

Important terms in Biology for NEET I

- DNA: Deoxyribonucleic acid, a molecule that carries genetic information.
- RNA: Ribonucleic acid, a molecule that plays a key role in protein synthesis.
- Protein: A macromolecule made up of amino acids that carries out a variety of functions in the cell.
- Enzyme: A type of protein that catalyzes chemical reactions in the cell.
- Cell membrane: The thin, flexible layer that surrounds all cells and regulates the movement of molecules in and out of the cell.
- Mitosis: The process by which a single cell divides into two identical daughter cells.
- Meiosis: The process by which cells divide to produce gametes (sperm and eggs), each with half the number of chromosomes as the parent cell.
- Gene: A segment of DNA that codes for a specific protein or trait.
- Allele: One of two or more alternative forms of a gene.
- Mutation: A change in the DNA sequence that can result in altered gene function or the creation of new alleles.
- Natural selection: The process by which individuals with advantageous traits are more likely to survive and reproduce, leading to the evolution of populations over time.
- Adaptation: A trait or characteristic that increases an organism's fitness in its environment.
- Photosynthesis: The process by which green plants convert sunlight into energy in the form of organic compounds.
- Cellular respiration: The process by which cells convert organic compounds into energy in the form of ATP.
- Ecosystem: A community of living and non-living things that interact with each other and their environment.
- Homeostasis: The ability of organisms to maintain a stable internal environment in the face of changing external conditions.
- Evolution: The process by which species change over time as a result of genetic variation and natural selection.
- Ecology: The study of the interactions between living organisms and their environment.
- Biotechnology: The use of living organisms or their products to develop new products or processes.
- Epidemiology: The study of the distribution and determinants of health and disease in populations.

- Chromosome: A structure made of DNA and protein that carries genetic information.
- Cytoplasm: The gel-like substance inside a cell that contains organelles and other cell components.
- Organelle: A specialized structure within a cell that performs a specific function.
- Nucleus: The control center of a cell that contains the cell's DNA.
- Ribosome: The site of protein synthesis in a cell.
- Mitochondria: The organelles responsible for producing ATP through cellular respiration.
- Chloroplast: The organelles in plant cells responsible for photosynthesis.
- Cytoskeleton: The network of protein filaments that give a cell its shape and allow for movement.
- Endoplasmic reticulum: A network of membranes in the cytoplasm that is involved in protein and lipid synthesis.
- Golgi apparatus: An organelle that modifies, sorts, and packages proteins for secretion or transport.
- Lysosome: An organelle that contains enzymes for breaking down and recycling cellular waste.
- Vacuole: A membrane-bound organelle that stores materials such as water, nutrients, and waste products.
- ATP: Adenosine triphosphate, the molecule that carries energy within cells.
- Aerobic respiration: The process of producing ATP in the presence of oxygen.
- Anaerobic respiration: The process of producing ATP in the absence of oxygen.