Diffusion = Net movement of molecules from a region of high concentration to a region of low concentration down a concentration gradient

Osmosis = Net movement of **water particles (Less concentrated)** from a region of **high-water potential** to a region of **low water potential (More concentrated)** through a **semi permeable membrane**

Hypotonic = When a solution/cell has a higher water potential than another solution (less dilute) **such as distilled water**

Hypertonic = When a solution/cell has a lower water potential than another solution (more dilute) **such as salt water**

Isotonic = When a solution/cell has the same water potential as another solution

Plasmolyzed: Plasmolysis is the process in which cells lose water in a hypertonic solution

---

Animal cells cannot be plasmolyzed when put in a **hypertonic** solution as they don't have a cell wall

In a **Hypertonic solution**, **Animal cells** shrink due to the water inside the cell moving into the **hypertonic solution** to even out the water potentials

Animal cells will **burst** in a **hypotonic solution** as they don't have a cell wall to keep them **turgid** (swollen)

Plant cells will wilt **(flaccid)** and become **plasmolyzed** in a hypertonic solution as the cell peels away from the cell wall and crumples in on itself

Plant cells will become **turgid** when put in a **hypotonic solution** as the **vacuole receives water from the solution and expands**, pushing the rest of the cell towards the cell wall which keeps the cell turgid.