MB201C
MBA EC (2 Year Programme) Semester II

INTERNET PROGRAMMING USING JAVA

COURSE OBJECTIVE
The objective of this course is to help students to understand the advanced concepts of Object Oriented Programming and Internet Programming using Java and their use in organization and processing complex business information.

EXAMINATION
The faculty member will award internal marks out of 40 based on three assessments of 20 marks each of which best two will be considered. The end semester examination will be of 60 marks.

COURSE CONTENT

1. **Introduction to Java:** History & features of java, getting started with java, concept of java virtual machine (JVM), java class libraries, and java development kit (JDK).
2. **JAVA Basis:** Data types, variables, arrays, operators, expressions & assignments, modifiers, literals, and control statements.
3. **Object Oriented Programming and JAVA:** objects and classes, wrapper classes, methods, inheritance, package and interfaces, exception handling, event handling, threads, multithreaded programming, and I/O basic.
4. **Applets and Networking:** Sockets, URL, life cycle of applet, applet class, API class library, and introduction to AWT.
5. **Servlets:** Introduction to servlets, web browsers, web servers, servlets containers, life cycle of a servelt, JDBC, API library, driver types, and connectivity to database.
6. **Introduction to JSP:** Elements of JSP, JSP directives, JSP declarations, JSP scriplets, JSP Expressions.

TEXT READINGS (Latest Edition)

1. Joseph' o Neil and Herbert Schildt, **"Teach Yourself Java"**, Tata McGraw Hill, New Delhi.
2. Patrick Naughton and Herbert Schildt, **"JAVA The Complete Reference"**, Tata McGraw Hill, New Delhi.
3. Cay S. Horstmann and Gary Cornell, **"Core Java 1.2 vol. I – Fundamentals"**, Sun Microsystems Press, New Delhi.
4. Cay S. Horstmann and Gary Cornell, **"Core Java 1.2 vol. II –Advanced Features"**, Sun Microsystems Press, New Delhi.

SUGGESTED READINGS (Latest Edition)

1. Bernard van Haecke, **"JDBC: Java Database Connectivity"**, IDG Books India, New Delhi.
2. James Goodwill, **"Pure Java Server Pages"**, Techmedia, New Delhi.
3. Dustin R. Callaway, **"Inside Servlets"**, Addison-Wesley, New Delhi.
4. Tom Valasky, **"Enterprise Java Beans"**, Addision-Wesley, New Delhi.

MB202C
MBA EC (2 Year Programme) Semester II

SOFTWARE ENGINEERING

Objective: The objective of the course is to introduce the students the essential of software engineering and software project management concepts.

Examination: The faculty member will award internal marks out of 40 based on three assessments of 20 marks each of which best two will be considered. The end semester examination will be of 60 marks.

Unit 1:Introduction and models

What is software engineering, the evolving Role of software, software characteristics, software components, software application software process and models.

Unit 2: planning and managing the project

software project planning, metrics for software productivity and quality, project estimation techniques and models.

Unit 3; Capturing the requirements;

The requirement process types of requirement, object oriented analysis, software prototyping, requirement validation, measuring requirements, requirements analysis methods.

Unit 4: Designing the system

The design process, design fundamentals, data designs, arc

MB203C
MBA EC (2 Year Programme) Semester II

INTRODUCTION TO E-BUSINESS

COURSE OBJECTIVE

The objective of this course is to help students to understand the basics of Electronic Business, Electronic Commerce, and related issues.

EXAMINATION

The faculty member will award internal marks out of 40 based on three assessments of 20 marks each of which best two will be considered. The end semester examination will be of 60 marks.

COURSE CONTENTS

1. **E-Business:** Fundamentals, E-Business framework, E-Business application, Network Infrastructure for E-Business.
2. **Mobile and Wireless computing fundamentals:** Mobile computing, framework, wireless technology and switching method, mobile information access device, mobile computing application.
3. **Handling money on the net:** type of E-payment, digital token–based e-payment, smart card, credit card payment systems, risk on e-payment, designing e-payment.
4. **Inter-organization Business:** EDI application in business, EDI: legal, security, standardization and EDI, EDI software implementation, VANs (value added net work) Internet based EDI.
5. **Electronic market place of buyers and sellers:** Consumer and business markets: ordering on-line, Advertisement and marketing on Internet, Offering customer product on the net, electronics customers support.
6. Web–catalogues, business care for documents library, type of digital documents, documents infrastructure, data warehouses, multi-media and digital video.
7. E-Business standard, Cyber laws, Cyber crimes & frauds, types and tools of hacking.
8. **Security and Electronic-Business:** Client–server security, data and message security, document security, firewalls.
9. **Future of Electronic-Business:** Virtual Factory, Strategies for Electronic Business, Making Money on net, Web portals and vortals concepts.

