

15082

M.Sc. DEGREE EXAMINATION, OCTOBER/NOVEMBER 2019.

FIRST SEMESTER

Biotechnology

Paper II — BIOMOLECULES

Time : Three hours

Maximum : 75 marks

(No additional sheet will be supplied)

PART A — (5 × 3 = 15 marks)

Answer any FIVE questions.

Each question carries 3 marks.

Each answer should not exceed 1 page.

1. Pyrimidines
2. Melting Temperature
3. Vander Wal Forces
4. Hemicellulose
5. Biurette reaction
6. Fat soluble vitamins
7. Microbial toxins
8. Phenolics.

PART B — (4 × 15 = 60 marks)

Answer ALL questions.

Each question carries 15 marks.

Each answer should not exceed 6 pages.

9. Explain the double helical structure of DNA proposed by Watson and Crick.

Or

10. Explain the different types of RNAs involved in protein synthesis.

11. Outline the structure and functions of cellulose and starch.

Or

12. Write the classification of carbohydrates by giving suitable examples.

13. Write the classification and structures of various aminoacids.

Or

14. What are plant growth regulators and write their structure.

15. Explain the structure and biological functions of various pigments involved in photosynthesis.

Or

16. Write the structure and Biotechnological importance of antibiotics and alkaloids.

