Learning Objectives:
Be able to add and subtract decimals
Be able to multiply decimals
Be able to divide decimals
Know that multiplying or dividing by 10 simply means you're moving the decimal point one place to the left or right

eg. $1.3 + 2.4$

$$\begin{array}{r} 1.3 \\ +\ 2.4 \\ \hline 3.7 \end{array}$$

$1.2 + 13.8$

$$\begin{array}{r} 1.2 \\ +\ 13.8 \\ \hline 15.0 \\ \hline 1 \end{array}$$

$13.12 + 247.06$

$$\begin{array}{r} 13.12 \\ +247.06 \\ \hline 260.18 \\ \hline 1 \end{array}$$

eg $9.7 - 2.86$

$$\begin{array}{r} {\scriptstyle 8}\ {\scriptstyle 16}\ {\scriptstyle 1} \\ 9.7\,\cancel{1}\,{\scriptstyle 0} \\ -\ 2.86 \\ \hline 6.84 \end{array}$$

Multiplying and dividing by 10, 100, 1000 ...

x →

eg1 27.36×10

1 zero ... move 1 place

$27.36 = 273.6$

eg2 372.4639×100 → 2

$= 37246.39$

eg3 $936.24 \div 100$ ← 2

$= 9.3624$

eg4 92×100 → 2

$= 92.00.$

$= 9200$

eg5 $.000.37 \div 1000$ ← 3

$= 0.00037$

Multiplying decimals

eg 2.57×3

$= 7.71$

$$\begin{array}{r} 2\ 57 \\ \times\quad 3 \\ \hline 7.71 \\ \hline 1\ \ 2 \end{array}$$

↓ 1 ↑

x 100

$257 \times 3 = 771$ ÷ 100

eg 2 4.13×9.6

$4.13 \times 9.6 = 39.648$

413×96

$2478 + 37170 = 39648$

3 ÷ 1000

eg $35.756 \div 4$

$$4 \overline{)35.756} = 8.939$$

eg $64.137 \div 0.03$

$0.03 \times 100 = 3$

$64.137 \times 100 = 6413.7$

$6413.7 \div 3$

$$3 \overline{)6413.7} = 2137.9$$

Whole number