

Name: _____ Per _____
Mrs. Doolan/Math6

10-10 Converting Decimals, Percents and Fractions



Objective: You've learned what a percent is and how to solve for a percent of a number. Now it is time to learn to convert decimals ↔ percents ↔ fractions. Today we'll learn how to convert decimals and percents to each other and to fractions in simplest form.

Converting a decimal to a percent:

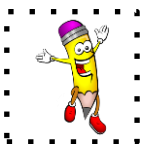


Step 1: Multiply your *hundredths* decimal value by 100 to convert into a percent and



Step #2: Attach a percent symbol.

(This is the same thing as moving the decimal point two place to the right (signifies multiplying by 100) to convert your decimal value into a percent and then attaching the percent symbol.)



Ex: $0.45 = 45\%$

Ex: 0.07

Ex: 0.9

Ex: 0.38

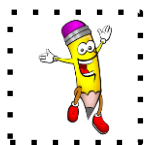
Converting a percent to a decimal:



Step 1: Divide your *percent* by 100 to convert into a decimal number and

Step #2: Drop the percent symbol.

(This is the same thing as moving the decimal point two place to the left (signifies dividing by 100) to convert your percent value into a decimal and then dropping the percent symbol.)



Ex: $66\% = .66$

Ex: $111\% = 1.11$

Ex: $5\% =$

Ex: $28\% =$

Converting a decimal to a fraction:



Step #1: Rewrite the digits of the decimal as the numerator.

Step #2: Write the denominator equal to the place value of the decimal number.

Step #3: Be sure to simplify if possible.



$$\text{Ex: } 0.32 = \frac{32}{100} = \frac{32 \div 4}{100 \div 4} = \frac{8}{25}$$

$$\text{Ex: } 0.775$$

$$\text{Ex: } 0.62$$

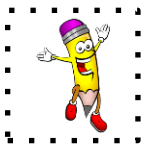
$$\text{Ex: } 2.35$$

Converting a percent to a fraction:

Step #1: Rewrite the digits of the percent as the numerator.

Step #2: Write the denominator as 100.

Step #3: Be sure to simplify if possible.



$$\text{Ex: } 20\% = \frac{20}{100} = \frac{20 \div 20}{100 \div 20} = \frac{1}{5}$$

$$\text{Ex: } 13\%$$

$$\text{Ex: } 75\%$$

$$\text{Ex: } 125\%$$