Curves

A **curve** is a continuous, flowing line that does not have sharp corners. It can be straight, wavy, open, or closed.

Examples:

- A river path
- A circle or oval shape
- A curved road

Types of Curves





1. Open Curve

A curve that does not enclose a space.

Example: A U-shape or a wave.

2. Closed Curve

A curve that forms a complete loop and encloses space.

Example: A circle, oval, or heart shape.

3. Simple Curve

A curve that does not cross itself.

Example: A smooth "S" shape.

4. Non-Simple Curve

A curve that crosses itself.

Example: A scribbled line.

5. Plane Curve

A curve drawn on a flat surface (2D).

Example: A drawing of a circle on paper.









6. Space Curve

A curve that extends in 3D space.

Example: A spiral spring.

Properties of Curves



- i. A curve is a continuous and smooth flowing path.
- ii. A simple curve does not intersect itself, while a non-simple curve may cross over.
- iii. A closed curve forms a complete shape, while an open curve does not.
- iv. Circles, ellipses, and polygons are examples of closed curves.
- v. A wavy road or a snake's movement is an example of an open curve.