Course Code	Course Title	Nature	Credits	HPW (Th+Tu+P)	Max Marks (CIE+SEE)
MBAE301	Operations Research	Core	4	4Th + 1 Tu	30+70
MBAE302	Entrepreneurship Development	Core	4	4Th + 1 Tu	30+70
MBAE303	Business Research Methods	Core	4	4Th + 1 Tu	30+70
MBAE304	Business Law and Ethics	Core	4	4Th + 1 Tu	30+70
Total credits at the end of III Semester			16		400
Grand Total			50		1200

## MBA Year-II Semester –III

- HPW Hours Per Week
- CIE Continuous Internal Exam
- SEE Semester End Exam



## SEMESTER-III PAPER CODE – MBAE 301 Course: OPERATIONS RESEARCH

**Course Objectives:** The objective of the course is to give an overview of different Optimization Techniques useful for problem solving and decision making.

- 1. To introduce OR techniques such as Linear Programming Problem.
- 2. To analyse special cases of LPP such as Transportation Problem, Assignment Problem.
- 3. To Study network Concepts and techniques like PERT and CPM.

4. To study quantitative competitive strategy models such as game theory, simulation and queuing theory.

## **Course Outcomes:**

- 1. Helps in formulating real life situations in organizations in Quantitative form.
- 2. Helps in formulating strategies for optimal use of various resources within the organizations..
- 3. Application of optimization tools for decision-making.

## **Unit – I: Introduction**

- i. Introduction to OR- Origin, Nature, definitions, Managerial applications and limitations of OR.
- ii. Linear and Non- Linear, Integer, Goal [Multi-Objective] and Dynamic Programming Problems (Emphasis is on Conceptual frame work-no numerical problems.
- iii. Linear Programming: Mathematical model, Formulation of LPP, assumptions underlying LPP, Solution by the Graph, Exceptional cases.

## Unit – II: Allocation Model - I

- i. LPP Simplex Method- Solution to LPP problems Maximisation and Minimisation cases Optimality conditions. Degeneracy.
- ii. Dual Formulation, Relationship between Primal Dual, Solution of dual, Economic interpretation of dual.
- iii. Sensitivity analysis and its implications.

## Unit – III: Allocation Model - II

- i. Transportation Problem (TP) Mathematical model, IBFS using northwest corner rule, Row and Column Minimum methods, Matrix minimum method(LCM) and Vogel's approximation method, Unbalanced TP, Degeneracy, Optimality Test and Managerial applications.
- ii. Assignment Problem (AP): Mathematical model, Unbalanced AP, Restricted AP, method of obtaining solution- Hungarian method.
- iii. Travelling salesman problem, Managerial applications of AP and TSP.

#### **Unit – IV: Network Models**

- i. Network fundamentals- scheduling the activities -Fulkerson's Rule –CPM- earliest and latest times -determination of ES and EF in the Forward Pass LS and LF in backward pass determination of Critical Path, Crashing, time cost trade off.
- ii. PERT-Beta Distribution, probabilistic models, Calculation of CP, resource analysis and allocation.



#### Unit - V: Waiting Line / Competitive Strategy Models

- i. Queuing Theory Concepts of Queue/Waiting Line General structure of a Queuing system- Operating characteristics of Queues, deterministic Queuing models Probabilistic Queuing Model –Cost Analysis Single Channel Queuing model Poisson arrival and exponential service times with infinite population.
- ii. Game Theory- concepts, saddle point, Dominance, Zero-sum game, two, three and more Persons games, analytical method of solving two person zero sum games, graphical solutions for (m x 2) and (2 x n) games.
- iii. Simulation- Process of simulation, Applications of simulation to different management Problems.

#### **Suggested Books:**

- 1. N.D. Vohra, "Quantitative Techniques in Management", 2010, 4<sup>th</sup>Ed.TMH.
- 2. J.K. Sharma, "Operations Research Theory and Applications 2009, 4<sup>th</sup> Ed. Macmillan.
- 3. Kasana, HS & Kumar, KD, "Introductory Operations Research theory and applications", 2008, Springer.
- 4. Chakravarty, P, "Quantitative Methods for Management and Economics", 2009, 1<sup>st</sup> Ed. HPH.
- 5. Barry Render, Ralph M. Stair, Jr. and Michael E. Hanna, "Quantitative analysis for Management", 2007, 9<sup>th</sup> Ed. Pearson.
- 6. Pannerselvam, R, "Operations Research", 2006, 3<sup>rd</sup> Ed. PHI.
- 7. Selvaraj, R, "Management Science Decision Modeling Approach", 2010, 1<sup>st</sup> Ed. Excel.
- 8. Ravindren, A, Don T. Phillips and James J. Solberg, 2000, "Operations Research Principles and Practice", 2<sup>nd</sup> Ed. John Wiley and Sons.
- Hillier, Frederick S. & Lieberman, "Introduction to Operations Research Concepts and Cases", 2010, 8<sup>th</sup> Ed. TMH.
- 10. Prem Kumar Gupta & others, "Operations Research", 2010, S. Chand.
- 11. K.K Chawla, Vijaygupta, Bhushan K. Sharma, Operations Research, Quantitative Analysis for Management, Kalyani Publications, 2020.



