$2 / 5=$
$1 / 10=$
$3 / 4=$

$$
1 / 4=
$$

$$
6 / 10=
$$

$$
4 / 5=
$$

$$
2 / 20=
$$

$$
2 / 4=
$$

10\%
25\%
5\% 20\%
7\%
30\%
74\%


## To recognise types of

 triangles

## EQUILATERAL TRIANGLE

All 3 Sides are equal in Length


## All 3 interior angles are the same

## ISOSCEIES TRIANGLE



Two interior angles are the same


## SCAIENE TRIANGLE

## No Sides of equal Length

All interior angles are different

## RIGHT ANGLED

Right-Angled Triangles can be either isosceles or scalene tríangles

How many degrees They have an Interior angle of 90 are the other two



Isosceles Right Angled Triangle


## USING A PIECE OF ELASTIC SHOW ME THE FOLLOWING TRIANCLES


:


## USING YOUR MINI WHITEBOARDS DRAW ME THE FOLLOWING TRIANCLES...




Draw a tríangle and extend one line like above. Mark your angles $a, b, c$ and $x$.
Measure all the angles.
Repeat with a different triangle can you wríte a rule?

## Convert fractions to decímals.


$2 / 5=$
$1 / 10=$
$3 / 4=$

$$
1 / 4=
$$

$$
6 / 10=
$$

$$
4 / 5=
$$

$$
2 / 20=
$$

$$
2 / 4=
$$

0.10
0.5
0.25
0.20
0.63
0.75
0.40
0.4


## To identify and know the properties of various quadrilaterals.




* These type of lines stay the same distance apart for their whole length. They do not need to be the same length

* A line is perpendicular to another line if they meet at 90 degrees.



## DOLYGDNS



Two-dimensional shapes that have sides made from straight lines.

* E.g. triangles
squares
hexagons


## QUADIRILATERRALS

## 4 vertices



## QUADIRILATERAISS



## QUADIRILATERAIS

*The sum of all the angles equals $360^{\circ}$ degrees.


## DWHATS TITHE AABSSENG ANGRED




## DWHATS TITHE AABSSING ANGEED


$65^{\circ}$
65
$115^{\circ}$ $\frac{?}{360^{\circ}}$

## TRAADEZZUUAS



Discuss the properties of a trapezium with your partner.


One pair of opposite sides are parallel

## DARAIIELDGRAA



## DARAMIELDGRAAA



- Opposite sides are equal
- Opposite sides are parallel
- Opposite angles are equal


## RUHOALBUS

# Discuss the properties of the rhombus with your partner 

## RHODAOBUS



All sides are equal
Opposite sides are parallel
Opposite angles are equal

## RECTANGLIE

How many properties belonging to the rectangle can you find?


Opposite sides are equal
Opposite sides are parallel
All angles are right angles $\left(90^{\circ}\right)$

## SQUARE



## SQUARE



All sides are equal
Opposite sides are parallel
All angles are right angles ( $90^{\circ}$ )

## NAAAE TPHE

## QUADDRERATERAI


rectangle

irregular

rhombus

square

## earning Objective

Convert larger to smaller units
of length and vice versa: $m$ to $\mathrm{km} ; \mathrm{cm}$ or mm to m .


## We use different metric units to

## measure :~



## Weight



We can use our knowledge of multiplying and dividing by 10,100 or 1000 to change or convert measurements in one unit to measurements in another unit.

We are going to use our knowledge about multiplying and dividing by 100 to convert centimetres to metres and to convert metres to centimetres.


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-

| $H$ | T | U | $\bullet$ th | hth | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{4}$ | 2 | $7 \bullet 0$ | 0 | 0 | 0 |

When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-


When we change from cm to m we divide by:-


## Remember!

When we divide by 100 the units move two places to the right.

This is how we change 427cm into metres:-

| $H$ | T | U | $\bullet$ th | hth | th |
| :--- | :--- | :--- | :--- | :---: | :---: |
|  |  | 4 | $\bullet$ | 2 | 7 |

## Therefore:-

$427 \mathrm{~cm}=4.27 \mathrm{~m}$
cm

| H | T | U | h | h th |
| :---: | :---: | :---: | :---: | :---: |
| 3 | 2 | $6{ }^{\circ}$ |  |  |


| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 4 | 7 | 6 |  |  |


| H | T | U | t | h | th |
| :--- | :--- | :--- | :--- | :--- | :--- |
| 1 | 6 | 5 | 3 |  |  |

