

Sept. 10, 2013

Sects 2-3 ; 4

2-3 { Graphing Linear Ineqs.
Graph Line
Pick Test Point
Shade

2-4 { Graphing Systems of Lin. Ineqs.
{ Same Stuff }
Overlap Shade

$$y \geq 2x - 3$$

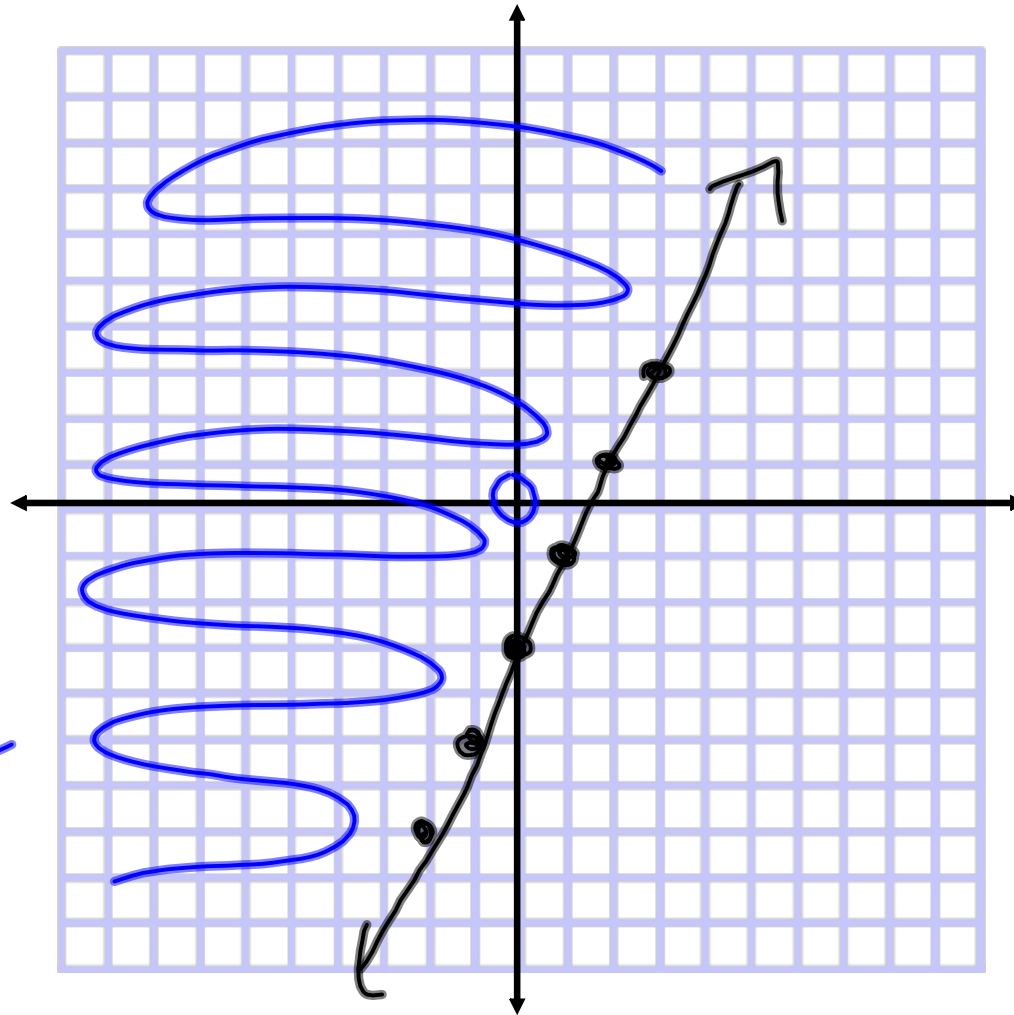
$$m = \frac{2}{1} \quad (0, -3)$$



$(0, 0)$

$$0 \stackrel{?}{\geq} 2(0) - 3$$