## SEMESTER-III PAPER CODE – MBAE 302 Course: ENTREPRENUERSHIP DEVELOPMENT

## **Course Objectives:**

- 1. To make the students learn the importance of Entrepreneurship
- 2. To motivate the students towards Entrepreneurship
- 3. To make them learn about entrepreneurial environment
- 4. To provide information about financial resources
- 5. To impart training to raise and establish enterprises

#### **Course Outcomes:**

- 1. A student learns the cues and motives of Entrepreneurship
- 2. Students can learn more about types of Enterprises and growth
- 3. Knowledge of entrepreneurship prepares the entrepreneurial bent of mind
- 4. Problems and perspectives of the entrepreneurship can be understood
- 5. It is also possible to students understand and comprehend on venture capital funds

## **Unit – I: Entrepreneur and Entrepreneurship:**

Understanding Concept of Entrepreneurship – Evolution of Entrepreneurship – Characteristics of Entrepreneur – Types of Entrepreneurs – Growth of Entrepreneurship in India – Role of Government in promotion of Entrepreneurship – Recent Trends in Entrepreneurship Development – Role of Entrepreneurship in Economic development in India – Rural Entrepreneurship, Need and Importance of Rural Entrepreneurship – Problems and Perspectives of Rural Entrepreneurship.

## **Unit – II: Factors Affecting Entrepreneurial Growth:**

Economic Environment – Economic, Non- Economic and Psychological factors – Entrepreneurial Motivation – Entrepreneurial Competencies – Role of Higher learning Institutes in Entrepreneurial capacity building – Importance of workshops – Entrepreneurship Development Programmes( EDP's) – Need, Objectives, course content and instruction – Evaluation of EDPs – Phase wise development of EDP Curriculum.

#### **Unit – III: Small, Micro, Medium Scale Enterprises:**

Definition of Small Industry – Characteristics of Small Scale Industry – Latest amendments in Small scale Industry Act – Objectives – Scope of Small & Micro Industries – Opportunities for entrepreneurial growth in MSMEs – Role of MSMEs in Economic development – MSMEs problems – Opportunities – Future growth – Project Identification – Project Formulation – Project Appraisal – Financing and Ownership Structures.

#### **Unit – IV: Institutional Finance for Entrepreneurs:**

Commercial Banks – Role of Commercial Banks in Building Entrepreneurship – Other Financial Institutions Such As IFCI, ICICI, IDBI, SFCs, SIDBI and EXIM bank – Non Banking Financial Institutions – LIC- Role of Training Institutions in Entrepreneurship growth - NSIC, SIDC, SIBC, SFC, SISI, DICs and TCOs. Government Schemes to Develop and encourage entrepreneurship



## **Unit – V: Venture Capital Financing:**

Concept of Venture Capital Financing – Features, Need and Relevance of Venture Capital – Establishment of Venture Capital Funds – Structure and Regulatory framework for Venture Capital Funds – Growth of Venture Capital in India – Evaluation of Venture Capital Financing – Conventional Valuation – First Chicago Method – Revenue Multiplier Method – Venture Capital Firms in India – Structure & Methodology of Venture Capital Fund – Performance measurement – Role of TDICI in Building Venture Capital Fund – Exit Strategies of Venture Capitalists – Imperative of VCF development in India.

#### **Suggested Books**

- 1. Dr. Vasnth Desai, 2012, Dynamics of Entrepreneurial Development and Management, Himalaya Publishing House, Hyd.
- 2. S. S Khanka, Entrepreneurial Development, S. Chand Publishing House, New Delhi.
- 3. Dr. Vasnth Desai, 2010, Small Scale Industry and Entrepreneurship, Himalaya Publishing House, Hyd.
- 4. A. Sahay and A. Nirjar 2010, Entrepreneurship, Excel Books .
- 5. Poornima M Charinthmath, 2010, Entrepreneurial Development and Small Business Enterprises, Pearson Education Publisher.
- 6. David H Hott, 2008, Entrepreneurship and New Venture Creation, PHI New Delhi.
- 7. Naidu, "Management And Entrepreneurship", Wiley Publications
- 8. Dr.S.S.Khanka, "Entrepreneurship Development", S.Chand Publications.

