



QP CODE: 25050501



25050501

Reg No :

Name :

MSc DEGREE (CSS) EXAMINATION DECEMBER 2025

First Semester

M Sc ZOOLOGY

Core Courses - ZL010104 - BIOSTATISTICS AND RESEARCH METHODOLOGY

2019 Admission Onwards

92EFC9EE

Time: 3 Hours

Weightage: 30

Part A (Short Answer Questions)

Answer any **eight** questions.

Weight **1** each.

1. What is data interpretation and forecasting?
2. In correlation analysis dependent and independent variables can be interchanged, but the same cannot be done in regression analysis'. Justify the statement.
3. What is Student's t test ?
4. What is Lotka Volterra model?
5. Describe Applied research with an example.
6. Mention the factors influencing research formulation.
7. Mention the important concepts relating to research design.
8. What is the difference between seminars and conferences.
9. What is Endnote.
10. What are the different project funding agencies.

(8×1=8 weightage)

Part B (Short Essay/Problems)

Answer any **six** questions.

Weight **2** each.

11. Calculate median from the following data.

Marks	10-25	25-40	40-55	55-70	70-85	85-100
Frequency	6	20	44	26	3	1

12. What is the chance that a leap year selected at random will contain 53 Mondays.
13. What is chi square test? Discuss its significance?
14. Write a note on statistical softwares.





15. Explain the basic concepts of research. Mention the motivation for research.
16. What are Predictions and Explanations in Research formulation.
17. Write the differences between primary and secondary sources of information
18. Give an account on plagiarism.

(6×2=12 weightage)

Part C (Essay Type Questions)

Answer any **two** questions.

Weight 5 each.

19. The following data shows the number of poultry in 90 houses in a village. Calculate Mean deviation and Standard deviation.

Poultry	15-19	20-24	25-29	30-34	35-39	40-44	45-49	50-54	55-59	60-64	65-69
No. of Houses	6	14	12	10	10	9	9	10	5	4	1

20. Making use of data summarized below, calculate the correlation coefficient and comment on the nature of correlation.

Case:	A	B	C	D	E	F	G	H
X :	10	6	9	10	12	13	11	9
Y :	9	4	6	9	11	13	8	4

21. Describe in detail the development of a research plan using a case study.
22. What is a Scientific report? Briefly discuss the different types of report.

(2×5=10 weightage)

