

Alg. I BE | TUESDAY 10-6-09

① Use the "yTg" method and

graph: $\frac{1}{2}x + \frac{1}{3}y = 3$

NOTE: THIS problem is great sign rule,
fraction rule, solve for y, and
graphing practice! (all skills needed
for Exam 2)

TIP: use A full size sheet of
graph paper - it makes the work
easier and much, much neater.

• Homework review - Pg. 229/230 # 17-24
29-34

• Function Practice

GRAPH: $\frac{1}{2}x + \frac{1}{3}y = 3$

$-\frac{1}{2}x$

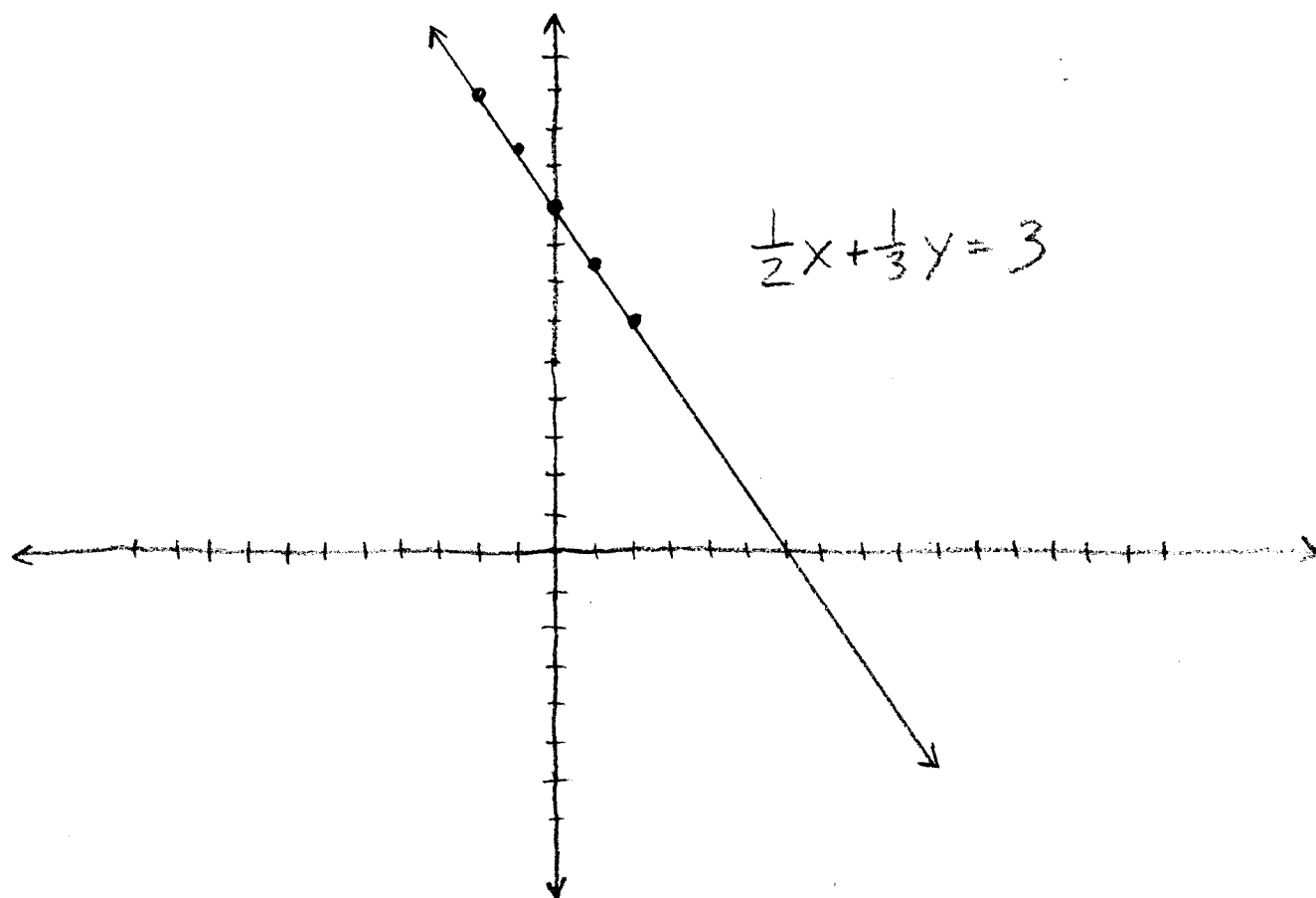
$-\frac{1}{2}x$

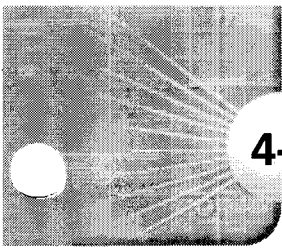
$3\left(\frac{1}{3}y\right) = \left(-\frac{1}{2}x + 3\right)3$

$y = -\frac{3}{2}x + 9$

Bell
Exercise
Solution

X	Y = $-\frac{3}{2}x + 9$
-2	$-\frac{3}{2}\left(-\frac{2}{1}\right) + 9 = 3 + 9 = 12$
-1	$-\frac{3}{2}(-1) + \frac{18}{2} = \frac{21}{2} = 10\frac{1}{2}$
0	$-\frac{3}{2}(0) + 9 = 9$
1	$-\frac{3}{2}(1) + \frac{18}{2} = \frac{15}{2} = 7\frac{1}{2}$
2	$-\frac{3}{2}(2) + 9 = 6$

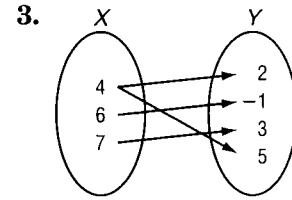
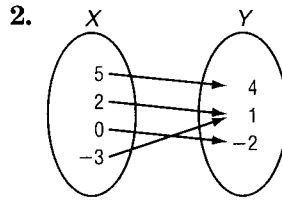
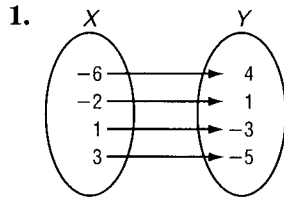




4-6 Skills Practice

Functions

Determine whether each relation is a function.



