MULTIPLYING DECIMALS BY 10's

EXAMPLE #1

 $4.56 \times 10 = 4.5.6 = 45.6$

10 HAS ONE ZERO, WHICH TELLS YOU TO MOVE THE DECIMAL ONE PLACE TO THE **RIGHT**

DON'T NEED THE DECIMAL AT THE END

EXAMPLE #2

HAVE TO ADD 0'S

 $47 \times 100 = 47.00 = 4.700$

100 HAS TWO ZEROS, WHICH TELLS YOU TO MOVE THE DECIMAL TWO PLACES TO THE RIGHT

55.2

BUT THERE IS NO DECIMAL IN SIGHT. IF YOU CAN'T SEE IT, IT'S ONE THE RIGHT.

12.5

DO YOU SEE THE NUMBERS GETTING BIGGER WHEN YOU MOVE THE DECIMAL TO THE RIGHT?

0.125

MULTIPLY.

MULTIPLY.

$$0.14 \times 100 = 14$$

2 ZEROS, SO MOVE THE DECIMAL 2 PLACES

$$8.265 \times 10 = 82.65$$

2.2

5.52

10

X

100

X

$$5$$
 \times $100 = 5.00.$

IF IT'S NOT IN SIGHT, IT'S ON THE RIGHT.

NOW TRY THESE.

$$6.2865 \times 10,000 = \underline{62865}$$

$$7.635 \times 1000 = 7635$$

$$2.296 \times 100 = 229.6$$

$$12.57 \times 1000 = 12570$$

DIVIDING DECIMALS BY 10'S

DIVISION IS THE SAME AS MULTIPLICATION, BUT YOU MOVE THE DECIMAL IN THE OPPOSITE DIRECTION

EXAMPLE #1

$$65.2 \div 10 = 6.5$$
. $2 = 6.52$

= 430

10 HAS ONE ZERO, WHICH TELLS YOU TO MOVE THE DECIMAL ONE PLACE TO THE **LEFT**

EXAMPLE #2

100 HAS TWO ZEROS. WHICH TELLS YOU TO MOVE THE DECIMAL TWO PLACES TO THE **LEFT**

$$\frac{5.6}{2.1}$$
 = .5.6

REMEMBER, IF THERE'S NO DECIMAL, IT'S ON THE RIGHT.

DO YOU SEE THE NUMBERS GETTING SMALLER WHEN YOU MOVE THE DECIMAL TO THE LEFT?

DIVIDE

DECIMAL 2 PLACES

$$48.2 \quad \stackrel{\bullet}{\bullet} \quad 100 \quad = 0.482$$

$$82.12 \div 10 = 8.212$$

NOW TRY THESE.

$$0.008 \quad \stackrel{\bullet}{\longrightarrow} \quad 1000 = 0.000008 \quad 62 \quad \stackrel{\bullet}{\longrightarrow} \quad 10,000 = \underline{0.0062}$$

$$0.001$$
 $\frac{\bullet}{\bullet}$ $10 = 0.0001$

$$154.852 \div 10,000 = 0.0154852 \ 8.4 \div 100 = 0.084$$