

## Semester –II

At the end of first semester a student have to choose two specializations namely major and minor. There is no difference in number of subjects in major & minor specializations, i.e. 6 for both. The only difference is students are expected to do the project in major specializations

### Paper 1: Organisation Behavior & Development

#### SECTION A

Unit I: Organizational Behaviour - The nature of organisations: Why do organisations exist? Components of organisations; Organisations as open systems, Managers in organisations, Productivity and managerial performance, Value-added managers, The manager's challenge, Organisational behaviour and the new workplace, Managing the globalisation of work, Managing human rights in the workplace, Managing developments in information technologies, Managing organisational transitions, Managing new forms of Organisation.

Unit II: Foundations of Individual Behaviour - biographical characteristics, ability, and learning

Unit III: Perception: Introduction, Halo effect, Stereotyping, pigeonholing and compartmentalisation; Self-fulfilling prophecy; Perceptual mythology; other influences on perception.

Unit IV: Attitudes and values - Attitudes, Components of attitudes, Attitudes and behaviour, Attitudes and cognitive consistency, Job satisfaction as an attitude; development Values, Sources and types of values, Patterns and trends in values, Managing values and attitudes.

Unit V: Motivation- Concepts, Theories of Maslow, Herzberg, McClelland, Porter & Lawler Model, Application of Motivation concept, Individual motivation and motivation in the organization, Cultural Differences in Motivation, Intrinsic and Extrinsic Motivation, Social Motivation, Motivation and Health, Role of motivation in human behaviour.

#### SECTION B

Unit VI: Foundations of group behaviour - The nature of groups: groups and teams, informal and formal groups, purpose of teams, Teams and team building: selecting team members, team roles, stages in team development, team building, team identity, team loyalty, commitment to shared beliefs, multi-disciplinary teams, Team Dynamics: group norms, decision-making behaviour, dysfunctional teams, Cohesiveness.

Unit VII: Conflict - Substantive and emotional conflicts, Levels of conflict, Sources of conflict in organisations, Symptoms of conflict Causes of conflict, Strategies for the management of conflict.

Unit VIII: Organizational Change - Nature, levels and dilemmas of change, Pressures for change, The Domino effect, Responses to change, Force field analysis, Change process, Resistance to change, Dynamics of change.

Unit IX: Organizational Development - Goals of organisational development: Principles underlying organisational development, Ethical aspects of organisational development, The process of organisational development: Action research and organisational development, Organisational development interventions: Organisation-wide interventions, Smaller group and inter-group interventions, Individual interventions.

Unit X: OD Techniques - Traditional: Grid Training, Survey Method; Modern: Process Consultation Method, Third Party, Team Building, Transactional Analysis.

## Paper 2: Managerial Economics

### SECTION A

Unit I: Nature and fundamental concepts and basis techniques of managerial economics - Analysis of Demand, Significance, estimation of demand; Elasticity of Demand, Techniques and Importance of Demand forecasting; Basic Mathematical Problems related to demand estimation and elasticity of demand.

Unit II: Production & Cost Analysis - Production & Production Function: Concept, Forms of production function, Law of variable Proportions, Returns to scale. Cost concept, Short term and long term cost output relationship, Cost curves, Economies of scale.

Unit III: Objectives & Equilibrium of the Firm - Market Structures- Perfect Competition, Monopoly, Monopolistic Competition & Oligopoly - kinked demand curve and cartels, Mathematical Problems on profit maximization and Price & Output determination under various market structures.

Unit IV: Pricing in practice - Cost plus pricing, incremental pricing, transfer pricing and price discrimination.

Unit V: Market failure - Concept, Symptoms and Reasons, Concept of Asymmetric Information; Market intervention by Government-Rationale for Intervention.

### SECTION B

Unit VI: National Income Accounting - Concept & measurement; Determination of Income & Employment; Concept of multiplier; Inflation and Deflation, types, causes and control of inflation.

