

Course Title	Statistical Methodology (Quantitative Techniques)			Course Code	BST 32452		
Year	3	Semester	2	Credits	02	Theory (hr)	20
						Practical (hr)	20
						Independent Learning (hr)	20

Aim of the Course:

To provide the knowledge and skills on designing of an experiment / survey and analyze the data gathered using the standard statistical software packages

Intended Learning Outcomes:

After completion of this course, the learner should be able to:

- Design an experiment and/or survey methodically.
- Identify the most appreciate method/s available to collect and process different types of data.
- Analyze the data to get meaningful statistical outputs.
- Summarize and interpret the outputs from statistical analysis.

Course Capsule:

Theory
Basic concepts: definitions, treatment, factors, plots, blocks, precision, efficiency, replication, randomization; Complete Block Designs: Complete Randomized Design (CRD), Randomized Complete Block Design (RCBD), Latin Square Design (LSD); Factorial Designs; Response surface design; Designing of a survey; Probability and non-probability sampling techniques, sample size calculation questionnaire construction

Practical
Analysis of Complete Randomized Design (CRD), Randomized Complete Block Design (RCBD), Latin Square Design (LSD) using statistical packages; Analysis of Factorial Designs; Analysis Response surface design; Designing of a survey, questioner construction and data collection for a Case Study

Assessment:

Continuous assessment: 30%
 End semester assessment: 70%