PERCENTS ARE A PART OF OUR LIVES!

Your Name:_____

Partner #1: _____

Partner #2:_____

Partner #3:_____

Part I Directions: Working as a group, complete the following table of equivalent forms of fractions, decimals and percents.

FRACTION	DECIMAL	PERCENT
	0.3	
		40%
$\frac{1}{4}$		
	0.07	
$\frac{7}{8}$		
		16%
	1.25	
		8%

Part II Directions: Working as a group, complete the following table and find the missing discount amounts. As an example, if a store takes 25% off of an original price of \$80, this would be equivalent to $0.25 \cdot 80$ = a discount amount of \$20 or \$20 off the original price.

Percent	Original Price	Discount Amount
30%	\$80	$0.30 \cdot 80 = \$24$
50%	\$110	
75%	\$120	
3%	\$400	
25%	\$88	
55%	\$135	

Using the idea that percent multiplied by the original price (usually called the base) is equal to the amount, we develop

The Peanut Butter = Apple Formula!

$$P \cdot B = A$$

There are three basic types of percent problems that can be solved using the Peanut Butter = Apple Formula.

Question	Given	Peanut Butter = Apple Formula
P percent of B is what?	P and B	Solve for A.
P percent of what is A?	A and P	Solve for B.
What percent of B is A?	A and B	Solve for P.

For example, we can solve "25% of what is 20?" using $P \cdot B = A$ in the following manner.

Let B = the base

We know P = 25% = 0.25 and A = 20

$$P \cdot B = A$$

$$0.25B = 20$$

$$\frac{0.25B}{0.25} = \frac{20}{0.25}$$

$$B = 80$$

Part III Directions: Working as a group, solve the following problems using the Peanut Butter = Apple Formula!

A) 60% of 88 is what?

B) 40% of what is 80?

C) 46 is what percent of 50?

D) Suppose that the local sales tax is 9% and you buy a scientific calculator for $17. How much tax is due? What is the scientific calculator's total cost?

E) A computer with an original price of $900 is on sale at 15% off. What is the discount amount? What is the computer's sale price?