Unit VII: Macro economic policy - Monetary and fiscal- objectives and Instruments; Effectiveness of Monetary & Fiscal Policy with respect to Indian Economy.

Unit VIII: Business cycles - Concept, Causes & Impact, Measures to control Business cycles.

Unit IX: External Sector Dynamics - Justification for International Trade, Foreign Capital flows & Balance of Payment-Methods to correct Disequilibria; Exchange Rate: Fixed & Flexible; Convertibility of Rupee (Current & Capital Account).

Unit X: Economic Environment of Business - Factors determining Economic environment of Business, Present scenario of Indian Economy.

## Paper 3: Environment Management

### SECTION - A

Unit I: Introduction to Environment Management - Definition, Scope & importance, Need for public awareness- institution in environment, People in environment, Fundamentals- sustainable development, Unsustainable to sustainable development.

Unit II: Natural resources - Renewable and non renewable resources, and associated problems, Role of an individual in conservation of natural resources; equitable use of resources for sustainable life cycles; Preserving resources for future generation, the rights of animals.

Unit III: Ecosystem - Concept of an Ecosystem, understanding ecosystems, ecosystem degradation, resource utilization; Structure & functions of an ecosystem-producers, consumers and decomposers; Ecological succession; food chains, food webs and ecological pyramids; Ecosystem types - characteristics features, structure and functions of forest, grassland, desert and aquatic ecosystems, Industrial Ecology and Recycling Industry.

Unit IV: Environment legislation - Environmental (protection) Act, The water (prevention and control of Pollution); The wild life protection Act; Forest conservation Act; Issues involved in enforcement of environmental legislations; Environment Impact Assessment; Environmental Auditing; Clearance / Permission for establishing Industry.

Unit V: Human population & environment - Global population growth, variations among nations. Population explosion, Family welfare Programmes-methods of sterilization; Urbanization, Environment & human health-climate and human health, infectious diseases,

water related diseases, risk due to chemicals in food, Cancer and environment. Human rights – Equity, Nutrition and health rights, intellectual property rights (IPRS), Community biodiversity registers (CBRs); Value education – environmental values, valuing nature, valuing cultures, social justice, human heritage, equitable use of resources, common property resources, ecological degradation; HIV/AIDS; Women and children Welfare; Information technology in environment and human health.

#### SECTION – B

Unit VI: Air Pollution:- Definition Air pollution, causes, effects & control, Green house effect, pollution: Vehicles, Industry households, Global warming, Ozone layer depletion, effects & remedies, Role of individual and institution in preventions of Air pollution; Soil Pollution:- Definition soil pollution, causes, effects & control, Surface condition, texture, contents. Forest, Afforestation, Plantations, pollution due agricultural patterns, chemical fertilizers & Pesticides; Run-off, grazing desertification; Waste land Management: - causes, effects and control measures of urban and industrial waste; Role of individual and institution in preventions of Soil pollution.

Unit VII: Water and marine Pollution - Definition water pollution, causes, effects & control; Management of water: Hard & Soft water, contaminants, Acid Rains; Pollution by sewerage, industry runoff degradation due to biological changes; Sea water pollution & degradation of Marine; Role of individual and institution in preventions of water & marine pollution.

Unit VIII: Noise, Thermal & Nuclear Pollution - Definition of Noise pollution: Sources or Causes effects and control. Definition of thermal pollution; Causes, effects & control; Definition of nuclear pollution; Radiation; Causes, effects & control, Nuclear accidents; Role of individual and institution in preventions of Noise, thermal and nuclear pollution.

Unit IX: Biodiversity - Introduction- biodiversity at genetic, species and ecosystem levels; Bio-geographic classification of India; Value of diversity– Consumption use value, Productive use value, Social, Ethical, Moral, aesthetic and optional value if diversity; India as mega-diversity nation, Hotspots of biodiversity; Threats to bio-diversity–habitat loss, poaching of wildlife, man-wild life conflicts; Common endangered and endemic plant and animal species of India; In situ and Ex situ conservation of Biodiversity.