TEXT READINGS (Latest Edition)

1. Ravi Kalakotta & Whinston B., **"Frontiers of E-Commerce"**, Addison-Wesley, New Delhi.
2. R. Kalakotta & M. Robinson, **"E-Business: Roadmap for Success"**, Addison-Werley, New Delhi.

SUGGESTED READINGS (Latest Edition)

1. Daniel Amor, **"The E-Business (R) Evolution"**, Prentice Hall, PTR, New Delhi.
2. Parag Diwan and Sunil Sharma, **"E-Commerce"**, Excel Books, New Delhi.
3. Reynolds, **"Beginning of E-Commerce"**, Shroff Publication.
4. Kamlesh K. Bajaj & Debjani Nag, **"E-Commerce"**, Tata McGraw Hills, New Delhi.

MB204C
MBA EC (2 Year Programme) Semester II

INTRODUCTION TO NETWORKING

OBJECTIVE: The objective of this course is to create awareness of networking concepts.

EXAMIANTION: The faculty member will award internal marks out of 40 based on three assessments of 20 marks each of which best two will be considered. The end semester examination will be of 60 marks.

COURSE CONTENT:

1. Networking concepts, goals distributed systems & clients/server model, Layer, structure, Point to point and Broad Cast Transmission Technology. Services, Protocol., Connectivity standard problem.

2. Design issues of layers OSI model, Open System Inter-charge Model. Brief description of TCP/IP SNA, Novell Netware.

3. Signals encoding, Transmission media, Type and performance, Error detection techniques, Telephone System FDM, TDM, WDM. Circuit Switching Packet switching, Message Switching, Addressing Physical and Logical.

4. Introduction to LAN, MANM, WAN, LAN, Components, Hardware Software Media Topology Access Technology (CSMA/CD, Token Ring)

5. Reporter Bridge, Switch, Router Gateway, Subnet Internet, Advanced Networking concepts.

Suggested Readings: (Latest Edition)

1. Computer Network, By Andrew S. Tanenbaum III Edition PHI
2. Data Communication and Networking by CSV, Murthy.
3. Computer Communication & Networking Technologies by Michale A Gallo and William M. Hancock Thomas.

MB205C
MBA EC (2 Year Programme) Semester II

OBJECT ORIENTED METHODOLOGY USING C++

COURSE OBJECTIVE: The objective of this course is to provide students basics of Object Oriented Programming (OOP) using C++ and its applications in business information processing.

EXAMINATION: The faculty member will award internal marks out of 40 based on three assessments of 20 marks each of which best two will be considered. The end semester examination will be of 60 marks.

COURSE CONTENS : Introduction to object Oriented Programming, Advantages of Object Oriented Programming, Procedural versus Object Oriented Languages: Overview of Objects, Classes, Encapsulation, Data Binding, Inheritance and Polymorphism.

General forms of a C++ program, I/O with cout and cin, different operators, scope resolution operator, Data Types For, while do-while, if-else, switch and conditional statements, Classes and objects : Structure and classes, unions and classes, constructors and destructors, Automatic, external and static data members and member function.

Arrays & Pointes: Arrays of objects, Pointer to object, the this pointer. Function : General form Prototypes, returning passing objects to functions, returning objects, friend function recursion, references.

Inheritance: Multilevel and Multiple Inheritance, Constructor, Destructor and Inheritance, Private, Public and Protected access specifires, function and operator overloading.

Virtual function, pure virtual function, polymorphism, Introduction to Templates and Exception handling.

TEXT READINGS: (Latest Edition)

1. Herbert Schildt, C++ The Complete reference, TATA McGraw Hill.
2. Grady Booch, Objective Oriented Analysis and Design. Addison Wesley
3. Robert Lafore, Object Oriented Programming in Turbo C++, New Delhi Galgotia Pub Pvt. Ltd.

