

1. Evaluate the following expressions given the functions below:

$$g(x) = -3x + 1$$

$$f(x) = x^2 + 7$$

$$h(x) = \frac{12}{x}$$

$$j(x) = 2x + 9$$

a. $g(10) =$

b. $f(3) =$

c. $h(-2)$

d. $j(7) =$

e. $h(a) =$

f. $g(b + c) =$

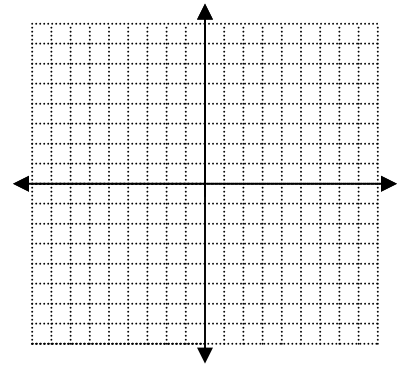
h. Find x if $g(x) = 16$

i. Find x if $h(x) = -2$

j. Find x if $f(x) = 23$

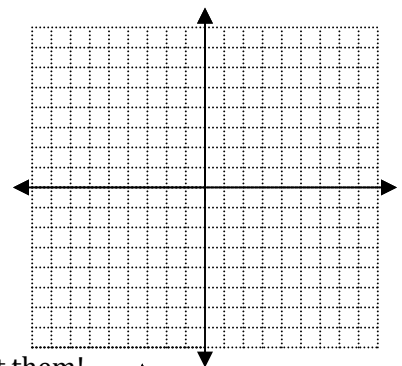
2. Given $f(x) = 3 - 4x$. Fill in the table and then sketch a graph.

x	-6	-3	0	1	
$f(x)$					-5



3. Given $f(x) = \sqrt{x+1}$. Fill in the table and then sketch a graph.

x	3	0	-10	2	
$f(x)$					6



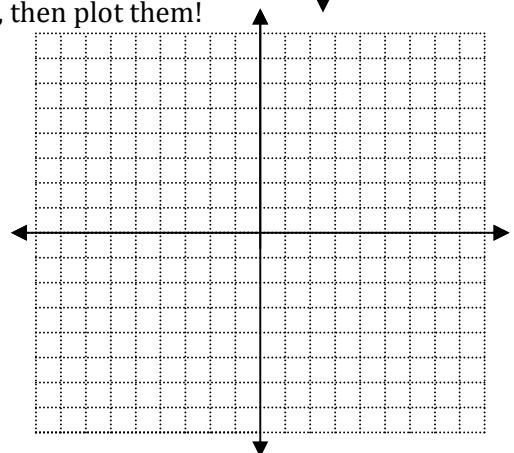
4. Translate the following statements into coordinate points, then plot them!

a. $f(-1) = 1$

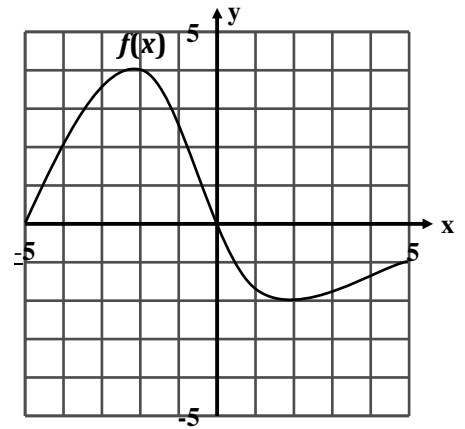
b. $f(2) = 7$

c. $f(1) = -1$

d. $f(3) = 0$



5. Given this graph of the function $f(x)$:



Find:

a. $f(-4) =$

b. $f(0) =$

c. $f(3) =$

d. $f(-5) =$

e. x when $f(x) = 2$

f. x when $f(x) = 0$

6. Find an equation of a linear function given $h(1) = 6$ and $h(4) = -3$.

7. Swine flu is attacking Porkopolis. The function below determines how many people have swine where $t =$ time in days and $S =$ the number of people in thousands.

$$S(t) = 9t - 4$$

a. Find $S(4)$.

b. What does $S(4)$ mean?

c. Find t when $S(t) = 23$.

d. What does $S(t) = 23$ mean?

e. Graph the function.