Unit X: Social issues and environment - Construction of dams: problems and concerns of resettlement, rehabilitation of affected people; Conservation: energy, water, forest, soil, strategies for conservation; Environmental ethics– issues and possible solutions, resource consumption patterns and need for equitable utilization; Equity disparity in western and eastern countries; Urban and rural equity issues; Need for gender equity; Public awareness–Using an environmental calendar of activities, Self initiation.

### Paper 4: Business Research

#### SECTION A

Unit I: Introduction - Meaning, Objectives and Types of research, Research Approach, Research Process, Relevance & scope of research in management.

Unit II: Research Design - Features of good Design, Types of Research Design, Basic principles of experimental Design, Use of advanced technology in Research Design, Role of Research analyst.

Unit III: Sampling Design - Steps in sample Design, Characteristics of a good sample Design, Probability & Non Probability sampling.

Unit IV: Measurement & scaling techniques - Errors in measurement. Test of sound measurement, Scaling and scale construction technique.

Unit V: Methods of data collection - Primary data – questionnaire and interviews; Collection of secondary data; Use of computer and Information technology in data collection.

## SECTION B

Unit VI: Collection and Processing data - Field work, Survey Errors, Data coding; Editing and Tabulation.

Unit VII: Analysis of data - Analysis of Variance; Advanced Data Analysis Techniques- Factor Analysis, Cluster Analysis, Discriminant Analysis, Conjoint Analysis, Multi Dimensional Scaling.

Unit VIII: Testing of hypothesis - Procedure for hypothesis testing; Use of statistical techniques for testing of hypothesis.

Unit IX: Interpretation of data - Techniques of Interpretation, Report writing, Layout of a project report, preparing research reports.

Unit X: Research in management - General management, Small business innovation research (SBIR), Research in functional areas – marketing, finance, HR and Production, Software Application in SPSS.

## Specialisation GROUP A:( MARKETING)

### 1. Advertising & Integrated Marketing Communication

#### SECTION A

Unit I: Marketing Communication - Introduction to Marketing Communication Concept; Elements of Marketing Communications; Unifying the Appeal and the Message across the promotion-mix components.

Unit II: Integrated Marketing Communication - Role of IMC in Marketing and Brand Management; How Marketing Communication Work; Setting IMC objectives.

Unit III: Communication and Branding - Marketing Communications Functions, Brands, and Integrated Marketing Communication, Integrated Marketing Communication Partners and Industry, Organisations; Using Advertising and Promotion to Build Brands; Brands and Stakeholder Relationships; Basic Marketing Communication Strategies for Building Brands; Integrating the Brand Communication Process; Customer Brand Decision Making.

Unit IV: Research Methods and Application - Role and Relevance of Research in Communication; Types of Research and the Research Process; Advertising Research; Positioning Research, Target Market Research, Pre-test Research and Audience Research.

Unit V: Integrated Marketing Communication and Micro-Marketing - Segmenting, Targeting, and Positioning. Data-Driven Communication; fostering word-of-mouth; Opinion Leaders, Reference Groups

#### SECTION B

Unit VI: Creating, Sending, and Receiving Brand Messages-Integrated Marketing, Communication Creative Concept and Messages; Message Execution; Integrated Marketing Communication, Broadcast, Out-of-Home, Product Placement Media; Internet and e-Commerce Media; Integrated Marketing Communication Media Planning.

Unit VII: Sales Promotion in Integrated Marketing Communication-Consumer Sales Promotion and Packaging; Channel Marketing; Trade Sales Promotions and Co-Marketing; Personal Selling; Direct Marketing; Trade Shows, Events, Sponsorship and Customer Service.

