W.S. #5.2 - Solving Systems of Equations by Substitution 1

Name: _____ Class: _____

Directions: Solve the following systems of equations by substitution. The answers are on the back, which means you must persevere and correct your work!

1.) $y = 3$
$3x + y = 15$

2.) $y = 2x$
$3x + y = 25$

3.) $x = 3y$
$2x + 3y = 18$

Show a check for question #3.

4.) $y = 4 - 2x$
$y = x + 10$
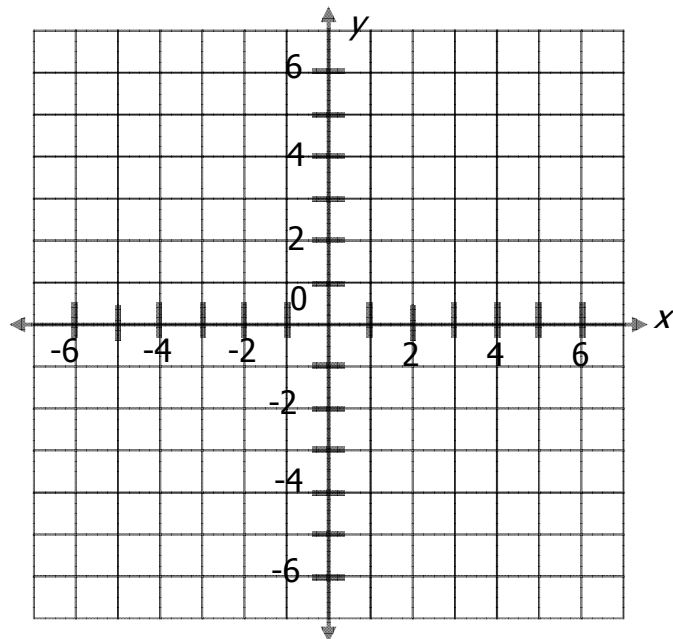
5.) $c = 5d + 2$
$2c + d = 26$

6.) $x = 1 - 4y$
$2x - 3y = -9$

7.) Solve the equation below.

$-3(x - 1) + 8(x - 3) = 6x + 7 - 5x$

8.) Solve the following system of equations graphically. **Check your answer in the original equation.**

$x + y = 6$
$2y - x = 6$

Answers:

1.) (4,3)   2.) (5,10)   3.) (6,2)   4.) (-2,8)

5.) (12,2)   6.) (-3,1)   7.) 7   8.) (2,4)