

1.2 Solve by Taking Square Roots

Date _____

Solve each equation by taking square roots.

1) $n^2 = 49$

2) $x^2 = 64$

3) $p^2 = 52$

4) $m^2 = 3$

5) $n^2 + 10 = 35$

6) $-6b^2 = -378$

7) $x^2 + 1 = 96$

8) $25n^2 = 1$

9) $16a^2 + 8 = 44$

10) $9n^2 - 3 = -2$

11) $10k^2 - 2 = 458$

12) $4b^2 - 2 = 202$

13) $36r^2 + 3 = 19$

14) $2r^2 + 7 = 15$

15) $25x^2 + 10 = 46$

16) $10a^2 - 9 = 481$

17) $-9 - 9n^2 = -666$

18) $25m^2 - 9 = 0$

19) $7r^2 - 9 = 19$

20) $-9 - 6v^2 = -315$

Answers to 1.2 Solve by Taking Square Roots

1) $\{7, -7\}$

5) $\{5, -5\}$

9) $\left\{\frac{3}{2}, -\frac{3}{2}\right\}$

13) $\left\{\frac{2}{3}, -\frac{2}{3}\right\}$

17) $\{\sqrt{73}, -\sqrt{73}\}$

2) $\{8, -8\}$

6) $\{3\sqrt{7}, -3\sqrt{7}\}$

10) $\left\{\frac{1}{3}, -\frac{1}{3}\right\}$

14) $\{2, -2\}$

18) $\left\{\frac{3}{5}, -\frac{3}{5}\right\}$

3) $\{2\sqrt{13}, -2\sqrt{13}\}$

7) $\{\sqrt{95}, -\sqrt{95}\}$

11) $\{\sqrt{46}, -\sqrt{46}\}$

15) $\left\{\frac{6}{5}, -\frac{6}{5}\right\}$

19) $\{2, -2\}$

4) $\{\sqrt{3}, -\sqrt{3}\}$

8) $\left\{\frac{1}{5}, -\frac{1}{5}\right\}$

12) $\{\sqrt{51}, -\sqrt{51}\}$

16) $\{7, -7\}$

20) $\{\sqrt{51}, -\sqrt{51}\}$