Unit VIII: Advertising Concepts and Principles-Principles and Concept of Advertising; Evolution and History of Advertising; Relevance of Advertising in IMC-mix, Overview of the Advertising Scene in India; Social and Economic impact of Advertising; Account Management - Agency operations, Pitching Mechanism in Advertising, Client-Agency Interface and Advertising Budget

Unit IX: Public Relations and Corporate Communications-Public Relations Concepts and Principles, Theories of PR, Laws and Ethics in PR; Strategic PR management, Crisis

Communication and Management, Principles and Concepts of Corporate Communications (CC), Emerging Market Scenario, Corporate Communications Strategies, Media Relations  
Unit X: The Big Picture-Social, Legal and Ethical Issues in IMC; International Marketing Communication; Multicultural Marketing Communications; Effectiveness, Measurements, and Evaluations of Integrated Marketing Communication

## 2. Brand Management

### SECTION A

Unit I: Product Management - Basic concepts, Product management process, Product planning system, Product line decision.

Unit II: Product Portfolio - Portfolio concept, Logic for portfolio approach.

Unit III: Overview of the Brand Management Framework - What is a Brand? Why do Brands Matter? Can anything be branded? What are the strongest Brands? Branding challenges and opportunities, The Brand equity concept, Strategic Brand Management Process; Customer-Based Brand Equity Making a Brand Strong: Brand Knowledge; Building A strong Brand: The four steps of brand building, Brand-Building Implications.

Unit IV: The Value of Branding - Product positioning concept, Perceptual mapping, Brand Positioning and Values - Identifying and Establishing Brand Positioning, Positioning Guidelines, Defining and Establishing Brand Values, Internal Branding.

Unit V: Tools for Measuring the Sources and Consequences of Brand Equity - Developing a Brand Equity Measurement and Management System- The Brand Value Chain, Designing Brand Tracking Strategies, Establishing a Brand Equity Management System; Measuring Sources of Brand Equity- Qualitative Research Techniques, Quantitative Research Techniques; Measuring Outcomes of Brands Equity: Capturing Market Performance, Comparative Methods, Holistic Methods.

### SECTION B

Unit VI: Building and Borrowing Brand Identity - Choosing Brand Elements to build brand equity-Criteria for choosing the brand elements, Options and Tactics for Brand Elements; Integrating Marketing Communications to Build Brand Equity-Information Processing Model of Communications, Overview of Marketing Communication Options, Developing Integrated Marketing Communications Programs; Leveraging Secondary Brand Knowledge to Build Brand Equity- Conceptualizing the Leveraging Process, Country of Origin and other Geographic Areas, Channels of distribution , Co- branding, ,Licensing, Celebrity endorsement, Sporting , Cultural, or Others Events, Third Party Sources.

Unit VII: Global Brand Expansion - Managing Brands over Geographic Boundaries and Market Segments- Rationale for Going International, Advantages of Global Marketing Programs, Disadvantages of Global Marketing Programs , Standardization Versus Customization, Global Brand Strategy , Building Global Customer- Based Brand Equity.

Fighting Generics And Private Labels, Brand Extensions - Designing and Implements Branding Strategies- The Brand Product Matrix ,Brand Hierarchy, Designing a Branding Strategy.

Unit VIII: Brand Architecture - Managing Brands over Time- Reinforcing Brands, Revitalizing Brands, Adjustments to the Brand Portfolio.

Unit IX: Branding Licensing - Introducing and Naming New Products and Brand Extensions- New Products and Brand Extensions, Advantage of Extensions, Disadvantages of Brand Extensions , Understanding How Consumers Evaluate Brand Extensions, Evaluating Brand Extension Opportunities.

Unit X: Closing Perspective - Strategic Brand Management Guidelines, What Makes a Strong Brand? Special Applications, Future Brand Priorities.

## Specialization GROUP B:( FINANCE)

### 1. Corporate Taxation

#### SECTION A

Unit I: Definition of Income & Assesse, Previous year, Assessment year, Gross total income, Total taxable income, Residential status, Agricultural income.

Unit II: Distinction between capital and revenue receipts; Income from Business & Profession (excluding professional income) Income from capital gains and income from other sources relating to company assessee only.

