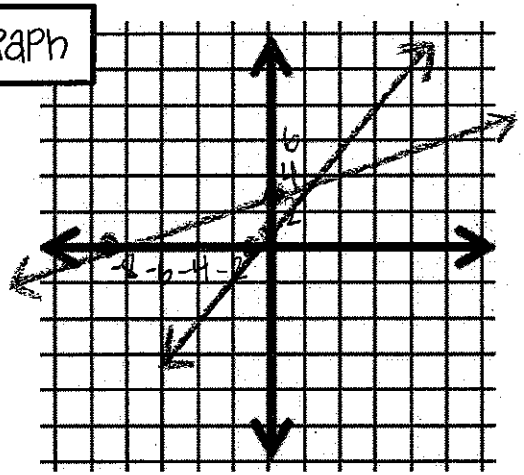
$x - 3y = -9$
$x - y = -1$

using a GRAPH



$(-9,0)$ $(0,3)$
$(-1,0)$ $(0,1)$

$(3,4)$

$-3(2x + 5y = 14)$
$6x + 7y = 10$

using a substitution OR elimination

$-6x - 15y = -42$
$+\ 6x + 7y = 10$

$\frac{-8y}{-8} = \frac{-32}{-8}$

$y = 4$

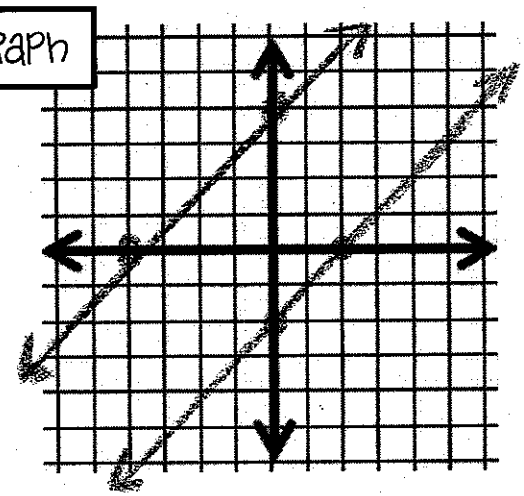
$2x + 5y = 14$
$2x + 5(4) = 14$
$2x + 20 = 14$
$-20 \quad -20$
$2x = -6$
$x = -3$

$6x + 7y = 10$
$6(-3) + 7(4) = 10$
$-18 + 28 = 10$
$10 \stackrel{\checkmark}{=} 10$

$(-3,4)$

$x - y = -4$
$-3x + 3y = -6$

using a GRAPH



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

$+\ x - 2y = 7$
$\quad -x + 2y = 7$

using a substitution OR elimination

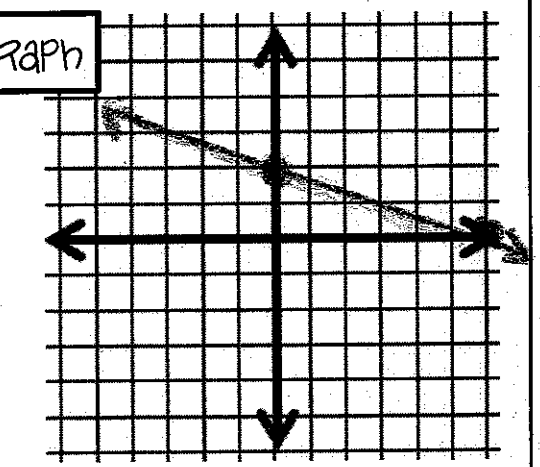
$0x + 0y = 14$

$0 \neq 14$

false
no solution.
parallel lines

$x + 3y = 6$
$-2x - 6y = -12$

using a GRAPH



$(6,0)$ $(0,2)$
$(6,0)$ $(0,2)$

$-16x + 2y = -2$
$y = 8x - 1$

using a substitution OR elimination

$-16x + 2(8x - 1) = -2$

$-16x + 16x - 2 = -2$

$0x - 2 = -2$

$-2 = -2$

true
infinite soln's
same line

one solution

No solution

infinitely many solutions

's