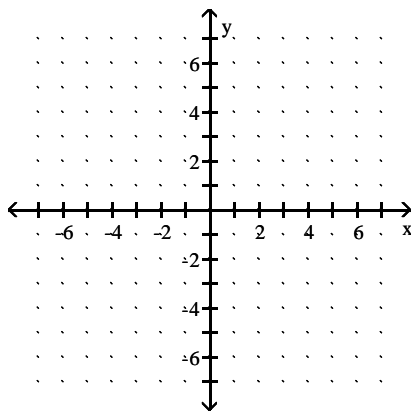
20)  $y = 3x - 1$



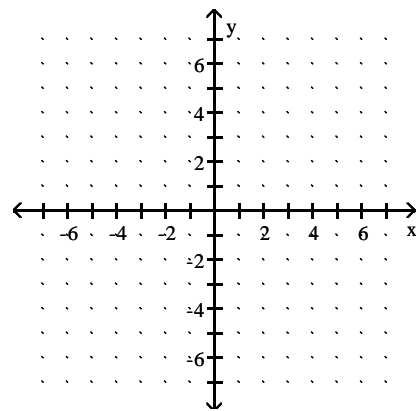
23)  $y = \frac{1}{5}x - 2$



21)  $y = -2x - 2$



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



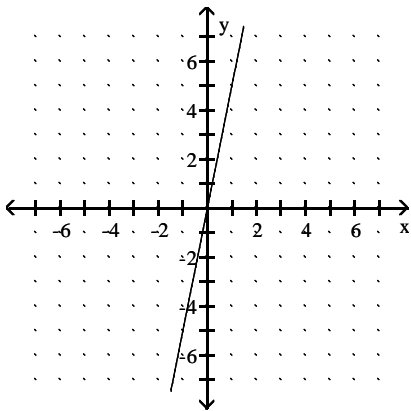
**Solve the problem.**

- 25) A customer at a store bought 3 bottles of juice and 6 fruit pies for a total cost of \$78.75. If  $x$  represents the cost of a bottle of juice and  $y$  represents the cost of one fruit pie, write an equation in two variables that reflects the given conditions.
- 26) A customer at a store bought 4 bottles of juice and 7 fruit pies for a total cost of \$65.50. If  $x$  represents the cost of a bottle of juice and  $y$  represents the cost of one fruit pie, write an equation in two variables that reflects the given conditions.
- 27) A customer at a store bought 6 bottles of juice and 5 fruit pies for a total cost of \$76.00. If a bottle of juice costs \$4.75, find the cost of a fruit pie.
- 28) A customer at a store bought 3 bottles of juice and 5 fruit pies for a total cost of \$59.25. If a bottle of juice costs \$4.75, find the cost of a fruit pie.
- 29) A customer at a store bought 3 bottles of juice and 8 fruit pies for a total cost of \$70.75. If a bottle of juice costs \$2.25, find the cost of a fruit pie.
- 30) The linear equation in two variables  $y = 0.10x + 225$  models the total weekly cost,  $y$ , in dollars, for renting a car and driving it  $x$  miles. The equation indicates that the rental company charges a fixed amount of \$225 for the week plus a cost of \$0.10 for each mile the car is driven. Find a solution of  $y = 0.10x + 225$  using 285 for  $x$ .
- 31) The linear equation in two variables  $y = 0.25x + 175$  models the total weekly cost,  $y$ , in dollars, for renting a car and driving it  $x$  miles. The equation indicates that the rental company charges a fixed amount of \$175 for the week plus a cost of \$0.25 for each mile the car is driven. Find a solution of  $y = 0.25x + 175$  using 400 for  $x$ .
- 32) The linear equation in two variables  $y = 2x + 50$  models the total cost,  $y$ , in dollars, for towing a car  $x$  miles. The equation indicates that the towing company charges a fixed amount of \$50 to send a truck to pick up the car plus a cost of \$2 for each mile the car is towed. Find a solution of  $y = 2x + 50$  using 3 for  $x$ .
- 33) The linear equation in two variables  $y = 3x + 65$  models the total cost,  $y$ , in dollars, for towing a car  $x$  miles. The equation indicates that the towing company charges a fixed amount of \$65 to send a truck to pick up the car plus a cost of \$3 for each mile the car is towed. Find a solution of  $y = 3x + 65$  using 8 for  $x$ .
- 34) The linear equation in two variables  $y = 3x + 70$  models the total cost,  $y$ , in dollars, for towing a car  $x$  miles. The equation indicates that the towing company charges a fixed amount of \$70 to send a truck to pick up the car plus a cost of \$3 for each mile the car is towed. Find a solution of  $y = 3x + 70$  using 15 for  $x$ .
- 35) A customer at a store bought 8 bottles of juice and 3 fruit pies for a total cost of \$42.00. If  $x$  represents the cost of a bottle of juice and  $y$  represents the cost of one fruit pie, write an equation in two variables that reflects the given conditions.