Unit III: Income from capital gains and income from other sources relating to company assessee only.

Unit IV: Income exempt from tax, Tax rebates, Deductions relating to company assessee only. Set off & Carry forward of losses, TDS, Self assessment tax, Filing of return.

Unit V: Tax Planning - Concept, Tax Planning with reference to setting up of new business, Financial management decisions & Employees remuneration.

#### SECTION B

Unit VI: Special features of Indirect tax levies - All pervasive nature, contribution to Government revenues; instruments of planning, Development and fiscal performance; Constitutional provisions authorizing the levy and collection of duties of central excise, Customs and central sales tax.

Unit VII: Central Excise Laws - Basis of chargeability of duties of central excise- goods, Manufacture, Classification and valuation of excisable goods- specific issues and case studies; Assessment procedure, Exemption, Payment, Recovery and refunds of duties.

Unit VIII: Central sales tax - Scope of levy of Central Sales Tax; Inter-State sale, Sale outside a State and sale in the course of import and export-basic principles; Registration of dealers and determination of taxable turnover.

Unit IX: Service Tax - Provisions of law and procedures; VAT – concept, Applicability, Procedures involved and implications of the VAT.

Unit X: Customs Laws - Nature of customs duty, Types of customs duty, Classification for Customs and rate of duty, Valuation for customs duty, Provisions regarding baggage, Courier, Postal articles and stores.

### 2. Project Planning & Financial Strategies

#### SECTION – A

Unit I: Project Management - (a)Planning: Generation & Screening of project ideas, Market & Demand Analysis, Technical Analysis , Financial estimates & projections(b) Financing: Intermediate & Long term financing, Appraisal of term loans by Financial Institutions.

Unit II: Risk Analysis in Capital Budgeting - Sources & perspective of risk, Sensitivity analysis, Scenario analysis, Breakeven analysis, Miller Model, Simulation analysis, Decision tree analysis, Corporate risk analysis, Managing risk, Project selection under risk, Risk analysis in practice.

Unit III: Capital structure & Value of firm - Assumptions & definitions, NI approach, NOI approach, Traditional Position, MM position, Taxation & capital structure, Trade off theory, Signaling theory.

Unit IV: Working Capital Management - Estimating working capital, cash cycle analysis, Working capital finance from banks.

Unit V: Mergers & Takeovers - Introduction, Motives, Categories, Financial evaluation, Economic value added & market value added Taxation aspects.

#### SECTION B

Unit VI: Leasing, Hire-purchase & Project Finance - Types of leases, rationale for leasing, Mechanics of leasing, Operating lease, Leasing as financial decision, Hire-purchase arrangement, Choice between leasing & hire purchase, Project finance, Lease Vs borrow & buy evaluation.

Unit VII: Management of Cash - Motives of holding cash, factors determining the cash balance, Managing the cash flow, Cash budget, Reports for control, Cash collection & disbursement, Options for investing surplus funds & strategies for managing surplus funds, Models- The Baumol model, The Beranek Model, The Miller-Orr Model.

Unit VIII: Management of Receivables - Credit policies, Evaluating the debtors, Credit analysis & decision, Credit terms & collection policies, Control of accounts receivables, Heuristic approach

Unit IX: Corporate Valuation - Adjusted book value approach, Stock & debt approach, Direct comparison approach, DCF approach, Cash flow forecast, Continuing value, Firm value, 2 stage, 3 stage approach, inflation & asset revaluation, EVA & MVA approach.

Unit X: Performance measurement & balance score card - Rationale, Financial measures, Non financial measures, Balance score card, Part system, performance excellence awards, Divisional performance measurement, Strategic performance measurement, Memorandum of understanding.