#### **Suggested Readings**

- 1. S. R Bowmick & M. Bhowmik, 2010, Entrepreneurship, New Age International Books.
- 2. Morse E.A Mitchel, 2006, Cases in Entrepreneurship, Sage Publishers.
- 3. Raj Aggarwal, 2008, Business Environment, Excel Books New Delhi.
- 4. Donald G Kurato and Richard M Hodgetts, 2008, Entrepreneurship, Thompson Publications.



## Semester-III

## Paper Code – MBAE 303 Course: BUSINESS RESEARCH METHODS

#### **Course Objectives:**

- 1. Enable students to learn the importance of Research
- 2. To involve students in activities related to Research
- 3. To train them on Data collection and data processing methods
- 4. To impart Report writing skills to Management graduates
- 5. To help learners gain overall insights into the finer aspects of research Methodology

## **Course Outcomes:**

- 1. To gain understanding of various kinds of research design
- 2. To enable learners to be able to formulate the research problem
- 3. To acquire basic knowledge on qualitative and quantitative research
- 4. To have knowledge on descriptive and inferential data tools
- 5. To be able to write and develop independent and critical analysis for report writing

## **Unit – I: INTRODUCTION TO RESEARCH**

Business Research: Definition, Significance, Nature & Importance – Criteria of Business Research – Marketing Information System, paradigm shift in Research – Research Design Types of Research Designs – Descriptive, Exploratory, Diagnostic, and Causal Research – Types of research, Theoretical and Empirical Research – Cross-sectional and Time-series Research — Research Objectives – Research Hypotheses – Characteristics -Research from an Evolutionary Perspective – the Role of Literature Review in Research

#### **Unit – II: RESEARCH PROCESS & DATA COLLECTION**

Research Process – Data Sources- Primary Data – Secondary Data - Data Collection Methods – Types of Data Collection - Questionnaire Design – Questionnaire Layout – Question Content - Wording – Target Population Identification – Sampling Process – Sampling Design – Sampling techniques – Sampling Procedure – Sampling Types – Pilot Study – Pre-Test.

#### **Unit – III: SCALING AND MEASUREMENT**

Measurement and Scaling Techniques – Different types of Scales – Nominal, Ordinal, Interval and Ratio Scales – Purpose and Benefits of Scaling – Construction of Instrument Attitudinal Scales – Number of Dimensions in Scaling - Construction and Application - Data Analysis - Editing – Tabulation – Cross Tabulation – Data Content Validity, Construct Validity and Reliability

## **Unit – IV: DATA ANALYSIS AND STATISTICAL TECHNIQUES**

Test of Hypothesis – Type-I, Type - II Errors - Small Samples and Large Samples – Parametric and Non-Parametric Tests – Chi Square Test – Mc Nemar Test – ANOVA – One Way and Two Way Analysis - Bivariate and Multivariate Statistical Techniques – Factor Analysis – Discriminant Analysis – Cluster Analysis – Correlation and Multiple



Regression Analysis – Multidimensional Scaling.

# **Unit – V: REPORT DESIGN, WRITING, AND ETHICS IN BUSINESS RESEARCH**

Report Preparation - Different Types of Reports – Contents of Report – Need for Executive Summary – Chapterization – Contents of Chapter – Report Writing – The Role of Audience – Readability – Comprehension – Tone – Final Proof – Report Format – Title of the Report – Ethics in Research – Ethical Behavior of Research – Plagiarism – Essentials of Referencing - Subjectivity and Objectivity in Research.

#### **Suggested Books:**

- 1. Donald R. Cooper, Pamela S. Schindler and J K Sharma, Business Research Methods, Tata Mc Graw Hill, New Delhi.
- 2. Alan Bryman and Emma Bell, Business Research Methods, Oxford University Press, New Delhi.
- 3. Uma Sekaran and Roger Bougie, Research Methods for Business, Wiley India, New Delhi.
- 4. William G Zikmund, Barry J Babin, Jon C.Carr, Atanu Adhikari,Mitch Griffin, Business Research methods, A South Asian Perspective, Cengage Learning, New Delhi.
- 5. Umashakaran and Roger Bougie, "Research Methods for Business", Wliey Publications

