



Answer Key: page 2

Solving Quadratic Equations

1. $x^2 = 10$

2. $y^2 = 13$

3. $3x^2 - 27 = 0$

4. $x^2 - 24 = 0$

5. $9p^2 - 36 = 0$

6. $t^2 - 15 = 75$

7. $3w^2 - 80 = 10$

8. $9 - \frac{3x^2}{2} = 0$

9. $(y - 7)^2 = 1$

10. $(y - 3)^2 = 7$

11. $(r - 1)^2 = 13$

12. $(g + 4)^2 - 5 = 47$

13. $-9(y - 1)^2 + 18 = 10$

14. $2x - x^2 = 0$

15. $9t = t^2$

16. $4x^2 = 19x$

17. $y^2 - 5y + 6 = 0$

18. $x^2 + x - 20 = 0$

19. $g^2 - 5g - 24 = 0$

20. $2w^2 - 24w + 64 = 0$

21. $c^2 - 4c - 1 = 0$
22. $r^2 - 2r = 44$
23. $7h^2 - 1 = -3h^2 - 11h + 5$
24. $(w + 1)^2 = w + 3w^2$

Answer Key:

1. $x^2 = 10$ $x = \pm\sqrt{10}$
2. $y^2 = 13$ $y = \pm\sqrt{13}$
3. $3x^2 - 27 = 0$ $x = \pm 3$
4. $x^2 - 24 = 0$ $x = \pm 2\sqrt{6}$
5. $9p^2 - 36 = 0$ $p = \pm 2$
6. $t^2 - 15 = 75$ $t = \pm 3\sqrt{10}$
7. $3w^2 - 80 = 10$ $w = \pm\sqrt{30}$
8. $9 - \frac{3x^2}{2} = 0$ $x = \pm\sqrt{6}$
9. $(y - 7)^2 = 1$ $y = 6, 8$
10. $(y - 3)^2 = 7$ $y = 3 \pm \sqrt{7}$
11. $(r - 1)^2 = 13$ $x = 1 \pm \sqrt{13}$
12. $(g + 4)^2 - 5 = 47$ $g = -4 \pm 2\sqrt{13}$
13. $-9(y - 1)^2 + 18 = 10$ $y = 1 \pm \frac{2\sqrt{2}}{3}$
14. $2x - x^2 = 0$ $x = 0, 2$
15. $9t = t^2$ $t = 0, 9$
16. $4x^2 = 19x$ $x = 0, \frac{19}{4}$

17. $y^2 - 5y + 6 = 0$ $y = 2, 3$

18. $x^2 + x - 20 = 0$ $x = -5, 4$

19. $g^2 - 5g - 24 = 0$ $g = -3, 8$

20. $2w^2 - 24w + 64 = 0$ $w = 4, 8$

21. $c^2 - 4c - 1 = 0$ $c = 2 \pm \sqrt{5}$

22. $r^2 - 2r = 44$ $r = 1 \pm 3\sqrt{5}$

23. $7h^2 - 1 = -3h^2 - 11h + 5$ $h = -\frac{3}{2}, \frac{2}{5}$

24. $(w + 1)^2 = w + 3w^2$ $w = -\frac{1}{2}, 1$