

# MasterMath

## Writing Systems of Linear Equations

Name \_\_\_\_\_

Date \_\_\_\_\_

### 1. Solve these systems of linear equations using algebra

Equation 1	Equation 2	Solution	
		x	y
$y = 3x + 4$	$y = 2x + 3$		
$y = 1/2 x - 6$	$y = 4 - 2x$		
$x = 2y + 1$	$y = x + 2$		
$y = -4x - 12$	$y = .75x + 11.75$		
$y = 3x - 4$	$y = 2x + 6$		
$x = .5y$	$y = 3x + 11$		
$y = 1/5 x + 2$	$y = 4x + 21$		
$y = x + 6$	$x = 2y$		
$y = 11x$	$y = 6x + 5$		

2. I have 8 coins in my pocket; all are either nickles or dimes. They total 70 cents. How many nickles and how many dimes to I have?

nickles	dimes

3. There are 28 members of the co-ed flag football team. This includes 6 more boys than girls. How many boys and how many girls are there on the team?



boys	girls

4. The number of members of the math club (**m**) is now 22, and has been increasing by an average of 2 per month (**t**). The number of members of the Benedict Arnold fan club (**a**) is now 38, but has been decreasing by an average of 6 per month (**t**). In how many months should the membership in these two clubs become equal?

5. A burger and a smoothie costs \$5. You and your friends buy 3 burgers and 6 smoothies, and the bill comes to \$21, How much does a burger cost? How much does a smoothie cost?

burger	smoothie