



JAIN COLLEGE

463/465, 18th Main Road, SS Royal, 80 Feet Road, Rajarajeshwari Nagar,
Bangalore - 560 098

Date:

SUBJECT: BIOLOGY

**I PUC
MOCK**

Timings Allowed:

Total Marks: 70

Part-I

I. Answer the following in one word or one sentence each:-

10X1=10

1. Define species
2. Which group of animals passes pneumatic bones?
3. Expand ATP
4. Mention the function of pericardium
5. Write the energy currency of the cell.
6. Define solute potential
7. What is an actinomorphic flower?
8. Name the hormone that is secreted by pineal gland.
9. What is karyokinesis.
10. Which is the biggest exocrine gland in man?

Part B

II. Answer any five of the following questions in one or two sentences.

5X2=10

1. Write the four universal rules of binomial nomenclature.
2. Define placentation. Mention their types.
3. Name the four nitrogenous base of nucleic acid
4. Differentiate between open and closed type of vascular bundles.
5. Write any four characters of skeletal muscles.
6. Write the excretory organs of
 - a. Arthropods
 - b. Class Mammalia.
7. What are diploblastic animals? Name the phylum that exhibits diploblastic condition.
8. Give the meaning of the terms
 - a. Photoperiodism
 - b. Vernalisation

Part-C

III. Answer any five with 40-80 words

5X3=15

1. Who proposed five kingdom classification? Write the names of five kingdoms.
2. Write the schematic representation of nitrogen cycle.
3. Describe briefly the digestion of three types of food by the enzymes of pancreas
4. Sketch and label the structure of Mitochondria
5. Explain three phases of ultrafiltration.
6. What are chromosomes? Classify the Chromosomes based on position of centromere.
7. Briefly explain any three disorders of respiratory system.

8. Give the meaning of
- Antiport
 - Osmosis
 - Guttation

Part-D:- (Section I)

4X5=20

IV. Answer any 4

- Write five general characteristic features of bryophytes.
- Classify enzymes into five types based on types of reactions they catalyze
- Write the schematic representation of Glycolysis.
- Describe the mechanism of breathing
- Explain apoplastic & symplastic pathways of water movement in roots
- Draw a neat labelled diagram of nephron.

Part-D (Section II)

3X5=15

V. Answer any 3

- Discuss the economic importance of algae.
- Describe the characteristics features of family Fabaceae
- What is aestivation? Mention any four types with one example for each.
- What is ECG? Explain it with the graphical representation of a standard ECG
- Discuss the role of pancreatic hormones in regulation of blood glucose level.
