ALGEBRA 1
WS 9.3

Name $\qquad$
Date $\qquad$

1. Graph the function. State the number of solutions, and solve the equation. If the equation has no real-number solution, write "no solution."
$x^{2}-9=0$
$\mathrm{a}=$ $\qquad$ , $\mathrm{b}=$ $\qquad$ $\mathrm{c}=$ $\qquad$

Axis of Symmetry:


SOLUTION: $\qquad$
$y$-intercept:
2. Solve the same problem as above $x^{2}-9=0$ using square roots.

## Solve each equation by finding square roots.

3. $x^{2}-49=0$
4. $2 m^{2}-128=0$
5. $\frac{1}{9} y^{2}-1=0$
6. $5 p^{2}+45=0$
7. $\frac{1}{2} a^{2}-8=0$
8. $-\frac{3}{4} x^{2}+5=-22$
9. You are mowing a square lawn that has an area of $9300 \mathrm{ft}^{2}$. Approximate the side length of the lawn to the nearest tenth of a foot.
