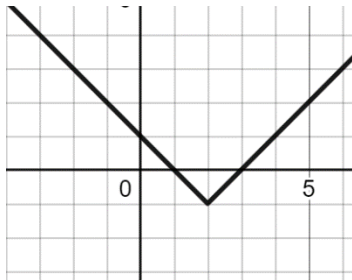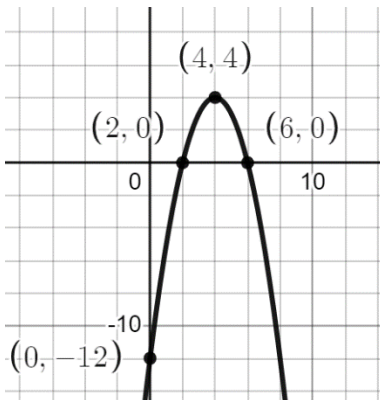1. $y = -\frac{4}{3}x + 4$

2. a. $f(-4) = -7$
   b. $f(2) = 1$

3. a. 21
   b. $\frac{3}{4}$
   c. $8x^4 + 16x^2 + 10$

4. $-4x - 2h$

5. a. Domain: $[-5,3]$
   b. Decrease: $(-5,-2),(-2,1),(2,3)$
   c. $f(-2) = 3$
   d. $\{1, 3\}$

6. $(-\infty, 0) \cup (0,9) \cup (9,\infty)$

7. x = 10

8. $\{-5,9\}$

9. x = -1

10. $x = 3 \pm i$

11. The rug measures 8 ft. by 10 ft.

12. The graph of $y = |x|$ is shifted 2 units to the right and one unit down to obtain the graph of $y = |x - 2| - 1$.
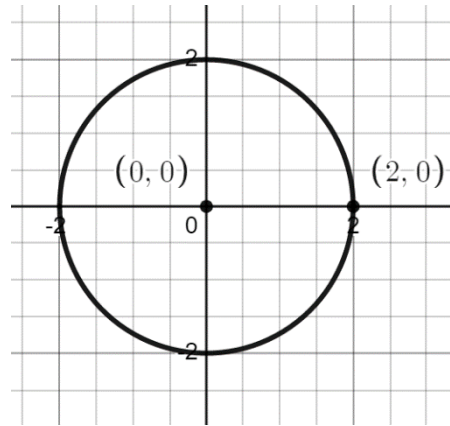

13. $\{1, 81\}$

14. a. (4,4)
    b.

15. $(-\infty, -2) \cup [4, \infty)$

16. a. 3
    b. -2
    c. $\frac{1}{4}$

17. He has taken 17 3-credit classes and 6 4-credit classes.

18. a. circle
    b.

19. x = -5

20. The height is 4 ft, the width is 2 ft, the length is 12 ft.