

Section 3.2 – Operations with Addition and Subtraction

Problem Set 2

Simplifying the following expressions.

1. $-1 + a = 5$

2. $-2y + 5 = -y - 6$

3. $4 + a = 4$

4. $x + 4 = 6$

5. $y - 3 = 12$

6. $x - 5 = 3$

7. $8.1 + 3x = 2x - 4.8$

8. $3m + m = 3m - 4$

9. $2.1x = 3.1x - 5$

10. $5b = 4b + 3$

11. $3s + 5 = 2s$

12. $8y - 3 = 6y - 1$

13. $3y - \frac{2}{3} = 2y - \frac{2}{3}$

14. $-\frac{3}{2}z - \frac{2}{3} = -\frac{1}{2}z + \frac{5}{4}$

15. $2x + \frac{1}{2} = x + 4$

16. $5x - 4 = 6x - 2$

17. $5x + 5 = 4x - 5$

18. $4e - 8 = 1 + 3e + 5$

19. $4c + 2x = 5c - 3$

20. $2x + 1.2 = 3.1 + 3x$

21. $6b + b = -12 + 6b$

Write an algebraic equation for the following statements.

26. five more than three times a number is eighteen

27. three less than five times a number equals the number plus one

28. seven more than twice a number is three less than the number

29. eight times the quotient of a number and seven is one more than the number