$$0 \stackrel{?}{\geq} -3 \quad \checkmark$$



$$y < -3x + 2$$

$$m = \frac{-3}{1} \quad (0, 2)$$

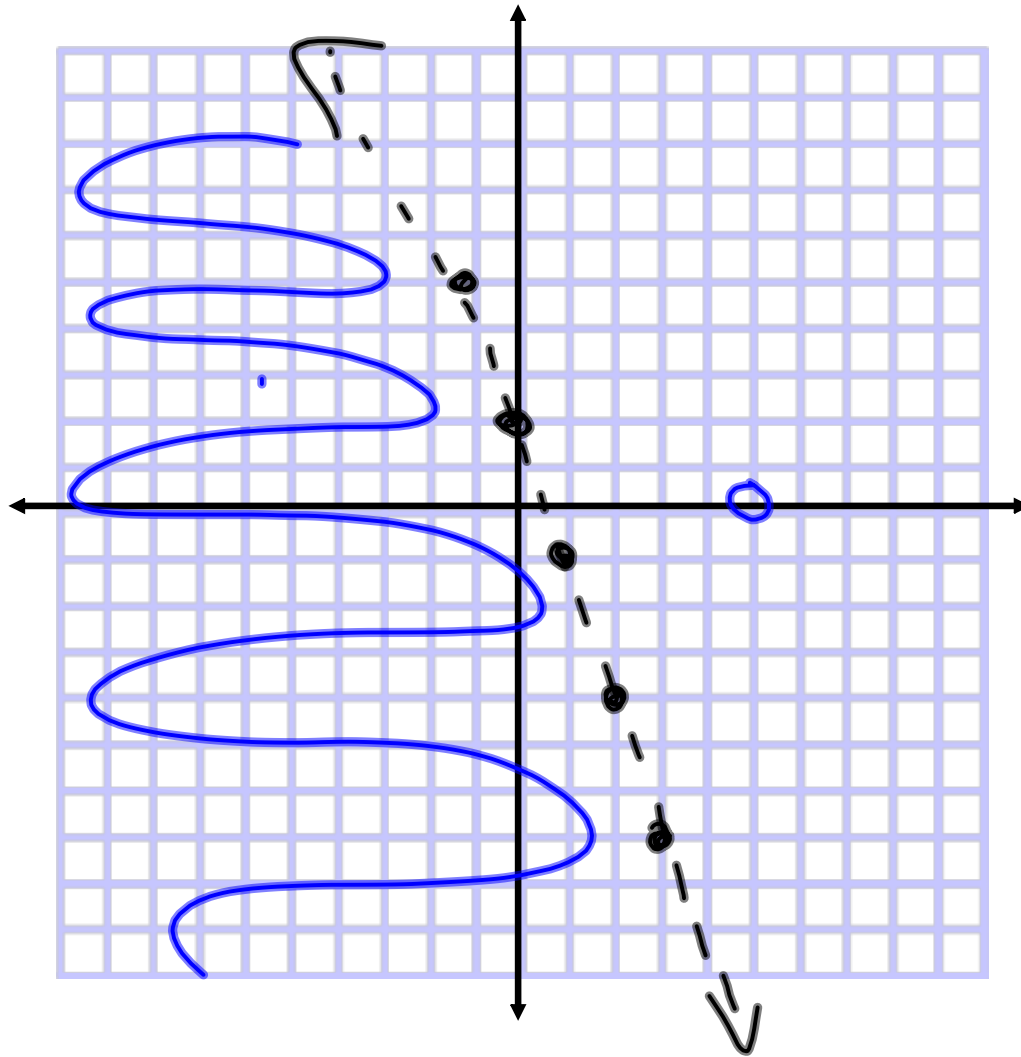
$$(5, 0)$$

$$0 \stackrel{?}{<} -3(5) + 2$$

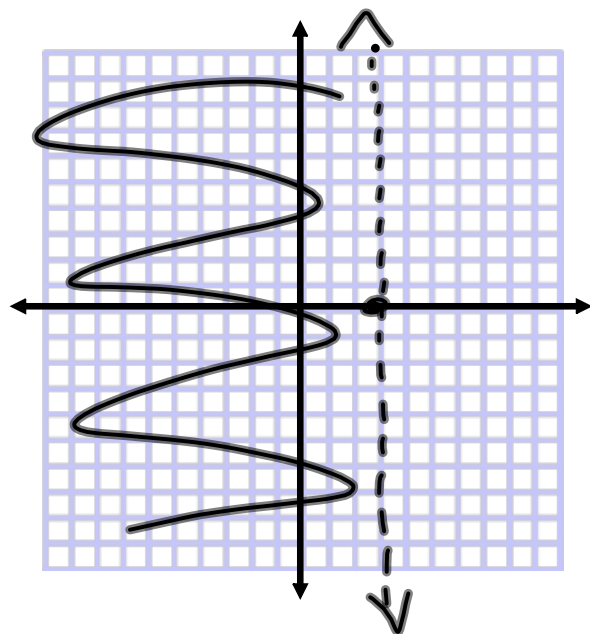
$$0 \stackrel{?}{<} -15 + 2$$

$$0 \stackrel{?}{<} -13$$

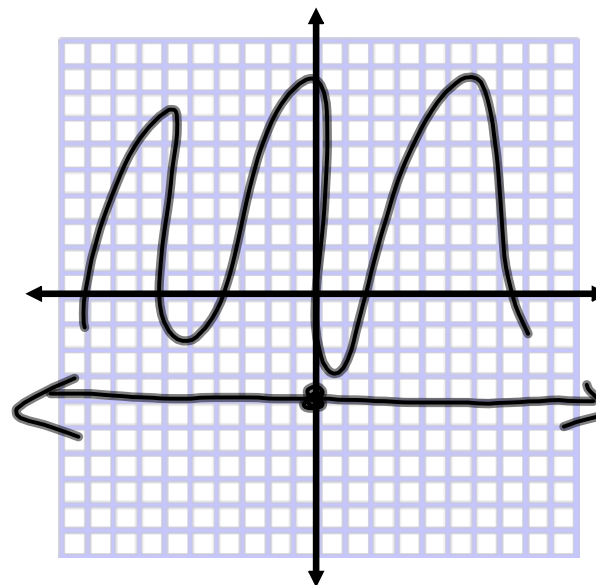
X



$$x < 3$$



$$y \geq -4$$



