

Fractions, Decimals, and Percentage

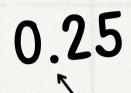
These are 3 different ways to express parts of a whole. Fractions, decimals, and percentages relate to each other.



Fractions

- represents the <u>ratio</u> of the number of parts to a whole
- used to express portion of foods and describe time (half hour, quarter hour)

numerator $\rightarrow 1$ denominator $\rightarrow 4$



decimal point

Decimals

- a way to express fractions whose denominator are powers of 10.
- can be seen on currencies, and measuring devices





- describes the ratio of a part to a hundred
- often used in telling discounts, and phone battery status

25%

percent sign

How to rewrite fractions, decimals, and percentages

Fractions ---> Decimal ---> Percentage

[Divide numerator by denominator]

[Multiply by 100, put %]

 $\frac{2}{5} \longrightarrow_{[2\div5]} 0.4 \longrightarrow_{[0.4 \times 100]} 40\%$



Percentage ---

Decimal

→ Fractions

[Divide by 100, remove the %]

[the number to the right of the decimal is the numerator and a power of 10 on the denominator, then simplify/reduce]

 $65\% \xrightarrow{[65 \div 100]} 0.65 \xrightarrow{\frac{65}{100}} \frac{13}{20}$

Tip: Count the decimal places. that will be the number of zeroes here!