MB206C
MBA EC (2 Year Programme) Semester II

MARKETING MANAGEMENT

Course Objectives

The objectives of this course are to provide the students exposure to modern marketing concepts, tools, and techniques, and help them develop abilities and skills required for the performance of marketing functions.

Evaluation Scheme:

The faculty member will award internal marks out of 40 based on three assessments of 20 marks each of which best two will be considered. The end semester examination will be of 60 marks.

Course Contents

1. **Marketing Concepts:** Customer Value and Satisfaction, Customers Delight, Conceptualizing Tasks and approaches to Marketing Management, Value chain, scanning the Marketing Environment.
2. **Market Segmentation, Targeting, Positioning:** Market segmentations, patterns, procedures, requirement for effective segmentation, Niche Marketing, selecting the market segments, tool for competitive differentiation, developing a positioning strategy.
3. Marketing Information System and Marketing Research Process.
4. **Product Decision:** Objectives, Product classification & Product Portfolio, Product life cycle strategies, branding, packaging, labeling,.
5. **Pricing Decision:** Factors affecting price, pricing methods and strategies, Types of competition.
6. **Distribution Decisions:** Importance and Functions of Distribution Channel, Considerations in Distribution Channel Decisions, Types of Channel Members, Retail formats.
7. **Promotion Decisions:** A view of Communication Process, developing effective communication, Promotion-Mix elements – Advertising, Personal Selling, Sales Promotion and Public Relation.
8. **Introduction to International Marketing :** EPRG framework, Deciding to go abroad, deciding which markets to enter, Deciding on the marketing program, Country of origin effect.
9. **Emerging Trends in Marketing:** An introduction to Internet Marketing, Multi level Marketing, and Introduction of CRM & EVENT marketing. Rural, Services Marketing.

Text Readings (Latest Edition)

1. Philip Kotler, Kelvin & Keller, Abraham Koshy, Mithileshwar Jha "**Marketing Management",** A South Asia perspective –New Delhi : Pearson Education Latest Edition.
2. Rajan Saxena – Marketing Management, TMH Latest Edition.
3. Dhiraj Sharma, Marketing – Cengage Latest Edition.
4. Czinkota & Kotabe – Marketing Management – Cengage Latest Edition.
5. Baines, Fill & Page – Marketing Management, Oxford University Press Latest Edition.

MB207C
MBA EC (2 Year Programme) Semester II

RESEARCH METHODOLOGY

Course Objectives

The objectives of the course are to equip the students with the concept and methods of Business Research. The students will be able to plan, design and carry out business research using scientific methods and prepare research report(s) / paper(s).

Examination Scheme:

The faculty member will award internal marks out of 40 based on three assessments of 20 marks each of which best two will be considered. The end semester examination will be of 60 marks.

Course Contents:

Prerequisites: Student are suppose to have knowledge of Measures of Central Tendency, Measures of Dispersion, Simple Correlation and Regression Analysis. These concepts are taught to them in earlier semesters. **There will be no questions in examination from Prerequisites.**

1. Introduction to Research Methods: Role and objectives of business research, types of research and various research design (exploratory, descriptive, experimental and diagnostic research), research process: Overview, Problems encountered by researcher. Experimental research design will comprise of Completely Randomized Design, Latin Square Design and Factorial Design.
2. Data and their Collection: Collection, Organization, Presentation, Analysis and Interrelation of Primary and Secondary Data. Measurement in research, measurement scales, sources of errors in measurement, Techniques of developing measurement tools, classification and testing (reliability, verification and validity) scales, Designing questionnaires and interviews.
3. Advance Data Analysis tools : Multiple Regression, Factor Analysis, Cluster Analysis, Perceptual Mapping, Multidimensional Scaling, Discriminant and Canonical Analysis, Conjoint Analysis.
4. Sampling , Sampling Methods, Sampling Plans, Sampling Error, Sampling Distributions : Theory and Design of Sample Survey, Census Vs Sample Enumerations, Objectives and Principles of Sampling, Types of Sampling, Sampling and Non-Sampling Errors.
5. Hypothesis and Hypothesis testing Parametric & non-parametric tests, introduction to sample tests for univariate and bivariate analysis using normal distribution, f-test, t-test, z-test, ANOVA, U test, Kruskal-Wallis test, chi square test.
6. Interpretations and Report Writing: Meaning of interpretation, techniques of Interpretation, precautions in interpretation, significance of report writing, steps in report writing, layout of report and precautions in writing research reports.
7. Epilogue: Limitations of RM, Philosophical issues in Research, Ethics and Research.

