

[10-12-13-NEM2]

Exercise 6.3



answers on p. 433

Solve these equations using the elimination method or the substitution method.

1. $3x + y = 11$
 $2x - y = 4$

3. $5x - y = 6$
 $2x + y = 8$

5. $2x + 5y = 13$
 $5x + 2y = 22$

7. $\frac{2}{5}x + \frac{1}{3}y = 1$
 $\frac{3}{5}x - \frac{1}{9}y = 7$

2. $x + 3y = 13$
 $x + 2y = 10$

4. $3x - 4y = 7$
 $2x + y = 12$

6. $3x - 2y = 1$
 $2x + 3y = 18$

8. $\frac{1}{4}x + \frac{2}{3}y = 5$
 $\frac{3}{4}x + y = 6$

9. $\frac{2}{3}x + \frac{3}{4}y = 7$
 $\frac{5}{6}x - \frac{1}{2}y = 3$

11. $2(x + 1) + 3(y - 1) = 12$
 $(3x - 1) - (y - 2) = 4$

13. $(x - 3) - 2(y + 4) = -8$
 $2(3 + 2x) - 5(4 - 3y) = 21$

15. $0.2x + 0.7y = 1$
 $0.4x - 1.5y = -0.9$

17. $0.7x - 1.2y = -11.5$
 $0.5x + 3.5y = 31$

19. $2p - 5q = 6p + 3q = 9$

10. $\frac{7}{8}x + \frac{3}{5}y = 5$
 $\frac{3}{5}x - \frac{4}{25}y = 2$

12. $2(y + 2) - 3(x - 1) = 1$
 $3(2 + y) + 4(3 - x) = 11$

14. $70(x - 1) + 90(y + 3) = 95$
 $6(2x + 1) - 8(3y - 2) = 4$

16. $1.2x + y = 3.8$
 $0.5x + 0.8y = 3.5$

18. $1.5x - 0.8y = 0.3$
 $0.6x - 3.6y = -4.8$

20. $3c - d = 12c + 5d = 9$

Exercise 6.3 (p. 148)

1. $x = 3, y = 2$
2. $x = 4, y = 3$
3. $x = 2, y = 4$
4. $x = 5, y = 2$
5. $x = 4, y = 1$
6. $x = 3, y = 4$
7. $x = 10, y = -9$
8. $x = -4, y = 9$
9. $x = 6, y = 4$
10. $x = 4, y = 2\frac{1}{2}$
11. $x = 2, y = 3$
12. $x = 4, y = 3$
13. $x = 5, y = 1$
14. $x = -1\frac{1}{2}, y = 0$
15. $x = 1.5, y = 1$
16. $x = -1, y = 5$
17. $x = -1, y = 9$
18. $x = 1, y = 1.5$
19. $p = 2, q = -1$
20. $c = 2, d = -3$