

A-1068

Total Pages : 03

Roll No. -----

MSCZO-507

Molecular Biology & Biotechnology

M.Sc. Zoology (MSCZO)

Examination 2026(Feb.)

Time: 2:00 hrs

Max. Marks: 70

Note: This paper is of Seventy (70) marks divided into two (02) Sections A and B. Attempt the questions contained in these sections according to the detailed instructions given therein. Candidates should limit their answers to the questions on the given answer sheet. No additional (B) answer sheet will be issued.

Section-A

(Long-Answer-Type Questions)

Note: Section 'A' contains Five (05) long-answer-type questions of Nineteen (19) marks each. Learners are required to answer any two (02) questions only.

[2x19=38]

P.T.O.

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- Q.1. Describe the enzymology of DNA replication.
- Q.2. Describe the mechanism of transcription.
- Q.3. Explain the process of Eukaryotic translation.
- Q.4. Explain in detail the Bacterial Artificial Chromosomes?
- Q.5. Describe the process of in vitro fertilization?

Section-B

(Short-Answer-Type Questions)

Note: Section 'B' contains Eight (08) short-answer-type questions of Eight (08) marks each. Learners are required to answer any Four (04) questions only.

[4x8=32]

- Q.1. What are post-translational modifications?
- Q.2. Explain the eukaryotic promoters.
- Q.3. What is virulence plasmids?
- Q.4. Explain the DNA fingerprinting.
- Q.5. What is embryo cloning?
- Q.6. Explain the human gene therapy?
- Q.7. What is Capping?

Q.8. Explain the genetic code.
