

BACHELOR OF SCIENCES – B. Sc

I SEMESTER

BASIC STATISTICS – I

- **OUTCOMES:** Students will be able to
- CO1 Explains Organization and presentation of data
- CO2 Computational Univariate data analysis
- CO3 Computational Bivariate data analysis
- CO4 Describes Multivariate data analysis
- CO5 Computational Elements of probability

B.SC. MATHEMATICS – IV

- **OUTCOMES:** Students will be able to
- CO1 Explains Groups
- CO2 Computational Fourier Series
- CO3 Computational Differential Calculus
- CO4 Computational Continuity and differentiability
- CO5 Explains DIFFERENTIAL EQUATIONS -II



MATHEMATICS – I

- **OUTCOMES:** Students will be able to
- CO1 Explains Matrix and its Application
- CO2 Computational Group Theory
- CO3 Computational Differential Equation
- **CO4** Computational Calculus
- CO5 Explains Differential Calculus

BUSINESS ECONOMICS

- **OUTCOMES:** Students will be able to
- CO1 Describe the concepts of Basic Business and the tools used
- CO2 Explain the different demand concepts and its dynamics
- CO3 Explain the method of demand forecasting in markets
- CO4 Explain the various concepts of costs and supply
- CO5 Explain the concepts of Production



SEMESTER - II

MATHEMATICS – II

- OUTCOMES: Students will be able to
- CO1 Explains Group Theory
- CO2 Computational Differential Calculus
- CO3 Computational Integral Calculus
- CO4 Computational Linear equations, Bernoulli's equation.
- CO5 Explains Exact equations

BASIC STATISTICS – II

- **OUTCOMES:** Students will be able to
- CO1 Explains Random variables and expectation (Univariate)
- CO2 Computational Discrete probability distributions
- CO3 Computational Continuous probability distributions
- CO4 Computational Random variables and expectation (Bivariate)
- CO5 Explains Limit theorems



MANAGERIAL ECONOMICS

OUTCOMES: Students will be able to

CO1 Describe the concepts of decision making and practice different tools used for managerial decision

- CO2 Explain the different methods of price determination in different markets
- CO3 Explain the method of pricing
- CO4 Explain Dynamics of business cycle

SEMESTER III

MATHEMATICS – III

OUTCOMES: Students will be able to

- CO1 Explains Matrix and its Application
- CO2 Computational Group Theory
- CO3 Computational Differential Equation
- CO4 Computational Calculus
- CO5 Explains Differential Calculus



STATISTICAL INFERENCE -I

- **OUTCOMES:** Students will be able to
- CO1 Explains Sampling distributions
- CO2 Describes Point estimation
- CO3 Computational Methods of point estimation
- CO4 Computational Interval estimation
- **CO5** Explains Simulation

MONETARY ECONOMICS

- OUTCOMES: Students will be able to
- CO1 Describe money its uses functions and role
- CO2 Explain the factors determining supply and demand of money
- CO3 Explain the banking terms technology, and practices
- CO4 Explain about Central bank its policies and its effectiveness



SEMESTER IV

STATISTICAL INFERENCE – II

OUTCOMES: Students will be able to

CO1 Explains Introduction to tests of hypotheses

CO2 Computational: Tests of significance I

CO3 Computational: Tests of significance II

CO4 Computational: Nonparametric tests

CO5 Explains: Sequential tests

PUBLIC ECONOMICS

OUTCOMES: Students will be able to

CO1 Explain importance of public economics and principles governing maximum social advantage

CO2 Explain the different sources of public revenue, and methods to collect; tax and types

CO3 Explain Public expenditure and principles followed in public expenditure and contain public expenditure

CO4 Explain Public debt and causes of increase in public debt, and methods to repay public debt



SEMESTER V

STATISTICS FOR ECONOMISTS (Elective Paper) – Economics VI

OUTCOMES: Students will be able to

CO1 Explains Concept of statistics, collection, classification, tabulation and presentation of data

- CO2 Computational Measures of central tendency
- CO3 Computational Measures of dispersion
- CO4 Computational Time Series analysis and Index Numbers
- CO5 Computational Statistical Inference

SAMPLING THEORY AND STATISTICAL QUALITY CONTROL

- **OUTCOMES:** Students will be able to
- CO1 Explains Introduction to sampling theory
- CO2 Computational Simple random sampling (SRS)
- CO3 Computational Stratified and systematic sampling
- CO4 Describes Process control
- CO5 Computational Product control



DESIGN AND ANALYSIS OF EXPERIMENTS

- **OUTCOMES:** Students will be able to
- CO1 Explains Analysis of variance
- CO2 Computational Experimental designs
- CO3 Computational Efficiency of a design and missing plot technique
- CO4 Describes Factorial experiment
- CO5 Computational Confounding

MATHEMATICS – V

- **OUTCOMES:** Students will be able to
- CO1 Explains Rings, Integral Domains, Fields
- CO2 Computational Calculus of Variation
- CO3 Computational Differential Equation
- CO4 Computational nth differences
- CO5 Explains Numerical Integration



CORPORATE ECONOMICS

- **OUTCOMES:** Students will be able to
- **CO1** Explain corporate economics its need and importance of corporate house
- CO2 Explain need and importance of corporate planning
- CO3 Explain HRM and its functions in industry
- CO4 Explain Globalisation MNC, and WTO. Future of corporate sector
- **CO5** Explain CSR Ethics, law and regulations

SEMESTER VI

MATHEMATICS – VI

- OUTCOMES: Students will be able to
- CO1 Explains Differential Calculus of Scalar
- CO2 Computational Differential Calculus of Vector Fields
- CO3 Computational Line and Multiple Integrals
- CO4 Computational Integral Theorems
- CO5 Explains Green's theorem



STATISTICS FOR ECONOMISTS (Elective Paper) – Economics VIII

OUTCOMES: Students will be able to

CO1 Explains Concept of statistics, collection, classification, tabulation and presentation of data

- CO2 Computational Measures of central tendency
- CO3 Computational Measures of dispersion
- CO4 Computational Time Series analysis and Index Numbers
- CO5 Computational Statistical Inference

APPLIED STATISTICS

- OUTCOMES: Students will be able to
- CO1 Explains Analysis of variance
- CO2 Computational Experimental designs
- CO3 Computational Efficiency of a design and missing plot technique
- CO4 Describes Factorial experiment
- CO5 Computational Confounding



OPERATIONS RESEARCH

- **OUTCOMES:** Students will be able to
- CO1 Explains Introduction to OR and LPP
- CO2 Computational Transportation and assignment problems
- CO3 Computational Game Theory
- CO4 Describes Inventory and replacement theory
- CO5 Computational Queuing theory

MATHEMATICS – VII

- **OUTCOMES:** Students will be able to
- **CO1** Explains Linear Algebra
- CO2 Computational Orthogonal Curvilinear Coordinates
- CO3 Computational Differential Equation
- CO4 Computational Partial Differential Equations



MATHEMATICS - VIII

- **OUTCOMES:** Students will be able to
- CO1 Explains Complex Analysis
- CO2 Computational Complex integration
- CO3 Computational Transformations
- CO4 Computational NUMERICAL METHODS
- CO5 Explains Euler's and Euler's methods

ECONOMICS OF HRM

OUTCOMES: Students will be able to

CO1 Explain Scope and Importance of HRM TQM and Qualities of Good manager corporate house

CO2 Explain Human resource planning and Job design and evaluation

CO3 Explain importance of HRM from Recruitment to performance appraisal

CO4 Explain methods of training and wage determination and grievance redressal

CO5 Explain Human rights and its importance