

Standard 1A Opportunity today!!!

Grab the review off the front table

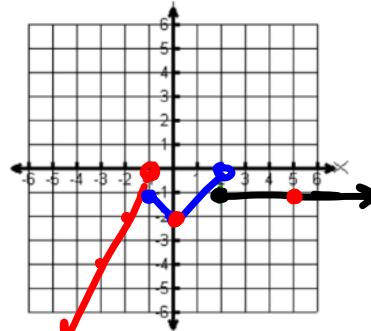
12 minutes maximum

Standard 1A Review

Name: \_\_\_\_\_ Hr: \_\_\_\_\_

1. Sketch a graph of the piecewise function below.

$$f(x) = \begin{cases} 2x+2, & x < -1 \\ |x|-2, & -1 \leq x < 2 \\ -1, & x \geq 2 \end{cases}$$



Using the function above find the following values given.

2.  $f(5) = -1$   
 (5, -1)

3.  $f(0) = -2$   
 (0, -2)

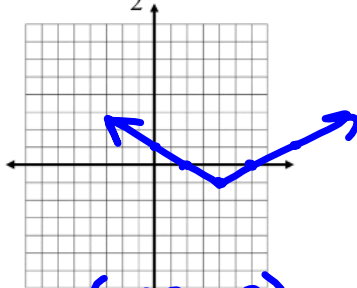
Describe the transformation(s) done to the parent function  $f(x) = |x|$ .

4.  $g(x) = -2|x-4|+3$

reflect, stretch by 2,  $\rightarrow 4$ ,  $\uparrow 3$

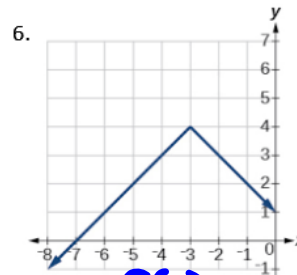
Graph the following function and state the domain and range.

5.  $f(x) = \frac{1}{2}|x-4|-1$



Domain:  $(-\infty, \infty)$   
 Range:  $[-1, \infty)$

Write the equation of the absolute value function and state the domain and range.



Equation:  $f(x) = -|x+3|+4$   
 Domain:  $(-\infty, \infty)$   
 Range:  $(-\infty, 4]$

Write the equation of the described function.

7. An absolute value function shifted left 2 and down 1.

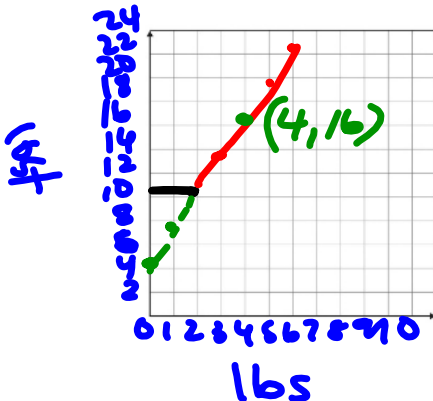
$f(x) = |x+2|-1$

8. An absolute value function shifted right 1, reflected over the x-axis and shifted up 4.

$f(x) = -|x-1|+4$

9. A booth at the farmers market is having a sale on homemade candy. You can buy up to 2 lbs for a flat cost of \$10.00. After that, the candy cost \$3/lb for each additional pound.

Write and graph a piecewise function that represents the cost for candy up to 6 pounds.



$$f(x) = \begin{cases} 10, & x \leq 2 \\ 3x+4, & 2 < x \leq 6 \end{cases}$$

## Standard 1A - Opportunity 1

Keep eyes on own paper - cover answers as you go!

When finished:

Double check answers  
Turn paper in basket  
Work on hw  
Read a book

$$g(x) = \begin{cases} 3, & \text{if } x < -1 \\ -x + 4, & \text{if } -1 \leq x < 1 \\ -2, & \text{if } 1 \leq x < 4 \end{cases}$$

#6

positive 4,  
not -4

NO PHONES

