

3-2 Skills Practice

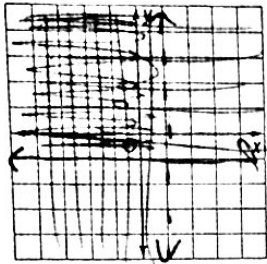
Solving Systems of Inequalities by Graphing

Solve each system of inequalities by graphing.

$$\begin{aligned} x - y &\geq -1 \\ -x &\leq -x \\ -y &\geq -x - 1 \\ -1 &\geq -1 - 1 \\ y &\leq x + 1 \end{aligned}$$

$$\begin{aligned} x - y &\geq -1 \\ +y &\leq +y + 1 \\ x + 1 &\geq y \\ y &\leq x + 1 \end{aligned}$$

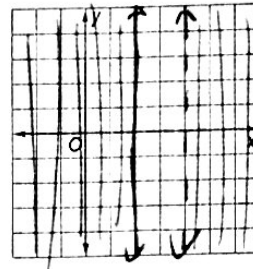
1. $x < 1$
 $y \geq -1$



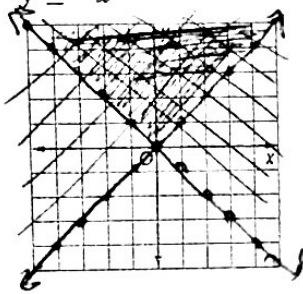
2. $x \geq -3$
 $y \geq -3$



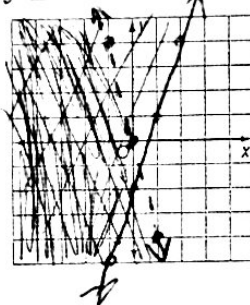
3. $x \leq 2$
 $x > 4$



4. $y \geq x$
 $y \geq -x$



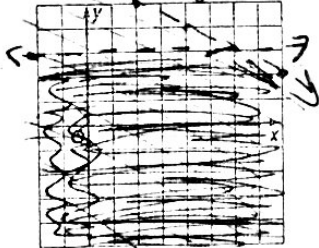
5. $y < -4x$
 $y \geq 3x - 2$



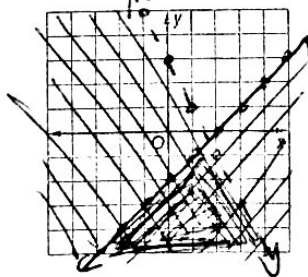
6. $x - y \geq -1$ $y \leq x + 1$
 $3x - y \leq 4$ $y \geq 3x - 4$



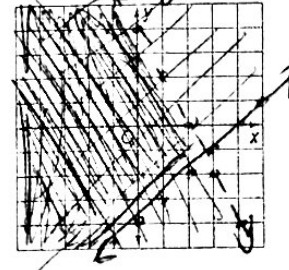
7. $y < 3$
 $x + 2y < 12$ $y < -\frac{1}{2}x + 6$



8. $y < -2x + 3$
 $y \leq x - 2$



9. $x - y \leq 4$ $y \geq x - 4$
 $2x + y < 4$ $y < -2x + 4$



Find the coordinates of the vertices of the triangle formed by each system of inequalities.

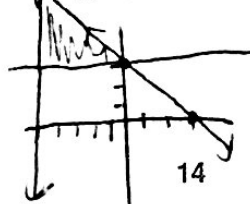
10. $y \leq 0$
 $x \leq 0$
 $y \geq -x - 1$



Chapter 3

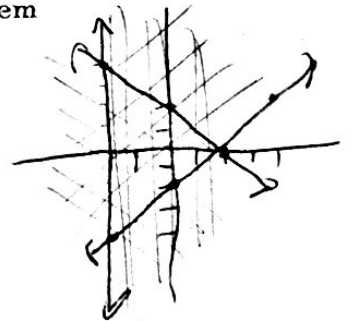
- $(-1, 0)$
- $(0, 0)$
- $(0, -1)$

11. $y \leq 3 - x$ $y \leq -x + 3$
 $y \geq 3$
 $y \geq -5$



- $(0, 3)$
- $(-5, 3)$
- $(-5, 8)$

12. $x \geq -2$
 $y \geq x - 2$
 $x + y \leq 2$
 $y \leq -x + 2$



- $(2, 0)$
- $(-2, -4)$
- $(-2, 4)$