## GROUP C:( HUMAN RESOURCE)

### 1.Group & Organisational Effectiveness

#### SECTION A

Unit I: Introduction - Definition and Meaning, Scope, Importance, limitations of O.B., Foundations of O.B., Models of O.B., Key elements in O.B. Approaches to O.B. (a) Human resource approach (b) Contingency approach (c) System approach (d) productivity approach.

Unit II: Learning - Definition & Meaning; learning explicit and tacit knowledge, principles, learning curves, learning styles, Theories of learning.

Unit III: Motivation and Morale - Nature and importance of motivation, theories of motivation (a) Maslow (b) Herzberg (c) Aldefer (d) McClelland (e) Vroom theory, cases on motivation and its application, Morale and work performance, Model of Morale (esprit de corps) surveys.

Unit IV: Personality and Perception - Determinants of personality, Types of personality, Theories of personality, Perception & O.B., Managing the perception process, Components of attitudes, formation of attitudes, changing attitude, emotional intelligence, spiritual intelligence, Johari Window, Stress: Causes, effects, stress management techniques.

Unit V: Transactional Analysis - Ego states and their identification, Types of Transactions, Cases on T A.

#### SECTION B

Unit VI: Group and Team Dynamics - Nature of teams, types of teams, benefits from teams, types of groups, group development, determinants of group behaviour Teams vs. Groups.

Unit VII: Power & Conflict - Power dynamics, sources of power, power tactics, nature of conflict, types of conflict, Conflict process, levels of conflict, conflict resolution, cases on power & conflict.

Unit VIII: Leadership - Importance of leadership, Leadership styles and their implications, Theories of leadership (a) Trait approach (b) behavioral approach (contingency approach).

Unit IX: Organizational Culture - Innovation, Meaning and Definition, Effects of culture, Creation of culture, Innovation in organization, Innovation process, cases on culture & innovation.

Unit X: Organizational Change & Development - Nature of change, causes for change, Types of change, change process, Resistance to change, Force field theory of change, Dominos effect, OD - Pre-requisites for OD, OD Interventions, Organisational effectiveness.

## 2. Performance Management & Compensation

### SECTION A

Unit I: Job Evaluation / Grade Structure - a. Purpose and Methods of Job Evaluation, Ranking Systems, Job Classification / Grading method, Points System, Factor Comparison Method, Packaged Point Plans, Implementation; b. Job Analysis; Nature/Use, Methods, Job Identification Summary, Relationships, Responsibilities and Duties, Writing Job Specifications and Descriptions – Judgmental and Statistical Methods.

Unit II: Compensation Planning - Concepts, Nature and objectives of Compensation, Wages, Wage Fixation, Wage differentials, legal Status of Wages (basics), Wage Plans – Rowan /Halsey.

Unit III: Wages – Variable Compensation and Supplementary Compensation – Perks, Fringe Benefits, Pay for Performance – Incentives.

Unit IV: HR Accounting - Introduction, Cost of Recruitment, Remuneration, Investments in Organisational HR, Return on Investment in HR.

Unit V: Competency Mapping / Workflow Mapping - Concept, Practical Application, Implementation

## SECTION B

Unit VI: Performance Management System - Introduction, Objectives, Tools, Methods of PA, Graphic Rating Scales, BARS, Alternation Ranking, Forced Distribution Method, Critical Incident Method, MBO, Assessment Centers, Group Appraisal; 360 deg Feedback, Appraisal Interview; Performance Planning and Potential Appraisal – Trait Based, Behavior Based and Result Based, Pitfalls.

Unit VII: Career Management - Career Development Plan - Employee's and Employer's Role, Career Anchors, Nature of Careers, Career Problems – Low ceiling Careers, Career Mapping, Career Counseling, Succession Planning.

Unit VIII: HR Scorecard / Balanced Scorecard - Introduction, Concept, Structure, Practical Application.

Unit IX: Ancillary Topics - Goal Setting, Promotions and Transfers; Separations- Retirement, VRS, Deputation, Death, Retrenchment, Pink Slips.

Unit X: Models and Cases - Constructing and developing models of PMS, Competency Mapping, Career Plans, Employee Manual / PPP Handbook.

