Today's Plan:

Learning Target (standard): I will solve linear systems using the graphing method.

Students will: Complete practice problems over previous concepts at the boards, put up homework problems on the board and make necessary corrections to their own work, take notes over new material and complete practice problems over new concepts.

Teacher will: Provide practice problems over previous concepts, check homework problems for accuracy and provide students feedback, describe and provide examples of new concepts and assign students assessment problems over new concepts.

Assessment: Board work, homework check and homework assignment

Differentiation: Students will work at the board, go over and correct homework at their seats, actively engage in lecture over new concepts, practice new concepts with the aid of other students and the teacher and complete homework assignment.

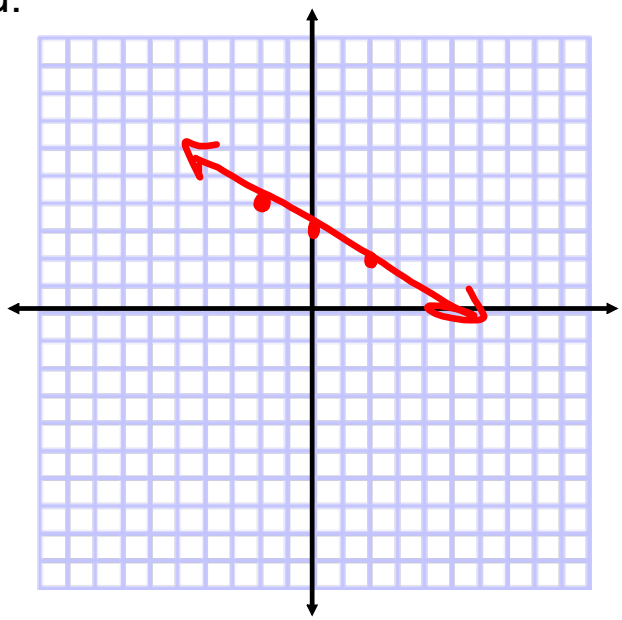
Graph using the t-chart method.

$$2x+4y=12$$

$4y = -2x+12$

$y = -\frac{1}{2}x+3$

x	y
-2	4
0	3
2	2



Graph using the slope-intercept method.

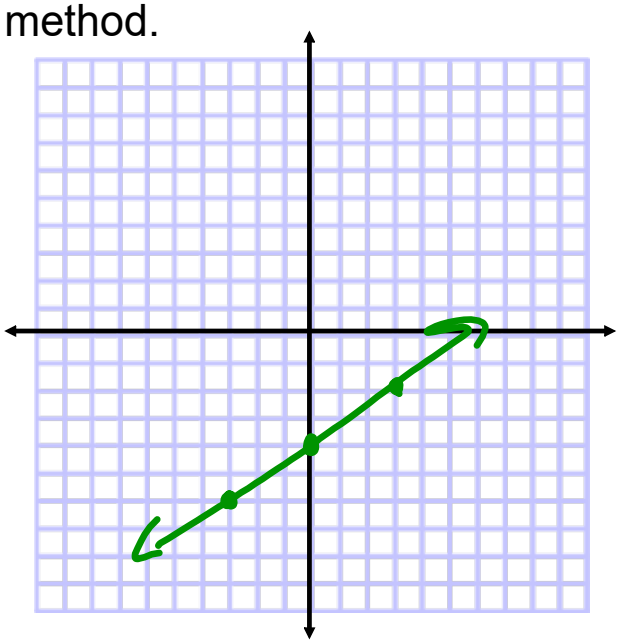
$$-2x+3y=-12$$

$3y=2x-12$

$y=\frac{2}{3}x-4$

$m=\frac{2}{3}$

$I_y: (0,-4)$



Graph using the slope-intercept method.