## **Suggested Books:**

- 1. Bordens, K. S. and Abbott, B. B. (2011). Research Design and Methods A Process Approach, New York, McGraw-Hill.
- 2. Creswell, J. W. (2007). Qualitative Inquiry & Research Design: Choosing Among Five Approaches, California, Sage Publications, Inc.
- 3. Creswell, J. W.(2003). Research Design: Qualitative, Quantitative, and Mixed Methods Approaches (2nd Ed.). London: SAGE Publications Limited.
- 4. Charmaz, K. (2006). Constructing Grounded Theory: A Practical Guide through Qualitative Analysis, London, SAGE Publications Ltd.
- 5. Curwin, J. and Slater, R. (1991). Quantitative Methods for Business Decisions, Tokyo, Japan, Chapman & Hall.
- 6. Denzin & Lincoln (2011). The SAGE Handbook of Qualitative Research. Thousand Oaks: SAGE Publications Ltd.
- Dey, I. (2005). Qualitative Data Analysis: A user-friendly guide for social scientists, New York, Routledge.
- 8. Goulding, C. (2002).Grounded Theory: Practical Guide for А Management, Researchers, Business, and Market California, SAGE Publications Ltd.
- 9. Gray, D. E. (2009). Doing Research in the Real World, London, SAGE Publication Ltd.
- 10. Kumar, R. (2011). Research Methodology A Step-by-Step for beginners, California, SAGE Publications Ltd. 4th Edition.
- 11. Rao Nageswara, Research Methods and Quantitative methods, BS Publications

## Semester-III Paper Code – MBAE 304 Course: BUSINESS LAW AND ETHICS

#### **Course Objectives:**

- 1. This course is designed to introduce the legal aspects of business from the national and transnational perspective.
- 2. The course also intends to offer insights into the ethical considerations in Business entities and their responsibility towards society.

## **Course Outcomes:**

By the end of the course, the students would have a comprehensive understanding of the legal and ethical considerations in business organizations through gaining knowledge of provincial and international outlook.

## **Unit - I: Law of Contracts:**

Definition of Contract and Agreement – Classification of Contracts, Essential elements of a valid Contract – Offer - Acceptance - Consideration - Capacity to Contract - Free consent- Legality of Object - Performance of Contract – Remedies for breach of Contract.

## **Unit - II: Law relating to Special Contracts:**

Salient features of Contract of Agency, Bailment and Pledge, Indemnity and Guarantee. Sale of Goods Act – Distinction between Sale and agreement to sell - Conditions and Warranties. Negotiable Instruments Act - Definitions, Essential elements and distinctions between Promissory Note, Bill of Exchange, and Cheques - Types of crossing.

#### Unit - III: Companies Act, 2013:

Definition of company – Characteristics - Classification of Companies-Formation of Company -Memorandum and Articles of Association – Prospectus -Share holders and their meetings - Board meetings -Law relating to meetings and proceedings- Management of a Company - Qualifications, Appointment, Powers and legal position of Directors - Board - M.D and Chairman - Their powers.

## **Unit - IV: Consumer Protection and other Essential Laws:**

Introduction to consumer protection law in India - Consumer councils - Redressal machinery -Rights of consumers - Consumer awareness. Law of Industrial and Intellectual Property; Cyber Law; Competition Law; Land and Real Estate laws; Law of Insurance.

## **Unit - V: International Business Law and Business Ethics:**



Law of Export - Import Regulation; International and Comparative Commercial Arbitration.

Ethical and Value based Considerations in Business, Need and Justification of ethics, efficiency and integrity in business operations –Corporate Social Responsibility.

#### **Essential Books:**

- 1. M.C. Kuchchal, Vivek Kuchchal, "Mercantile Law", 2013, 8<sup>th</sup> Ed, Vikas Publishing House Pvt. Ltd.
- 2. AkhileshwarPathak, "Legal Aspects of Business", 2007, 3rd Ed. Tata McGraw Hill.
- 3. K.R. Bulchandani, "Business Law for Management", 2009, HPH.
- 4. C. Rama Gopal, "Export Import Procedures Documentation and Logistics", 2006, New Age International (P) Limited.
- 5. Sony Pellissery, Benjamin Davy, Harvey M. Jacobs, "Land Policies in India: Promises, Practices and Challenges", 2017, Springer Nature.
- 6. S.R. Myneni, "International Trade Law: International Business Law", 2014, Allahabad Law Agency
- 7. Margaret L. Moses, "The Principles and Practice of International Commercial Arbitration", 2008, Cambridge University Press.
- 8. Tulsian's Business and Corporate laws, S.Chand Publications
- 9. Niickolas James, "Business law", 3<sup>rd</sup> edition, Wiley Publications

#### **Suggested Books:**

- 1. N.D. Kapoor, "Elements of Mercantile Law", 2007, Sultan Chand & Co.
- 2. PPS Gogna, "A Text Book of Company Law", 2006, S. Chand
- 3. Marianne moody Jennings, "The Legal, Ethical and Global Environment of Business", 2009, South western Cengage learning, New Delhi.
- 4. S.S Gulshan, Business laws, 2010, Excel Books.