## Specialization GROUP D :( INFORMATION SYSTEM MANAGEMENT)

### Database Management Systems

#### SECTION-A

Unit I: Introduction to Database Management System - DBMS (Database Management System), FMS(File Management System), FMS Versus DBMS, Over view of DBMS, DBMS Model, DBMS Architecture.

Unit II: Database Design - Design Consideration, Decomposition, Functional Dependency, Normalization, 1NF(First Normal Form), 2NF(Second Normal Form),3NF(Third Normal Form),BCNF(Boyce-Codd Normal Form) (First Normal Form),4NF(Fourth Normal Form),5NF(Fifth Normal Form), De-normalization.

Unit III: Entity / Relationship (ER) Modeling - Aspects of ER modeling, Types of Relationship, Practical Applications, Developing of ER Diagrams of various systems (e.g. Organizations, Educational Institutions and any live entity examples).

Unit IV: Database Security - Threats & Risk, Cryptography, Digital Signature, Database Control, User & Database Privileges.

Unit V: Relational Model - Relational Database Primer, Relational Database Characteristics, Relational Algebra, Relational Calculus, Database Integrity, Keys, Entity & Referential Integrity, Views, Joins.

#### SECTION-B

Unit VI: Brief Introduction to SQL - History & standardization of SQL, Benefits of SQL, Elements of SQL languages, Database Objects, Reserve words, Variables, data types, DDL commands(CREATE, DROP, MODIFY, ALTER), DML COMMANDS (INSERT, UPDATE,DELETE, SELECT), DCL commands, Embedded SQL, Dynamic SQL.

Unit VII: Oracle - Introduction to Oracle as RDBMS, Oracle as Multi-user, System Login & Logout of ORACLE., PL/SQL Programming, Introduction to PL/SQL, Control & Loop Statements, User defined , Predefined exception, subprograms and packages.

Unit VIII: Database Triggers & Built-in Packages - Database Triggers-syntax, parts, statements, body restriction, types, Built in packages-DBMS Standards, DBMS-OUTPUT: Collection, member functions and procedures, PL/SQL table & records, Declaration, referring, maintaining row count, insertions, deletions, nested tables, varying arrays, initialization, declaration, member functions & procedures.

Unit IX: Object Technology - Introduction to Object Technology, Abstraction, Encapsulation, Inheritance, Object Technology & RDBMS, Object Oriented Database Management System (OODBMS).

Unit X: Advanced Topics in DBMS - Deductive Databases: features, Overview of Logic, knowledge representation, Internet & DBMS, Multimedia Database, Digital Libraries, Mobile Databases.

## 2. Internet Technologies & Trends

### SECTION-A

Unit I: Internet - Working of Search Engines: Yahoo, Google, Dogpile and Met Crawler, Mailing: Authorization, Working of Rediffmail, Hotmail and Yahooemail, Chatting: RLC Concept, Video Conferencing.

Unit II: IT Trends - Worldwide Computer and Internet Use, Wireless Communication, IT Transforming our Values, Lives and Work, Maturity of IT Related Industries, Nanotechnology, Increasing demand of skilled workers, India's Future in response to this changes.

Unit III: Data Mining - Concept, Terminology, Functions, Applications, Types (Text, Concept, Graph, Sequence, Tree), Techniques, Software.

Unit IV: Data Warehousing - Concept, History, Storage Methods, Success Parameters, Software Evaluation, Architecture, Developing Strategy, Use in Strategic Decision Making, Maintenance Issues, Web Data Analysis.

Unit V: Knowledge Management - Concept, Need, History, Approaches, Challenges, Supporting Technologies, Related Business Strategies, Chief Knowledge Officer, Emerging Perspectives, Relation to SNA (Social Network Analysis).

### SECTION-B

Unit VI: E-Learning - Categories (Library / Bookshop, Showcase, Product & Services, Events), Virtual Classrooms, E-Learning in Education, Government and Telecom, Trends in e-Learning.

