

Directions: Please choose the best answer choice for each of the following questions.

1. Which of the following sets represent functions?

$$P = \{(2, 2)\}$$

$$Q = \{(1, 3)(2, 5)(2, 7)(3, 9)\}$$

$$R = \{(5, 1)(-2, 1)(4, 1)\}$$

- A. P only
- B. P and R only
- C. Q and R only
- D. P , Q , and R

2. If $f(x) = 6x^2 - 3$ and $f(x) = 3$, then what is the value of x ?

- A. 1
- B. 2
- C. 6
- D. 12

3. Which equation shows $y = 2x - 4$ written correctly in function notation?

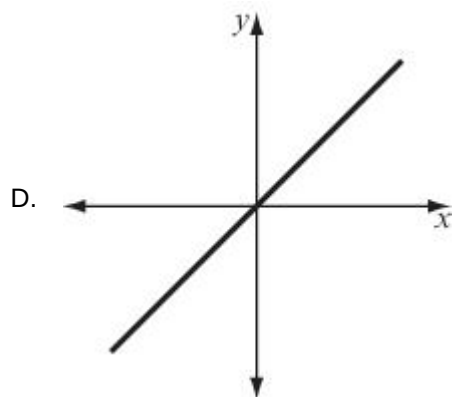
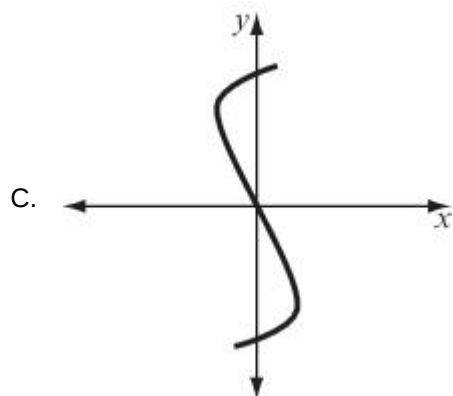
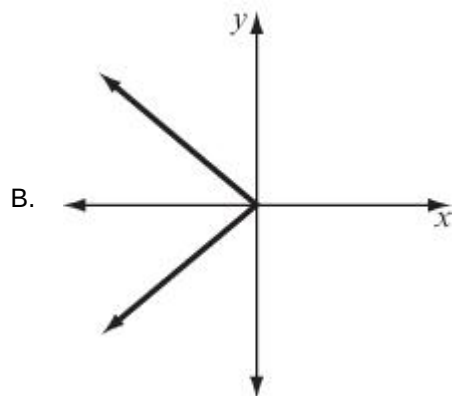
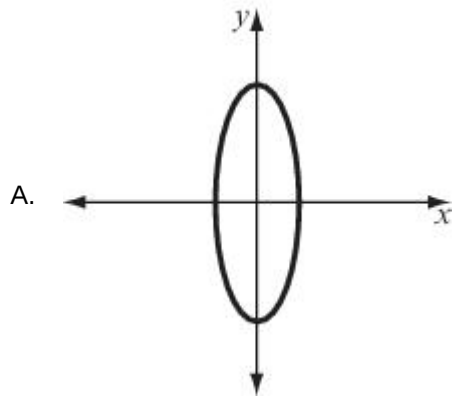
- A. $y = 2f(x) - 4$
- B. $y = f(2x) - 4$
- C. $f(y) = 2x - 4$
- D. $f(x) = 2x - 4$

4. Which function can be represented by the relationship shown in the table?

x	y
0	1
1	2
2	5
3	10
4	17

- A. $f(x) = x + 1$
- B. $f(x) = x^2 + 1$
- C. $f(x) = \sqrt{x + 1}$
- D. $f(x) = (x + 1)^2$

5. Which of the following graphs represents a function?



Stop! You have finished this exam.