$$\begin{cases} y \geq x + 0 \\ y \geq -x + 0 \end{cases}$$

$$(4, 0)$$

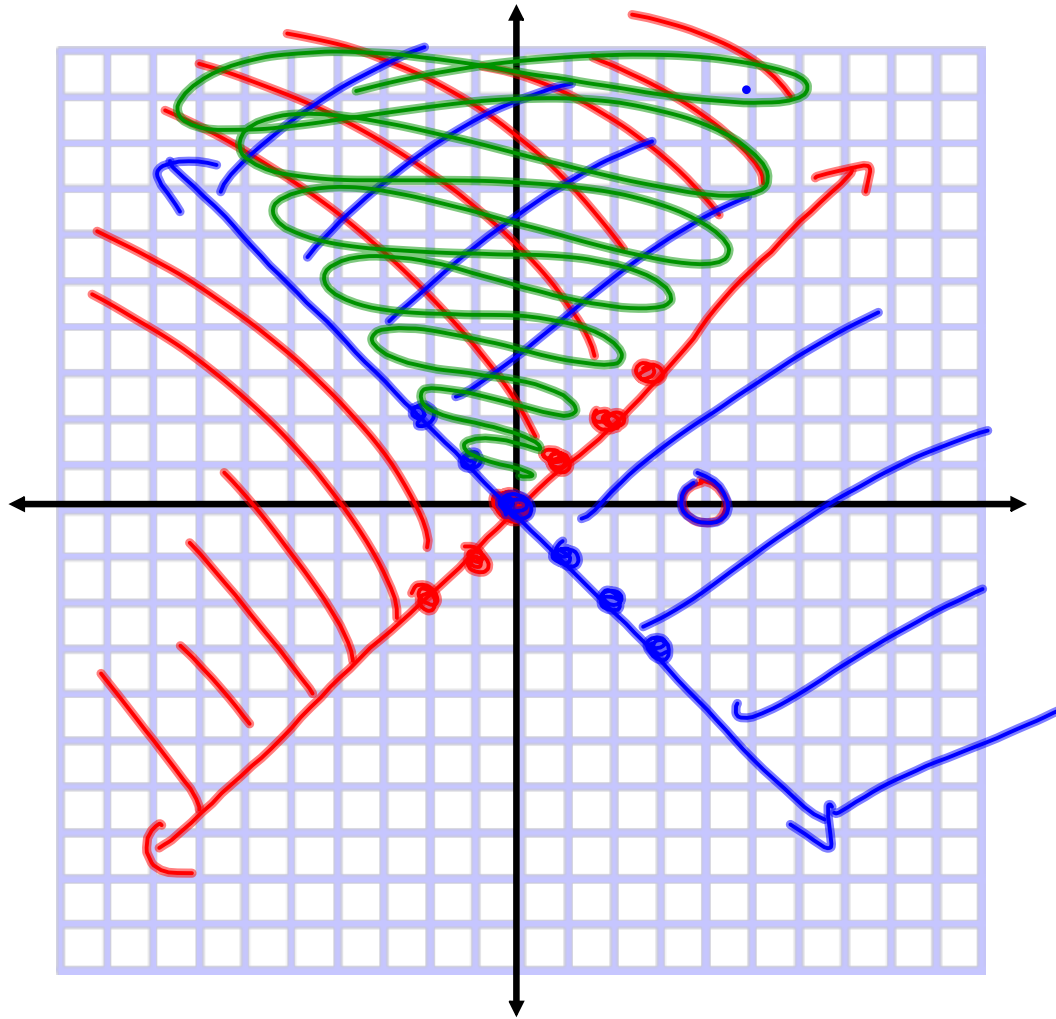
$$0 \leq 4$$

X

$$(4, 0)$$

$$0 \leq -4$$

✓



$$\begin{cases} x - y > -1 \Rightarrow -y > -x - 1 \Rightarrow y < x + 1 \\ 3x - y \leq 4 \Rightarrow -y \leq -3x + 4 \Rightarrow y \geq 3x - 4 \end{cases}$$

