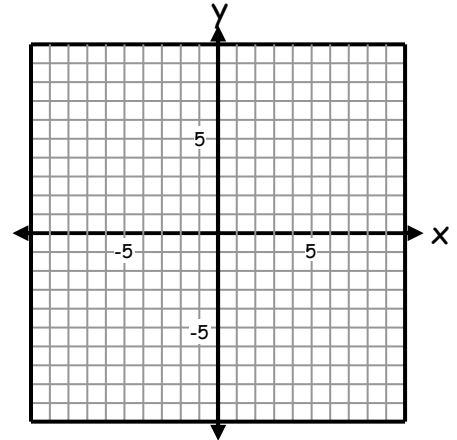


7.6 Activity: Finding the number of solutions to a linear system

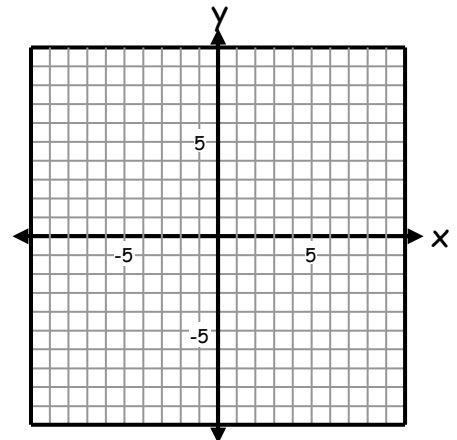
1) Solve each of the following systems graphically. How many solutions do you get?

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



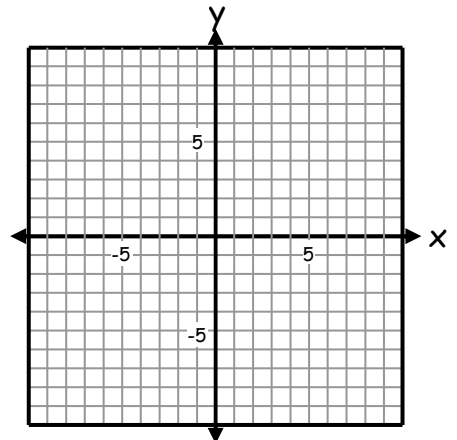
Number of solutions: _____

b) $3x + 2y = 12$
 $6x + 4y = 12$



Number of solutions: _____

c) $2x + y = 5$
 $4x + 2y = 10$



Number of solutions: _____

2) Solve each of the systems from question 1 using elimination. How can you tell how many solutions each system has?

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

$3x + 2y = 12$
b) $6x + 4y = 12$

$2x + y = 5$
c) $4x + 2y = 10$