Algebra I
Notes 3.5 continued Solving One-Step Equations

Objectives: Use the Addition and Subtraction Properties of Equality to solve one-step equations algebraically.

Use the Subtraction Property of Equality (subtract the same quantity from both sides) or the Addition Property of Equality (add the same quantity to both sides) to solve for the unknown variable. Show your work. Check your solutions.

1. $x - 5 = 11$ **2.** $x - 7 = 5$ **3.** $x - 8 = 2$ **4.** $y - 3 = 17$

5. $y + 7 = 11$ **6.** $n + 6 = 14$ **7.** $n + 4 = 16$ **8.** $y + 6 = 21$

9. $b - 9 = 15$ **10.** $a - 12 = 12$ **11.** $5 + x = 20$ **12.** $28 + y = 42$

3.5 Classwork

Use the Subtraction Property of Equality (subtract the same quantity from both sides) or the Addition Property of Equality (add the same quantity to both sides) to solve for the unknown variable. Show your work. Check your solutions.

1. $x + 5 = 15$

2. $x + 8 = 20$

3. $x + 2 = 10$

4. $a + 7 = 25$

5. $x - 3 = 9$

6. $y - 4 = 7$

7. $a - 7 = 6$

8. $y - 6 = 2$

9. $x + 20 = 34$

10. $8 + y = 15$

11. $x - 9 = 10$

12. $x - 3 = 12$

13. $y - 2 = 13$

14. $x - 5 = 2$

15. $60 = b + 48$

16. $88 = x + 7$