## Vern Diagram



Rombus
Rectangle

Quadrilateral Parallelogram

Square
Trapezoid


Complete the sentences by writing always, sometimes, or never.

A rhombus is $\qquad$ a square.

A parallelogram is $\qquad$ a rectangle.

A rhombus is $\qquad$ a parallelogram.

A trapezoid is $\qquad$ a parallelogram.
$\qquad$ a rhombus.

True or False???
A parallelogram is never a square.
Why or why not?

A square is always a rectangle.
Why or why not?

A rhombus is never a square.
Why or why not?

A trapezoid is parallelogram.
Why or why not?

A parallelogram has one set of opposite sides.
Why or why not?

A rectangle has four right angles.
Why or why not?

A rhombus always has four equal sides.
Why or why not?

The sum of the interior angles of a quadrilateral is $180^{\circ}$.
Why or why not?

## Classification of Triangles

Equilateral, Isosceles and Scalene
There are three special names given to triangles that tell how many sides (or angles) are equal.

$\left.$| Equilateral Triangle |
| :--- | :--- |
| Three equal sides |
| Three equal angles, always $60^{\circ}$ |$\quad$| Isosceles Triangle |
| :--- |
| Two equal sides |
| Two equal angles | \right\rvert\, | Scalene Triangle |
| :--- |
| No equal sides |
| No equal angles |

## What Type of Angle?

Triangles can also have names that tell you what type of angle is inside:


Draw the type of triangle described by the lengths of its sides and by the measures of its angles.
Use a ruler.


## Polygons

What is a polygon?

What is a regular polygon?

Types of polygons:

| Name | Number of Sides |
| :---: | :---: |
| Triangle |  |
| Quadrilateral |  |
| Pentagon |  |
| Hexagon |  |
| Heptagon |  |
| Octagon |  |
| Nonagon |  |
| Decagon |  |

Other Geometry Words to Know
Draw an example of the following words:

| Name | Symbol | Definition or Example |
| :---: | :---: | :---: |
| Parallel |  |  |
| Perpendicular |  |  |
| Intersecting |  |  |
| Congruent |  |  |
| Angle |  |  |
|  |  |  |

