

Chapter Overview:

Topics to be Covered:

- The Fundamental Unit of Life: Cell
- What is a Cell Made Up of? What is the Structural Organization of a Cell?
- Cell Theory
- Prokaryotic and Eukaryotic Cell
- Structure of Cell
- Plasma Membrane
- Cell Wall
- Nucleus
- Cell Division (Mitosis and Meiosis)

Movement Across Cell Membrane

• 1. Diffusion

"A spontaneous movement of molecules from a region of high concentration to lower concentration."

- Rate of diffusion -

Gases > Liquids > Solids

- Shown by small size substances

Examples: ions/molecules, CO₂, Oxygen, Water

- Due to cellular activities, CO₂ production takes place.
- Concentration of CO₂ inside cell > Concentration of CO₂ in external environment
- CO₂ leaves the cell through diffusion

Parts of Cell : Cytoplasm

- Parts between plasma membrane and nuclear envelope.
- Cytosol – Aqueous ground substance of cytoplasm
- Cell organelles are present in cytosol.