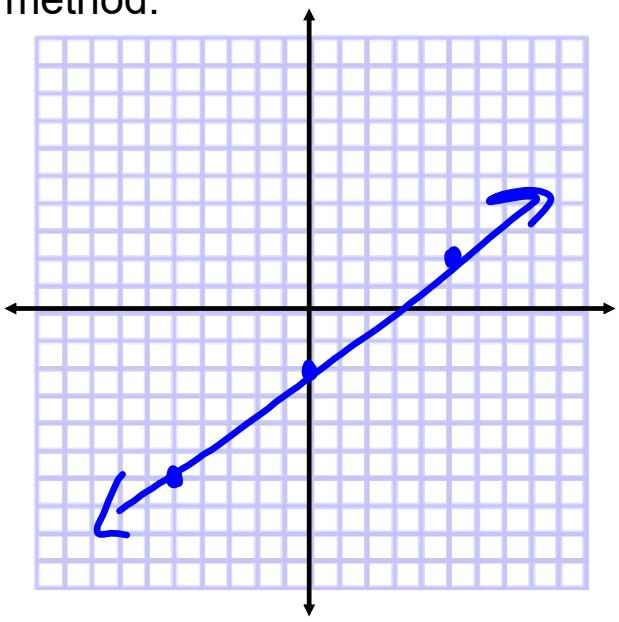
$$4x-5y=10$$

$-5y=-4x+10$

$y=\frac{4}{5}x-2$

$m=\frac{4}{5}$

$I_y: (0,-2)$



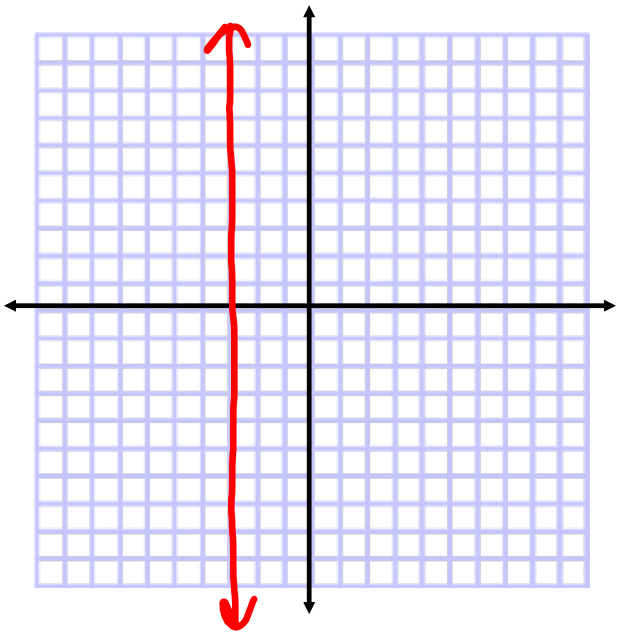
Graph.

$-6x = 18$

$x = -3$

$m = \frac{rise}{run} = \frac{\#}{0}$

$m = und$



Solve:

~~$4x + y = 9$~~

$3x - 4y = 2$

$y = -4x + 9$

$y = -4(2) + 9$

$y = -8 + 9$

$y = 1$

$3x - 4(-4x + 9) = 2$

$3x + 16x - 36 = 2$

$19x = 38$

$x = 2$

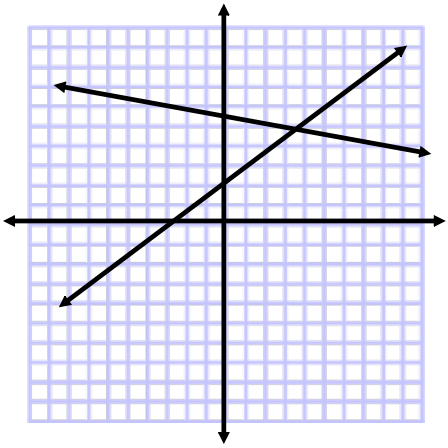
independent

(2, 1)

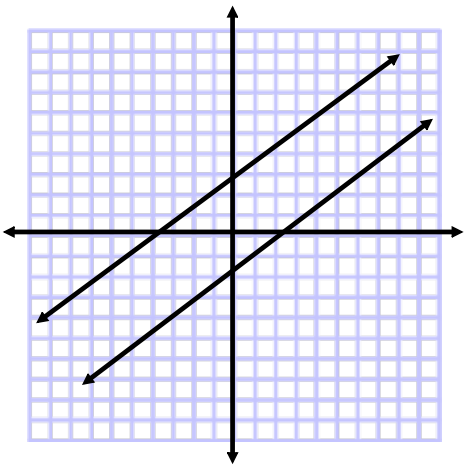
Systems of Equations:

