

SEMESTER-III (Pool-B)

Course Title: Statistical Tools for Data Analysis

Nature of Course: Interdisciplinary

(CHOI-B27)

Number of Credit: 02

Maximum Marks 50

Course Objective: The Course introduces the students to collection and Presentation of data. It also discusses how data can be summarized and analysed for drawing statistical inferences. The students will be introduced to important data sources that are available.

Course Content:

Unit-I

Use and relevance of statistical methods. Collection and tabulation of data - primary and secondary data. Questionnaire and Schedule. Population census versus Sample surveys.

Unit-II

Basic Concepts of sampling- random and non-random sampling, simple random, stratified random and P.P.S. sampling.

Unit-III

Representation of data: diagrammatic and graphic. Frequency distribution.

Unit-IV

Measures of Central tendency: Arithmetic Mean, Mode, Median, Geometric Mean, Harmonic Mean.

Unit-V

Concept and measures of dispersion and Skewness. Simple Correlation, Karl Pearson and Rank Correlation.

Books Recommended:

- S.P. Gupta: Statistical Methods, Sultan Chand & Sons, New Delhi.
- Kailash Nath Nagar: Sankhiki Ke Mool Tatva (Hindi), Meenakshi Prakashan , Meerut.
- A.L. Nagar & R.K. Das : Basic Statistics, Oxford University Press, New Delhi.
- M.G. Speigal : Theory and Problems of Statistics, Mc Graw Hill Book Co. London.