

PERCENTS: Help

How to turn a fraction into a percent

First turn it into a decimal by dividing (see [How to Turn a Fraction into a Decimal](#)), then move the decimal place to the right two places (as if you were multiplying by 100).

Example 1:

$$2/15 = 2 \div 15 = 0.133333 = 13.3\%$$

$$\text{Example 2: } 5/4 = 1.25 = 125\%$$

How to find the percent of any number

First turn the percent into a decimal by moving the decimal point to the left two places (as if you were dividing by 100). Then multiply the number by the decimal.

$$\text{Example: } 14\% \text{ of } 175 = 0.14 * 175 = 24.5$$

How to find the percent represented by two numbers

Turn the numbers into a part/whole ratio. Then treat the ratio as a fraction and turn it into a percent as described about.

$$\text{Example: } 3 \text{ is what percent of } 20? \text{ The ratio is } 3/20, \text{ so divide } 3 \div 20 = .15 = 15\%$$

How to find the whole when you have the percent and the part

Use fact families.

Example: Suppose you wanted to know what number 6 is 20% of? Another way to say that is:

20% of what number is 6

Turn that into a multiplication problem where you know the product but not one of the factors:

$$0.20 * \underline{\quad} = 6$$

You can figure out the unknown quantity by dividing 6 by 0.20

$$6 \div 0.20 = 30$$

So 20% of 30 is 6.