

Generated Question Paper

Question 1

- Biology Exam
- Instructions:
 - Choose the best answer for each question.
 - Each question carries equal marks.
 - Do not leave any question blank.
 - Read the questions carefully before answering.
- Section A: Multiple Choice Questions
 - 1. What is the primary function of the mitochondria in a cell?
 - a) To synthesize proteins
 - b) To store genetic information
 - c) To generate energy in the form of ATP
 - d) To regulate cell growth and division
 - 2. Which of the following types of RNA is responsible for carrying amino acids to the ribosomes during protein synthesis?
 - a) Messenger RNA (mRNA)
 - b) Transfer RNA (tRNA)
 - c) Ribosomal RNA (rRNA)
 - d) Small nuclear RNA (snRNA)
 - 3. What is the term for the process by which water moves through a plant, from the roots to the leaves, and is then released into the air as water vapor?
 - a) Respiration
 - b) Photosynthesis
 - c) Transpiration
 - d) Evaporation
 - 4. Which of the following hormones is produced by the pancreas and plays a key role in regulating blood sugar levels?
 - a) Insulin
 - b) Glucagon
 - c) Adrenaline
 - d) Thyroxine
 - 5. What is the term for the process by which a cell becomes specialized to perform a specific function?
 - a) Differentiation
 - b) Mitosis
 - c) Meiosis
 - d) Osmosis
 - 6. Which of the following types of cells is responsible for producing antibodies in response to infection?
 - a) B cells
 - b) T cells

- c) Macrophages
- d) Neutrophils

• 7. What is the term for the process by which genetic information is passed from one generation to the next?

- a) Mutation
- b) Genetic drift
- c) Natural selection
- d) Heredity

• 8. Which of the following organs is responsible for filtering waste and excess fluids from the blood?

- a) Liver
- b) Kidneys
- c) Heart
- d) Lungs

• 9. What is the term for the process by which an organism's genetic information is altered by external factors, such as radiation or chemicals?

- a) Mutation
- b) Genetic drift
- c) Natural selection
- d) Genetic engineering

• 10. Which of the following types of biological molecules is composed of nucleotides?

- a) Carbohydrates
- b) Proteins
- c) Nucleic acids
- d) Lipids