

Must show work! Example on back.

## SUBSTITUTION METHOD WORKSHEET

1)  $2x + 8y = 20$   
 $y = 2$

2)  $x = 5$   
 $2x + y = 10$

3)  $5x - 2y = 3$   
 $y = 2x$

4)  $2y + x = -15$   
 $x = 3y$

5)  $4x + 7y = 19$   
 $y = x + 9$

6)  $y = 6x + 11$   
 $2y - 4x = 14$

Ex.  $y = 2x + 4$

$$3x + y = 9$$

Step 1)  $3x + 2x + 4 = 9$

Plug in  $2x + 4$   
for  $y$ .

$$5x + 4 = 9$$

$$-4 \quad -4$$

$$\frac{5x}{5} = \frac{5}{5}$$

Solve for  
 $x$ .

$$x = 1$$

Write  
one of the  
original equations.

Step 2)

$$y = 2x + 4$$

$$y = 2(1) + 4$$

$$y = 2 + 4$$

Plug in 1 for  $x$ .

$$y = 6$$

Step 3)  $(1, 6)$

write ordered pair