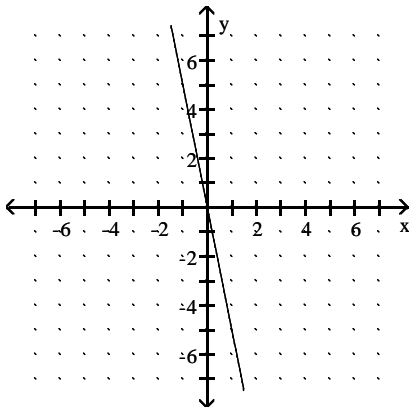
# Answer Key

Testname: Q05PREP\_3.1, &3.2V02

- 1)  $A = (2, 3), B = (-7, 4)$
- 2)  $C = (-7, 2), D = (7, -5)$
- 3)  $R = (-2, 2), S = (-2, -5)$
- 4)  $G = (3, -2), H = (-5, 5)$
- 5) Yes
- 6) Yes
- 7) No
- 8) No
- 9) Yes
- 10) Yes
- 11) No
- 12) No
- 13) Yes
- 14) Yes
- 15) No
- 16)



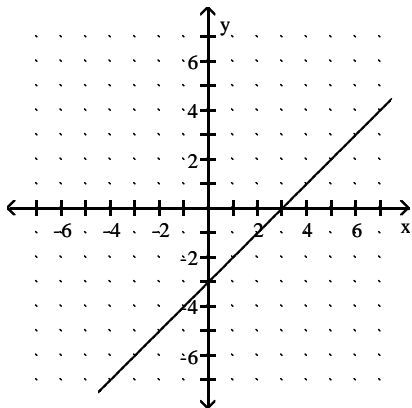
17)



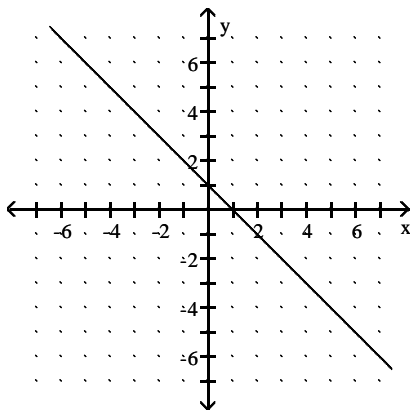
Answer Key

Testname: Q05PREP\_3.1, &3.2V02

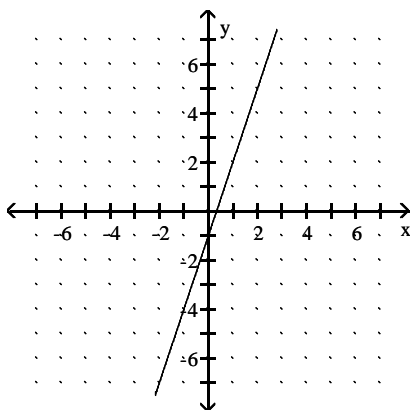
18)



19)



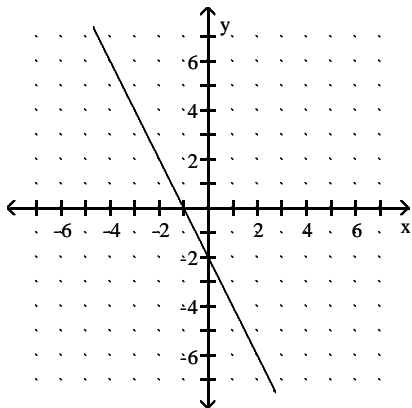
20)



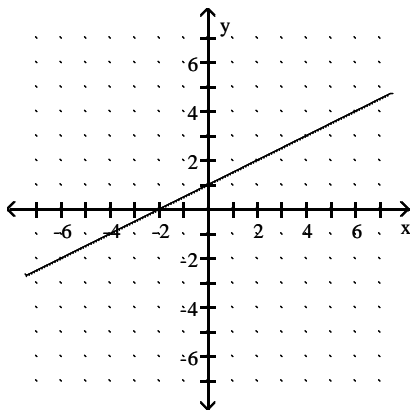
Answer Key

Testname: Q05PREP\_3.1, &3.2V02

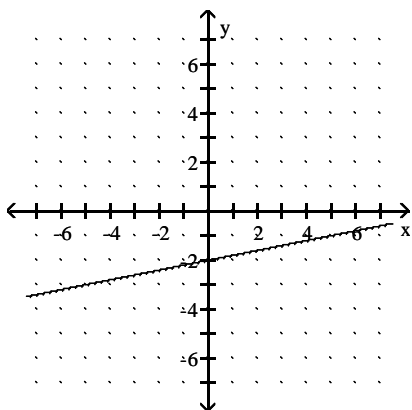
21)



22)



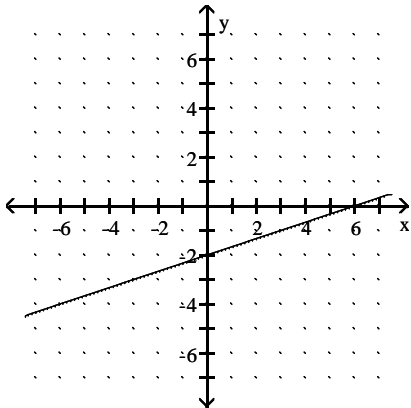
23)



Answer Key

Testname: Q05PREP\_3.1, &3.2V02

24)



25)  $3x + 6y = 78.75$

26)  $4x + 7y = 65.50$

27) \$9.50

28) \$9.00

29) \$8.00

30) (285, 253.5)

31) (400, 275)

32) (3, 56)

33) (8, 89)

34) (15, 115)

35)  $8x + 3y = 42.00$