Date: _____

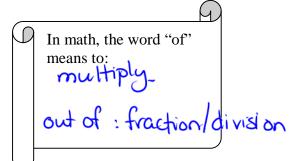
$$50\% = \frac{1}{2}$$
 $\div 2$
 $10\% = \frac{1}{10}$ $\div 10$

4.3 Percent of a Number

What are some places where finding the percent of a number may be useful?

commission for salespeople

Shopping: sales/discounts/faxes

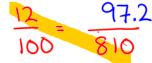


Use mental math to determine each of the following:

12% of 810

Steps to finding the percent of a number:

method 1



find out 1% then multiply.

$$12 \times \frac{810}{100} = \frac{97.2}{100}$$

method 3

convert % → decimal multiply.

.12×810=97.2

Find the following percentages:

$$\frac{63}{100} = \frac{70.56}{112}$$

150% of 6

0.23% of 45

$$\frac{.23}{100} = 6.0023$$

Word Examples.

Now that they are 25, Larry and Svetlana are allowed to date. Larry took Svetlana out for a very nice dinner at the very expensive "Let's Hold Hands" restaurant. After some nice conversation and dinner, the bill came to \$93.22. Larry was scared to look as he was unsure of how much to tip the server. It is customary to tip a server 15%, but he forgot his calculator in the car. Help Larry use mental math to determine how much of a tip to leave.

$$15\%$$
 of 93.22
 $96 < 93.22 < 100$
 10% of $90 = 9$
 $13.50 < 15$
 5% of $90 = 4.50$
tip is approx \$14

The annual Tsawwassen lottery usually sells 575 tickets.

What is your chance of winning if you purchase 1 ticket?

$$\frac{1}{575} = 1.575 \times 100\% = 0.174\%.$$

How many tickets would you need to buy for a 8% chance of winning?

② You need 8% of all tickets
$$8\%$$
 of 575 $\times 8 = 46$ tickets.