Solving Linear Equations

Practice Problems

When solving a linear equation, there is one variable present (in this case, it is x). You are working to get the variable on one side of the equal sign and the numbers on the other side. For example, if you have x + 6 = 19, you will subtract 6 from both sides of the equation, which will give you an answer of x = 13.

Problems

1. 6x + 15 = -2
2. 8x + 13 = 2
3. 12x + 14 = 6
4. -9x +6 = 21
5. -6x + 16 = 14
6. -5x +20 = 16
7. 10x + 17 = 8
8. x + 6 = 10
9. -7x – 9 = -4
10. 4x + 19 = 13
11. -6x + 11 = 12
12. 5x – 8 = 0
13. 8x – 4 = 7
14. 12x + 20 = 19
15. 6x + 13 = 5
16. -8x + 5 = 18
17. -3x + 3 = -6
18. 2x + 7 = -3
19. x – 4 = 0
20. 4x + 5 = 24
21. -5x + 22 = 23
22. 9x – 7 = 23
23. –x + 14 = -4
24. -5x – 12 = 14
25. 8x + 13 = 21
26. 5x – 10 = 9
27. 10x + 16 = -7
28. 11x – 8 = 8
29. -8x + 13 = 0
30. 15x – 1 = 3

Answer Key

1. x = -17/6
2. x = -11/8
3. x = -8/12 or -2/3
4. x = -15/9
5. x = 2/6 or 1/3
6. x = 4/5
7. x = -9/10
8. x = 4
9. x = -5/7
10. x = -6/4 or -3/2
11. x = -1/6
12. x = 8/5
13. x = 11/8
14. x = -1/12
15. x = -8/6 or -4/3
16. x = -13/8
17. x = 3
18. x = -5
19. x = 4
20. x = 19/4
21. x = -1/5
22. x = 30/9
23. x = 18
24. x = -26/5
25. x = 1
26. x = 19/5
27. x = -23/10
28. x = 16/11
29. x = 13/8
30. x = 4/15