Text Readings (Latest Edition**)**

1. William G. Zikmund, "**Business Research Methods"**, Orlando: Dryden Press.
2. C. William Emory and Cooper R. Donald, **"Business Research Methods"**, Boston, Irwin.
3. Fred N Kerlinger, "**Foundations of Behavioural Research"**, New Delhi: Surjeet Publications.

Suggested Readings (Latest Edition)

1. David Nachmias and Chava Nachmias, "**Research Methods in the Social Sciences"**, New York: St.Marlia's Press.
2. C. R. Kothari, "**Research Methodology: Methods and techniques"**, New Delhi: Vishwa Prakashan.

MB208C
MBA EC (2 Year Programme) Semester II

OPERATIONS RESEARCH

Course Objective

The objectives of this course are to help the students acquire quantitative tools, and use these tools for the analysis and solution of business problems. The emphasis will be on the concepts and application rather than derivations.

Examination Scheme:

The faculty member will award internal marks out of 40 based on three assessments of 20 marks each of which best two will be considered. The end semester examination will be of 60 marks.

Contents

1. Quantitative Techniques and Operations Research: Meaning, Scope of Quantitative Techniques and Operations Research in Management, Advantages and Limitations of Quantitative Techniques/Operation Research.
2. Linear Programming: Meaning of Linear programming, General Mathematical Formulation of LPP, Graphical Analysis, Simplex Method, Big-M Method, Advantage and limitations of LPP.
3. (a) Transportation Model: Transportation Problem as a particular case of LPP Mathematical Formulation, Initial Basic Feasible

Solution, Vogel's Approximation Method, Optimization (Minimization and Maximization) using Modified Distribution Method and Stepping Stone Method.

(b) Assignment Problem: Assignment Model as a particular case of transportation model, formulation of assignment problems, Solution of assignment problems using Hungarian Method (Minimization and Maximization) Route Allocation.

4. Dynamic Programming, Goal Programming, Integer programming and Quadratic Programming – Concepts and Applications only. No numericals.
5. Waiting Line Models: Introduction, Scope in Management Decisions, Queuing Models M/M/1 (Infinite and Finite Population), concepts and applications of M/M/C.
6. Replacement Models: Introduction, Scope in Management, Single Equipment Replacement Model and Group Replacement. Replacement of items which deteriorate with time and items which fails suddenly.
7. Game Theory: Introduction to Games, Maximin and Minimax Principles, Pure and Mixed Strategies, Rule of dominance, Solutions of Games using –Algebric and Graphical Methods, Game Theory and Linear Programming.
8. Markov Chain Analysis: Computation of sequential probability of states for different periods, Steady State Probability of states and application of Markov Chain.
9. Simulation: Introduction to simulation, Monte Carlo Technique and its applications.

Text Reading

1. S. D. Sharma, "**Operations Research"**, Meerut: Kedar Nath Ram Nath and Co., Latest Edition.
2. N. D. Vohra. "**Quantitative Techniques"**, New Delhi: Tata McGraw Hill Pub. Latest Edition.
3. Hamdy A. Taha, "**Operations Research: An Introduction"**, New Delhi: Prentice Hall of India Pvt. Ltd. Latest Edition.
4. Haruly M. Wagner**, "Principles of Operations Research with application to managerials decisions"**, New Delhi: Prentice Hall of India Pvt. Ltd, Latest Edition.
5. V. K. Kapoor, "**Problems and Solutions in Operations Research"**, New Delhi: Sultan Chand and Sons, Latest Edition.

Suggesting Readings

1. P. K. Gupta and D. S. Hira, "**Operations Research",** New Delhi: Sultan Chand Publications, Latest Edition.
2. U. K. Shrivastava, G. V. Shenoy, S. C. Sharma, "**Quantitative Techniques for Managerial Decisions"**, New Delhi: Wiley Eastern Ltd., Latest Edition.
3. Bobby Srinivasan and C. L. Sandblom, "**Quantitative Analysis for Business Decisions,"** Singapore : McGraw-Hill Publications, Latest Edition.