$\div 100$
m

| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 3 | 2 | 6 |  |

$\div 100$
$\div 100$

| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | 0 | 4 | 4 |

## Convert from centimetres to metres

## 354 cm

15.4 cm
3.54 m
0.154 m
7.79 m
0.524 m 9.39 m
3.95m
25.8 cm

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-

$$
3.51 \mathrm{~m}=
$$

| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 3 | 5 | 1 |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-

$$
3.51 \mathrm{~m}=
$$

| H | T | J | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 3 | 5 | 1 |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-

$$
3.51 \mathrm{~m}=
$$

| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 3 |  | 5 | 1 |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-

$$
3.51 \mathrm{~m}=
$$

| H | T | U | t | h | th |
| :--- | :--- | :--- | :--- | :--- | :--- |
| 3 |  |  | 5 | 1 |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-

$$
3.51 \mathrm{~m}=
$$

| H | T | U | t | h |
| :---: | :---: | ---: | ---: | ---: |
| 3 |  | th |  |  |
|  | 5 | 1 |  |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-
$3.51 \mathrm{~m}=$

| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 3 |  | 5 |  | 1 |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-
$3.51 \mathrm{~m}=$

| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 3 | 5 |  |  | 1 |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-

$$
3.51 \mathrm{~m}=
$$

| $H$ | $T$ | $U$ | t | C | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 3 | 5 |  |  | 1 |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-
$3.51 \mathrm{~m}=$

| H | T | U | t | h |
| :---: | :---: | ---: | :---: | :---: |
| 3 | 5 | th |  |  |
|  | 1 |  |  |  |

To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-
$3.51 \mathrm{~m}=$


To change from metres to centimetres we MULTIPLY BY 100. REMEMBER

When we multiply by 100 we move each digit two places to the left:-

$$
3.51 \mathrm{~m}=351 \mathrm{~cm}
$$

| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 3 | 5 | 1 |  |  |  |

Try changing these measurements in metres into centimetres

## 5.4 m 6.2 m 12.7 m 3m 7.6 m 0.54 m 0.3 m

We are going to use our knowledge about multiplying and dividing by 1000 to convert metres and kilometres to convert kilometres to metres.

## When we change from m to km we divide by:-



## Remember!

When we divide by 1000 the units move three places to the right.

This is how we change 7427m into kilometres:-

| Th | H | T | $\mathrm{U} \bullet$ th | hth | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{7}$ | $\mathbf{4}$ | $\mathbf{2}$ | $\mathbf{7} \bullet 0$ | $\mathbf{0}$ | $\mathbf{0}$ |

$$
\div 1000
$$

5420 m 1620 m 1270 m 300 m

$$
\div 1000
$$

54 m 30 m

## To change from Kilometres to metres we MULTIPLY BY 1000.

 REMEMBERWhen we multiply by 1000 we move each digit three places to the left:-

3km =

| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 3 | 0 | 0 |  |

## 54km

 16km 12 km 351 km$$
\times 1000
$$

54km 3 km

## Learning Objective

Convertlargert to smaller units of weightand vice versa.


When we change from g to kg we divide by:-


## Remember!



When we divide by 1000 the units move three places to the right.

This is how we change 7427 g into kilograms:-

| Th | H | T | $\mathrm{U} \bullet$ th | hth | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{7}$ | $\mathbf{4}$ | $\mathbf{2}$ | $\mathbf{7} \bullet 0$ | 0 | 0 |

$$
\div 1000
$$

## 5420g 1620 g 12870 g 700 g

$$
\div 1000
$$

## To change from Kilograms to grams we MULTIPLY BY 1000.

 REMEMBERWhen we multiply by 1000 we move each digit three places to the left:-
$4 \mathrm{~kg}=$


| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 4 | 0 | 0 |  |

## 94kg 86kg 52 kg 361kg $\times 1000$ 120kg 34 kg 3kg

When we change from kg to tonnes we divide by:-


## Remember!



When we divide by 1000 the units move three places to the right.

This is how we change 1435kg into tonnes:-

| Th | H | T | $\mathrm{U} \bullet$ th | hth | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{1}$ | $\mathbf{4}$ | $\mathbf{3}$ | $5 \bullet 0$ | 0 | 0 |

$$
\div 1000
$$

To change from tonnes to kilograms we MULTIPLY BY 1000. REMEMBER

When we multiply by 1000 we move each digit three places to the left:-

$$
7 \text { tonnes = }
$$



| H | T | U | t | h | th |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 7 | 0 | 0 |  |

## earning Objective

Know rough equivalents of 1 b and $k g$, ozand miles and km and pints or gallons and litres.



## Imperial Units

 What do we know about them already?
## Ever heard of...

## * Quarts *Pints *Gallons <br> Stones Miles <br> Yards

 *OuncesFeet
Inches *Pounds
*Fluid
Ounces



## 6 inch or foot-long subs




## Dominoes uses imperial units too!

Pizza sizes:
Small - 9.5"
Medium ~ 11.5"
Large ~ 13.5"


## How to read a ruler in meshes or cm

\section*{| $\|n\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\|\mid$ |
| :--- | 1}

## 

## Remember...

## *There are 12 inches in one foot

 *There are 36 inches in one yard SO...*How many feet are in one yard?


## How many grams in $10 z ?$

## 1 kg is about 2.2 lb 16 oz in 1 lb

You may use a calculator


1 oz is about 30 g .

