

# MasterMath

## Solving Multi-Step Equations Part 1

Name \_\_\_\_\_

Date \_\_\_\_\_

1. Solve each for the Variable

Equation	x =
$3x + 6 = 15$	3
$8 - 2x = 12$	-2
$14x - 28 = -56$	-2
$\frac{1}{4}x - 12 = 16$	112
$22 - 3x = 1$	7
$2\frac{1}{2}x - \frac{7}{8} = 1$	$\frac{3}{4}$
$3.6x - 4.8 = 24$	8
$-14 - 3x = -44$	10
$17 - x = 17$	0

2. Tonya's Tennis Academy charges \$25 per hour for lessons, plus a registration fee of \$15. Gerald spent a total (T) of \$290 for lessons. How many hours of lessons (h) did he take? Create and equation to determine cost of lessons with number of hours of lessons as the variable. Then substitute what you know and solve for hours of lessons.



Equation	h =
$T = 25h + 15$	11

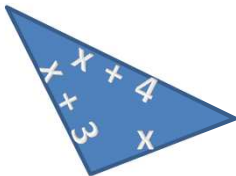
3. You can spend \$445 for a dining table and chairs. The table you want cost \$235, and the chairs you want cost \$35 each. Write an equation to determine your costs for the table and chairs, with number of chairs as the variable. Use the equation to determine how many chairs you can get with your \$445.



Equation	c =
$T = 35c + 235$	6

4. The Perimeter of this triangle is 31. What is the value of x?

8



5. The length of a rectangle is 3.5" greater than it's width. The Perimeter of the rectangle is 43". What are the dimensions of the rectangle?

9" x 12.5"