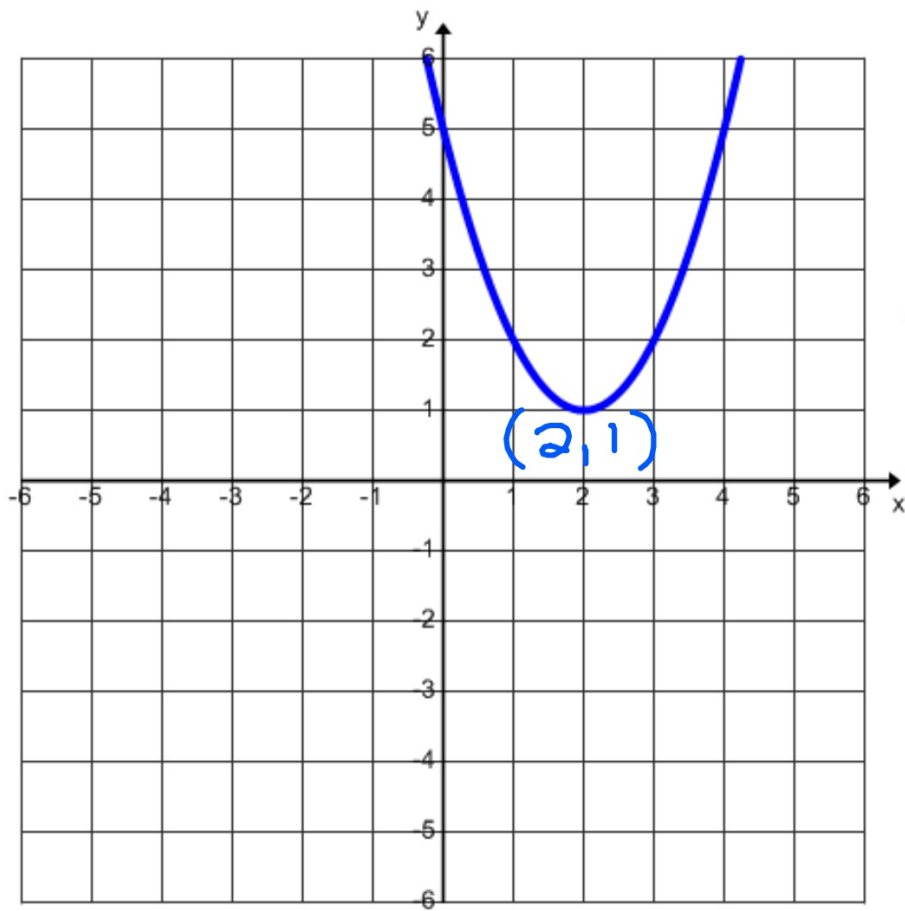
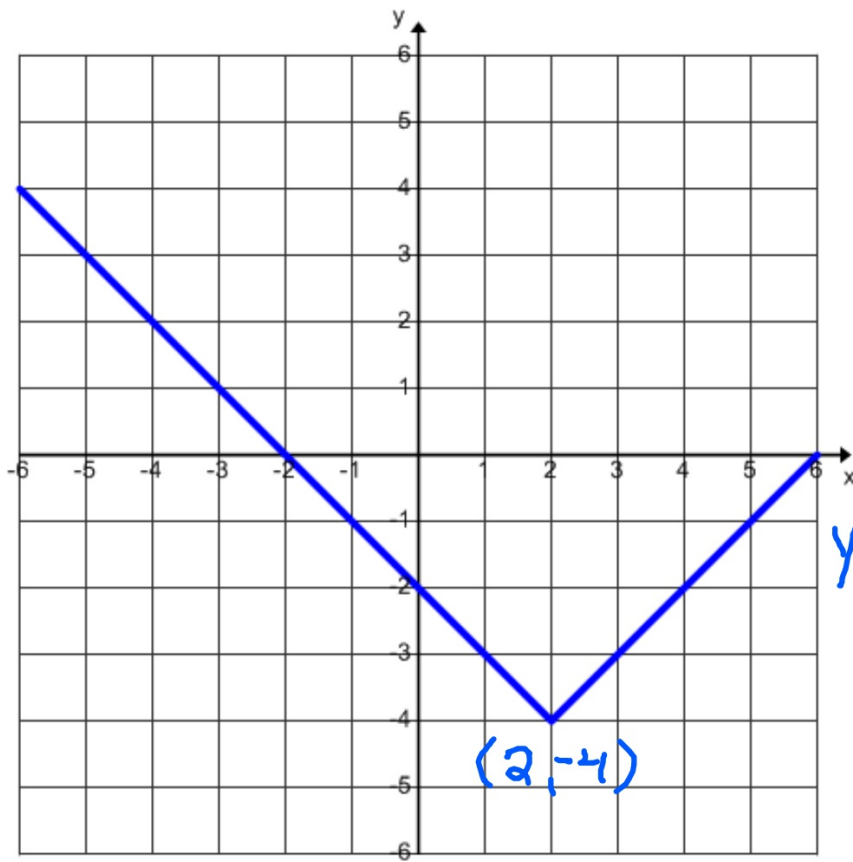


