Writing and Solving Equations

Linear Equations are written in the form: _____
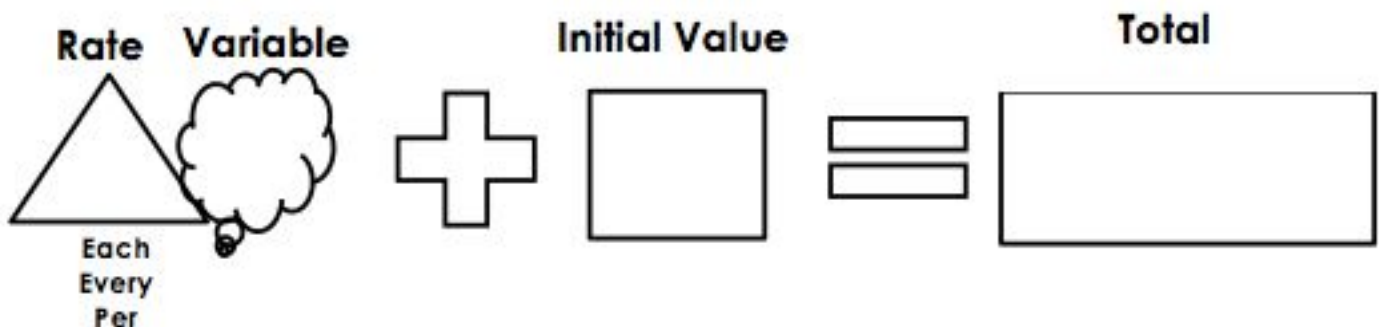
    a.) **y**, **m**, and **b** represent _____

    b.) **x** remains as a variable and represents the _____

    c.) When graphed, linear equations from a _____ line

       because a constant amount if either being added or subtracted.

Steps:

    1. _____

    2. _____
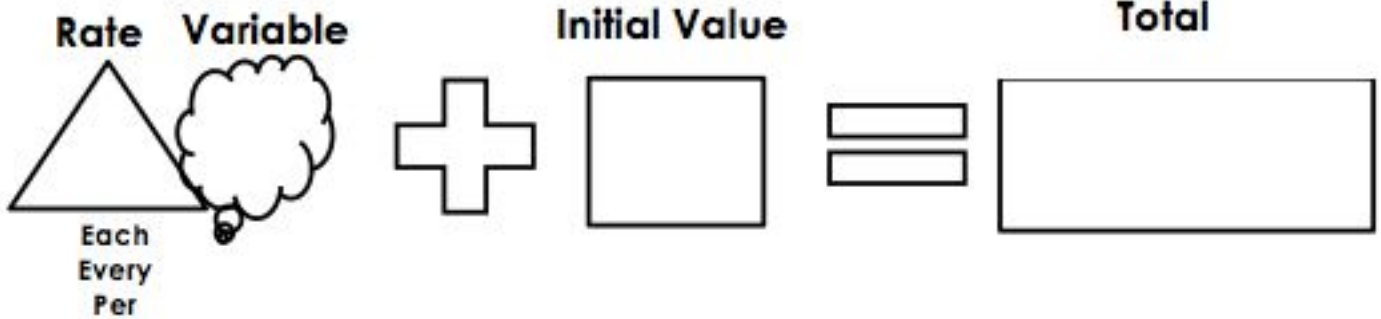
    3. _____

    4. _____

Examples:

Example 1: Samuel has $1900 in the bank. He wishes to increase his account to a total of $2500 by depositing $30 per week from his paycheck. Write and solve an equation to find how many weeks he needs to save in order to reach his goal.
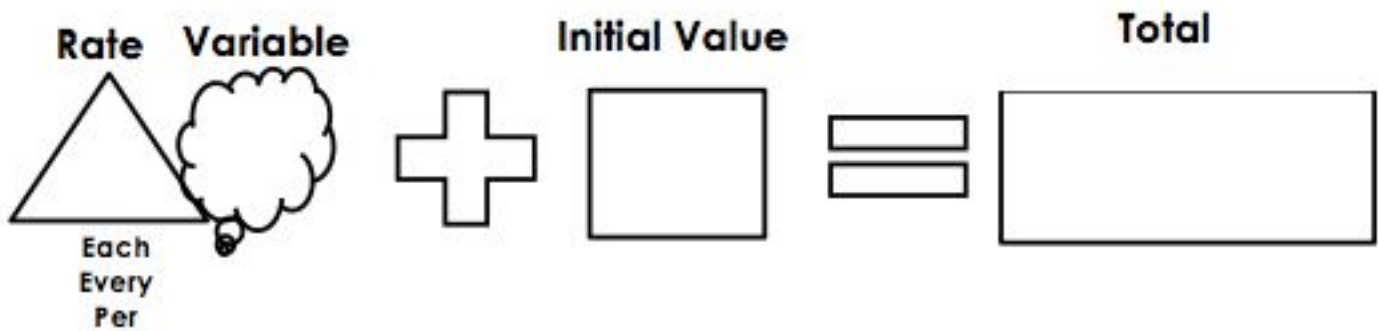
Example 2: The Pet Supply Store has the following items for sale listed in the table to the right. Caroline spent $68.00. She purchased a leash and some t-shirts. How many t-shirts was she able to purchase?

Item	Cost
Collar	$4.50
Chew Bone	$3.00
Doggy T-Shirt	$6.25
Leash	$5.50
Frisbee	$3.25

Rate Variable   **Initial Value**   **Total**

Each
Every
Per

Your Turn #1: A cell phone plan costs $39.95 plus $0.35 per minute. If your bill costs $69.70, how many minutes were used throughout the month?

Rate Variable		Initial Value		Total
△☁	✚	▢	⚏	▭
Each Every Per				

Your Turn #2: Casey has a small business making dessert baskets. She estimates that her fixed weekly costs for rent and electricity are $200. The ingredients for one dessert basket cost $2.50. If Casey made 40 baskets this past week, what were her total weekly costs? Her total costs for the week before were $562.50. How many dessert baskets did she make the week before?

Rate Variable		Initial Value		Total
△☁	✚	▢	⚏	▭
Each Every Per				