

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



numerator → $\frac{1}{4}$
denominator →

0.25

↑
decimal point

Decimals

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



Percentage

- 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 %]

$$\frac{2}{5} \xrightarrow{[2 \div 5]} 0.4 \xrightarrow{[0.4 \times 100]} 40\%$$



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!