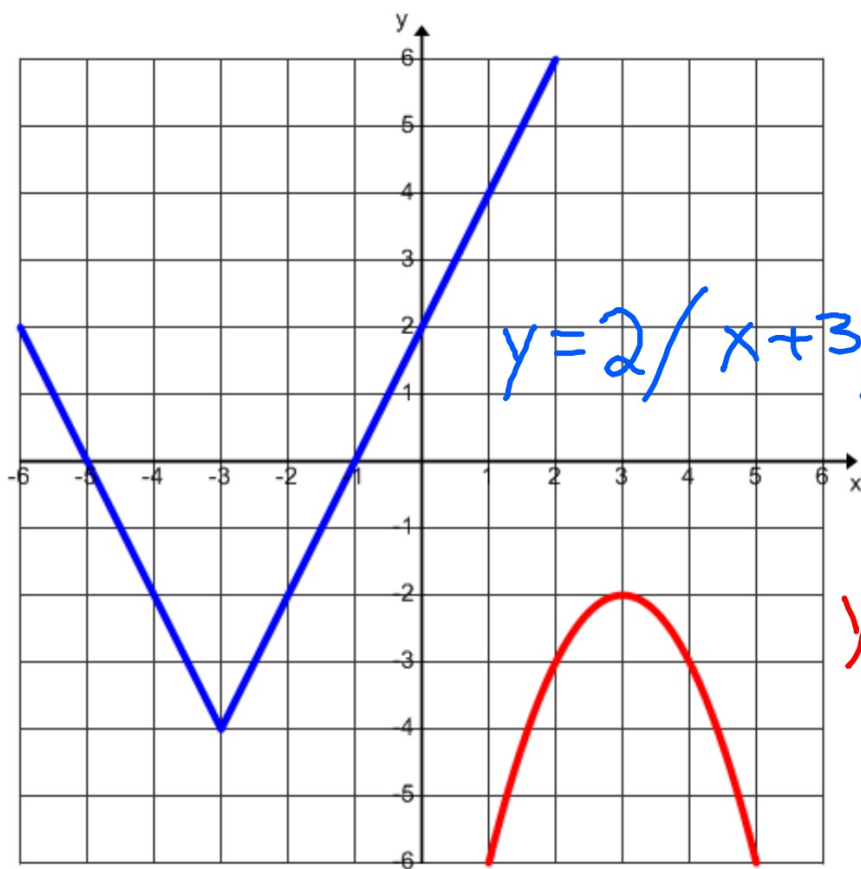
$$y = x^2 - 4$$



$$y = (x - 2)^2 + 1$$

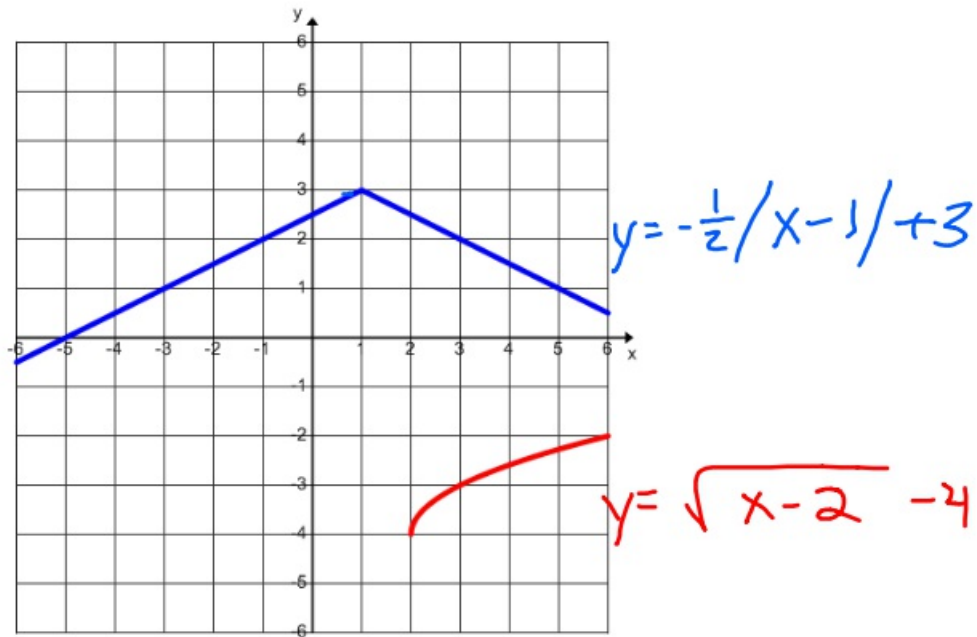


$$y = |x - 2| - 4$$



$$y = 2/x + 3/-4$$

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



Horizontal & Vertical

$$\textcircled{5} \quad y = \frac{x+6}{x^2-9}$$

Horizontal: Bob  $\textcircled{0}$   
 $y = 0$

Vertical:  $x^2 - 9 = 0$

$$(x+3)(x-3) = 0$$

$$x+3=0$$

$$x = -3$$

$$x-3=0$$

$$x = 3$$

$$x = \pm 3$$

$$\textcircled{6} \quad y = \frac{2x^2 + 3x}{x^2 - x - 20}$$

Horizontal: Easy DC  $\div$  const.  
 $y = \frac{2}{1} \quad y = 2$

Vertical:

$$x^2 - x - 20 = 0$$

$$(x-5)(x+4) = 0$$

$$x-5 = 0 \quad x+4 = 0$$

$$x = 5 \quad x = -4$$

$$\textcircled{7} \quad y = \frac{8x-1}{2x^2}$$

Horizontal: Bobo Both Easy DC  
 $y = 0$