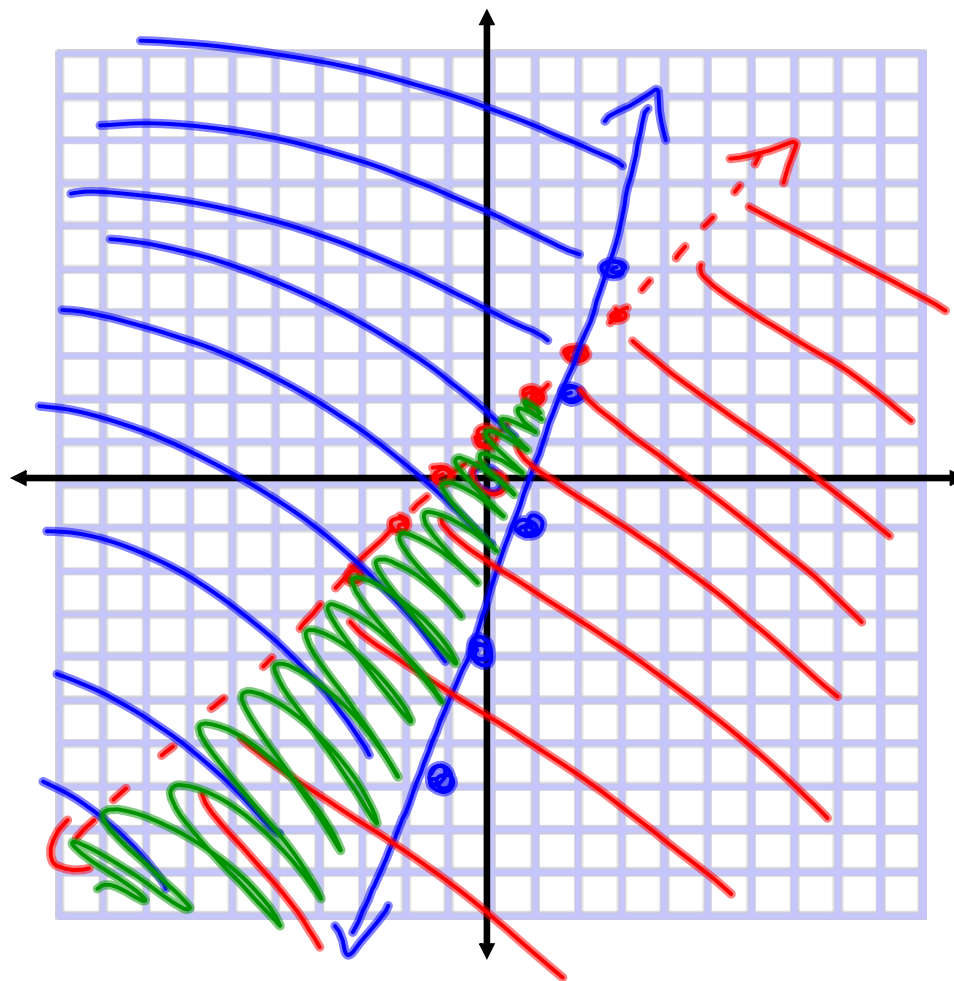
$$(0, 0)$$

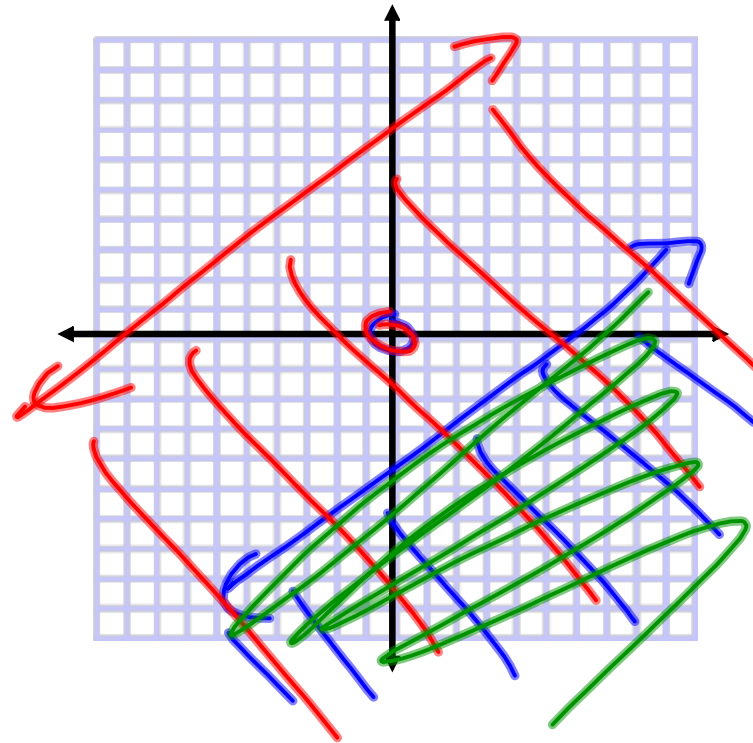
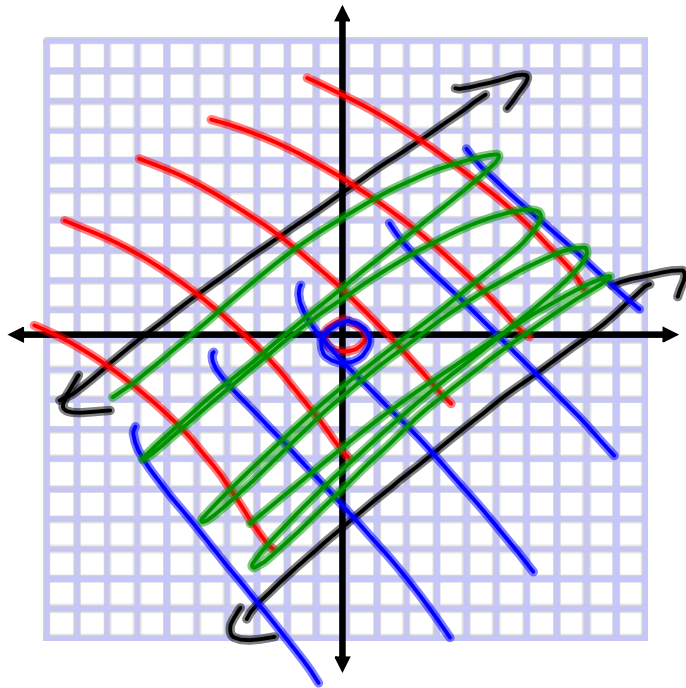
$$0 - 0 \stackrel{?}{>} -1$$

$$0 \stackrel{?}{>} -1 \checkmark$$

$$3(0) - 0 \stackrel{?}{\leq} 4$$

$$0 \stackrel{?}{\leq} 4 \checkmark$$





Don't
Overlap

No Sol.

