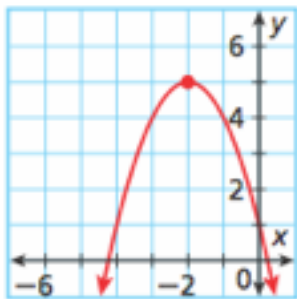


## Forms of a Quadratic Review

Name \_\_\_\_\_

1.



axis of symmetry:  
vertex:

3.  $f(x) = -\frac{1}{4}(x - 1)^2 + 4$

vertex:  
axis of symmetry:

5.  $f(x) = \frac{1}{4}(x + 5)^2 + 2$

vertex:  
axis of symmetry:

7. What are the zeros/solutions to the equation?

$$4x^2 + 5x - 6 = 0$$

2.  $y = 2x^2 + 8x + 16$

axis of symmetry:  
vertex:

4.  $y = -3x^2 + 12x - 10$

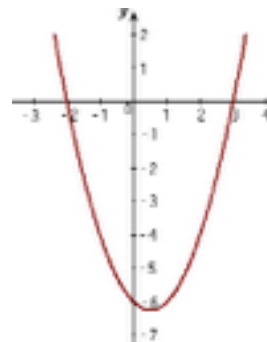
axis of symmetry:  
vertex:  
opens up or down?

6. What are the differences between the two graphs? (4 things!)

$$y = -\frac{1}{2}(x + 2)^2 + 1$$

$$y = 2(x - 4)^2 - 3$$

8. What are the roots/x-intercepts?



9. What are the x-intercepts/solutions?

$$5x^2 + 8x - 4 = 0$$

10. What are the zeros/roots?

$$y = 6x^2 - 24x + 27$$

11. Find the solutions.

$$4x^2 - 6 = 74$$

12. Find the solutions.

$$(x - 2)^2 - 25 = 0$$

13. Find the solutions.

$$2(x - 3)^2 - 18 = 0$$

14. Using graphing find the axis of symmetry, vertex, and solutions.

$$y = 4x^2 - 4x - 8$$

15. Using graphing, find the axis of symmetry, vertex, and solutions.

$$y = -x^2 - 2x + 2$$

16. Using graphing, find the axis of symmetry, vertex, and solutions.

$$y = x^2 + 4x + 7$$