Vertical:

$$\frac{2x^2}{2} = 0$$

$$\sqrt{x^2} = \sqrt{0}$$

$$x = 0$$

$$\textcircled{8} \quad y = \frac{x^2 + 5x + 7}{x + 2}$$

$$\begin{array}{r} x + 3 \\ x + 2 \overline{) x^2 + 5x + 7} \\ \underline{-(x^2 + 2x)} \phantom{+ 7} \\ 3x + 7 \end{array}$$

Slant

$$y = x + 3$$

$$\begin{array}{r} 3x + 7 \\ 3x + 6 \\ \hline x \end{array}$$

\textcircled{9} Does a hole exist on

$$y = \frac{x^2 + 7x + 12}{x + 2}$$

$$y = \frac{(x + 4)(x + 3)}{x + 2}$$

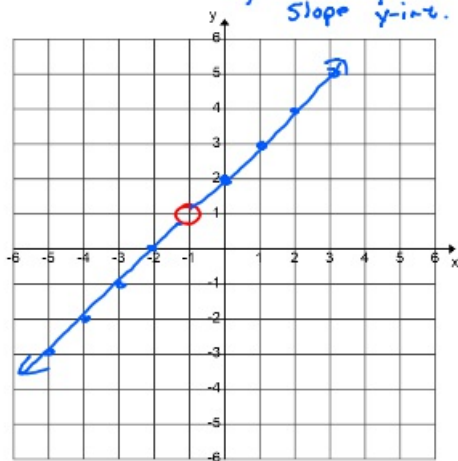
$x + 2$  doesn't cross out  
so NO

⑩ Graph  $y = \frac{x^2 + 3x + 2}{x + 1}$

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

$$y = x + 2 \quad [x \neq -1]$$

↑ slope    ↑ y-int.



PT2 #13

$$|5x + 11| < -4$$

↓  
positive number  $< -4$

Hi

Never happens  
No solution