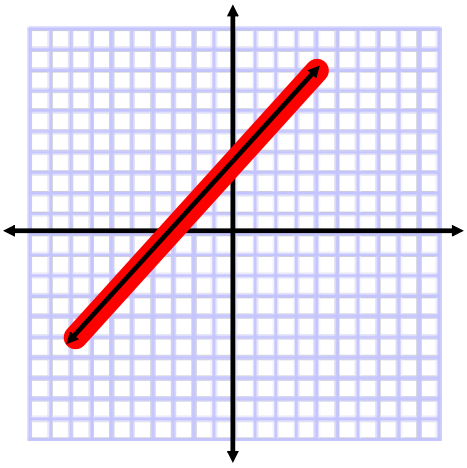
- Two or more equations considered together
- Solution is an ordered pair that is a solution of each equation of the system

Graphing Method:



Graphing Method:





Graphing Method:

- Write each equation in slope-intercept form
- Label the slope and I_y of each line
- Determine type of solution based on slopes and intercepts
- Graph each line & find the solution (if one exists)

Solve each system using the graphing method:

① $x + 2y = 4$

② $2x + y = -1$

$y = -2x - 1$

$m = -2$

$I_y: (0, -1)$

$2y = -x + 4$

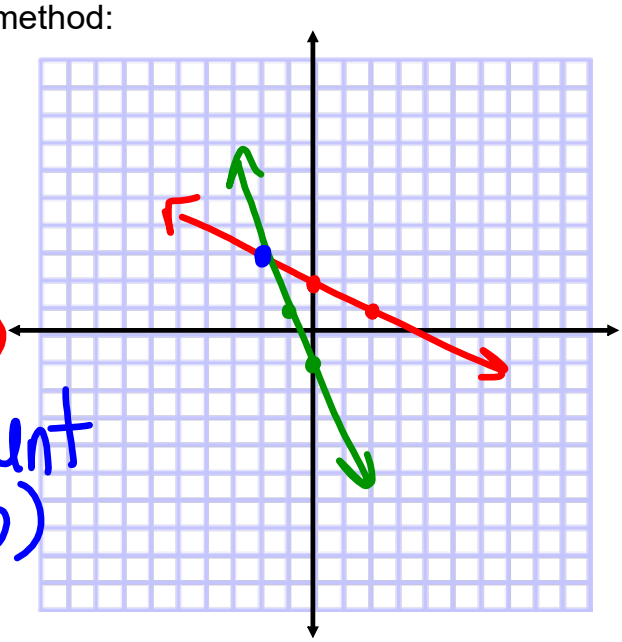
$y = -\frac{1}{2}x + 2$

$m = -\frac{1}{2}$

$I_y: (0, 2)$

independent

$(-2, 3)$



Solve each system using the graphing method:

① $2x + 3y = 6$

② $4x + 6y = -12$

$3y = -2x + 6$

$y = -\frac{2}{3}x + 2$

$m = -\frac{2}{3}$

$I_y: (0, 2)$

$6y = -4x - 12$

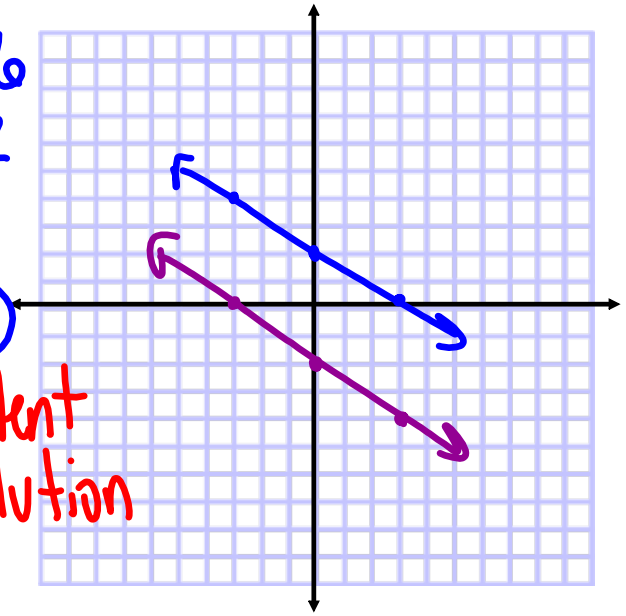
$y = -\frac{2}{3}x - 2$

$m = -\frac{2}{3}$

$I_y: (0, -2)$

inconsistent

no solution



Assignment:

Graphing Method

#1-8