4.

x	y
4	-5
-1	-10
0	-9
1	-7
9	1

5.

x	y
2	7
5	-3
3	5
-4	-2
5	2

6.

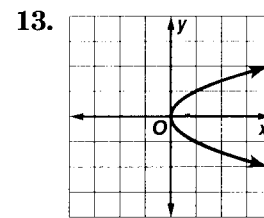
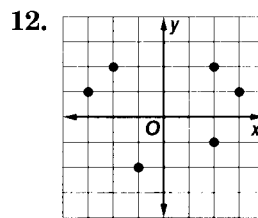
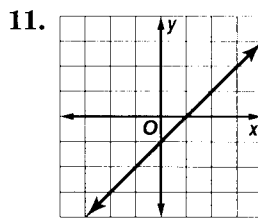
x	y
3	7
-1	1
1	0
3	5
7	3

7. $\{(2, 5), (4, -2), (3, 3), (5, 4), (-2, 5)\}$

8. $\{(6, -1), (-4, 2), (5, 2), (4, 6), (6, 5)\}$

9. $y = 2x - 5$

10. $y = 11$



If $f(x) = 3x + 2$ and $g(x) = x^2 - x$, find each value.

14. $f(4)$

15. $f(8)$

16. $f(-2)$

17. $g(2)$

18. $g(-3)$

19. $g(-6)$

20. $f(2) + 1$

21. $f(1) - 1$

22. $g(2) - 2$

23. $g(-1) + 4$

24. $f(x + 1)$

25. $g(3b)$

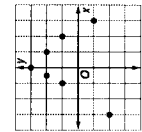
NAME _____ DATE _____ PERIOD _____

4-6 Practice (Average) Functions

Determine whether each relation is a function.

1. **yes**

x	y
1	-5
-4	3
7	6
1	-2



2. **no**

x	y
1	-5
-4	3
7	6
1	-2

3. **yes**

x	y
1	-5
-4	3
7	6
1	-2

4. $\{(1, 4), (2, -2), (3, -6), (-6, 3), (-3, 6)\}$ **yes**

x	y
1	-5
-4	3
7	6
1	-2

5. $\{(6, -4), (2, -4), (-4, 2), (4, 6), (2, 6)\}$ **no**

x	y
1	-5
-4	3
7	6
1	-2

6. $x = -2$ **no**

x	y
1	-5
-4	3
7	6
1	-2

7. $y = 2$ **yes**

x	y
1	-5
-4	3
7	6
1	-2

8. $f(x) = 2x - 6$ and $g(x) = x - 2x^2$, find each value.

x	y
1	-5
-4	3
7	6
1	-2

9. $f(2) = -2$

x	y
1	-5
-4	3
7	6
1	-2

10. $g(-1) = -3$

x	y
1	-5
-4	3
7	6
1	-2

11. $g\left(\frac{1}{3}\right) = \frac{5}{9}$

x	y
1	-5
-4	3
7	6
1	-2

12. $f(7) = 9$

x	y
1	-5
-4	3
7	6
1	-2

13. $g(-3) = 13$

x	y
1	-5
-4	3
7	6
1	-2

14. $f(h + 9) = 2h + 12$

x	y
1	-5
-4	3
7	6
1	-2

15. $g(3y) = 3y - 18y^2$

x	y
1	-5
-4	3
7	6
1	-2

16. $2(g(b) + 1) = 2b - 4b^2 + 2$

x	y
1	-5
-4	3
7	6
1	-2

17. Write the equation in functional notation. $f(h) = 7.5h$

x	y
1	-5
-4	3
7	6
1	-2

18. Find $f(15)$, $f(20)$, and $f(25)$. **112.50, 150, 187.50**

x	y
1	-5
-4	3
7	6
1	-2

19. Is the relationship a function? Explain. **Yes; for each value in the domain, there is only one value in the range.**

x	y
1	-5
-4	3
7	6
1	-2

20. If the relation can be represented by the equation $IR = 12$, rewrite the equation in functional notation so that the resistance R is a function of the current I . $f(I) = \frac{12}{I}$

x	y
1	-5
-4	3
7	6
1	-2

21. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

22. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

23. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

24. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

25. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

26. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

27. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

28. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

29. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

30. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

31. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

32. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

33. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

34. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

35. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

36. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

37. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

38. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

39. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

40. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

41. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

42. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

43. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

44. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

45. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

46. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

47. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

48. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

49. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

50. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

51. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

52. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

53. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

54. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

55. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

56. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

57. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

58. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

59. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

60. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

61. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

62. What is the resistance in a circuit when the current is 0.5 ampere? **24 ohms**

x	y
1	-5
-4	3
7	6
1	-2

63. What is