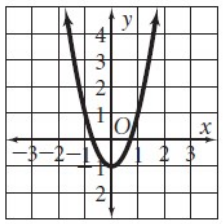
Name:_____ Ch 10.3 Review worksheet

Identify the vertex of each graph. Tell whether it is a minimum or a maximum.

1. 

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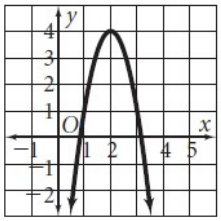
2. 

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Describe the following graphs based on the width and shifting up or down on the y intercept.

3. $y = 5x^2 - 8$ _____

4. $y = \frac{3}{4}x^2 + 2$ _____

5. $y = -2x^2$ _____

Solve each equation by finding square roots. If the equation has no real solution, write *no solution*. If necessary, round to the nearest tenth.

6. $x^2 = 16$

7. $x^2 - 144 = 0$

8. $3x^2 - 27 = 0$

9. $x^2 + 16 = 0$

10. $x^2 = 121$

11. $2x^2 = 98$

12. $x^2 + 8 = -10$

13. $x^2 + 12 = 16$

14. $3x^2 + 7 = -20$

Solve each problem and round to the nearest tenth.

15. You want to build a fence around a square garden that covers $506.25 ft^2$. How many feet of fence will you need to complete the job?

16.During construction of a skyscraper a bolt feel from 400ft. Use the formula $V^2 = 64s$, where V equals the speed and s is the distance fallen to calculate the speed of the bolt when it hit the ground.

17. Calculate the speed for a ice cycle if it drops of the roof of a three story home, which is 30 ft tall. Use the formula from problem 16.