B. Sc. DEGREE END SEMESTER EXAMINATION - MARCH 2025

SEMESTER 6 : ZOOLOGY

COURSE : 19U6CRZOO12 : GENERAL INFORMATICS, BIOINFORMATICS, BIOSTATISTICS AND RESEARCH METHODOLOGY

(For Regular 2022 Admission and Supplementary 2021/2020/2019 Admissions)

Time : Three Hours

Max. Marks: 60

PART A

Answer All (1 mark each)

- 1. What is GEN-SNiP?
- 2. Explain WAN.
- 3. What is statistical data?
- 4. What is INSDC stands for?
- 5. What is RAM?
- 6. What type of data are available from Genbank?
- 7. What is a mainframe computer?
- 8. What is EMBL stands for?

 $(1 \times 8 = 8)$

PART B

Answer any 6 (2 marks each)

- 9. What is the use of a scanning electron microscope?
- 10. What is Colloquium? How it is different from a Symposium.
- 11. What do you mean by positive and negative correlations?
- 12. What is the importance of knowing hydrophobicity of a protein?
- 13. Explain the use of Camera lucida.
- 14. Explain the Institutional framework of EMBL
- 15. Explain what is Molecular Simulation?
- 16. What is the difference between a graph and a diagram?

(2 x 6 = 12)

PART C Answer any 4 (4 marks each)

- 17. Explain the terms seminar, debate, workshop and conference.
- 18. Explain the optical parts of a compound light microscope.
- 19. Find Median

Thickness in	3	3.2	3.3	3.35	4	4.5
mm						
Frequency	10	15	16	17	20	22

- 20. Discuss about any two gene finding tools.
- 21. Explain the terms associated with molecular phylogeny?
- 22. Discuss the working of a phase contrast microscope.

(4 x 4 = 16)

PART D Answer any 2 (12 marks each)

23. Find Mode

Find Mode							
Plant height	15-20	20-2	5 25	-30	30-35	35-40	45-50
in m							
Frequency	10	20	2	22	14	18	8
Find standard deviation							
Size of	6	7	8	9	10	11	12

24.

Size of	6	/	8	9	10	
item						
Frequency	3	6	9	13	8	

25. Elaborate on any three seperation techniques you have studied.

26. Explain the procedure and format of application for a funded research project.

(12 x 2 = 24)

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