Unit VII: e-Governance - Need, Scope and Challenges for e-Governance applications, Success stories from India (ap-it.com), huge value addition by citizen centric e-Governance applications.

Unit VIII: e-Business - Architecture, Digital Marketing Strategy, Digital Productivity, IT Products and Services, Interdependence of Security and the Extended Enterprise, e-Business for SME, Organic Growth.

Unit IX: Evolution of e-Commerce - Historical Development, Success Factors, Working, Market Size, Trends, Strategies: Yahoo, Google, MySpace, eBay, Comparison of e-Commerce Solutions: B2B and B2C, M-Commerce.

Unit X: Role of IT in different verticals - Banking, Financial Service and Insurance (BFSI): TCS, Infosys and Wipro, E-Tailing /Retail: TCS, Telecom: TechMahindra and Telecom Operators: Airtel, Reliance Infocomm, Hutch, BSNL, Idea, Spice. Case studies of important portals: Jobs: Timesjobs, Monster, Naukari, Matrimony: Shadi.com, Auction: eBay, Books: - Amazon, Financial Information: MoneyControl, EasyMF, Media: Indiatimes, Yahoo and Google.

## Specialization GROUP E:( HEALTHCARE MANAGEMENT)

### 1. Community Health, Epidemiology & Population Management

#### SECTION-A

Unit I: Meaning and scope of epidemiology.

Unit II: Models and factors associated with health and diseases.

Unit III: Health statistics and health indicator, Morbidity, Mortality.

Unit IV: Data sources, collection, analysis and uses, Health Information System, Use of Computers.

Unit V: Primary health care and community participation.

SECTION-B

Unit VI: Organizational aspects of community health.

Unit VII: Clinical care

Unit VIII: Physical aspects of community health, Psychological aspects of community health  
Special aspects of community health, Drugs, Alcoholism etc

Unit IX: Preventive and promotive health care.

Unit X: Population policy, Planning and management.

## 2. Healthcare and Social Policy

SECTION-A

Unit I: Social Welfare, Social policy.

Unit II: Health care and Social development.

Unit III: Public and Social policy: Approaches to analysis, Resources, Structure and Organisations.

Unit IV: Factors in Social Policy: Situational, Structural, Ideological and Environmental.

Unit V: Health Policy formulation: Factors, Determinants and other sectoral issues.

SECTION- B

Unit VI: National health policy: Review of different committees.

Unit VII: Distribution of health services in India: Disparities.

Unit VIII: Health policy: Input, Output and Performance; Role of Private and Voluntary groups;  
Role of national and International agencies.

Unit XI: Health and Social Policy: International Perspective; Health policy the Disadvantaged.

Unit X: Case studies on any of the above topic.

## Specialization GROUP F :( INTERNATIONAL BUSINESS MANAGEMENT)

### International Financial Markets

SECTION- A

History of the International Financial System-The rise and Fall of Bretton Woods, Globalisation and the Growth of Derivatives, The Crash of 1994-96 and Beyond, Euro-currency Market, Euro-banking and Euro-currency Centers, Deposit Dealing and the Term Structure of Euro-currency Rates, Euro-currency Futures and Options, Syndicated Euro-credits, International Bond Markets-Introduction, New Issue Procedures in the Eurobond Markets, Eurobond; Valuation and Hedging, Interest Rates and Currency Swaps, Pricing Option, Features of International Bonds.

SECTION- B

Forecasting and the Image of the Future- Central Banks and the Balance of Payments, The European Monetary System and Other Regional Artificial Currency Areas, New Instruments in International Capital Markets, International Banking and Country Risk, International Portfolio Diversification, International Transfer Pricing.

### 2.Foreign Exchange Management

SECTION- A

Types of Foreign Exchange Markets and Transactions, Quoting Foreign Exchange Rates, Spread, Official and Free Market Rates, Cross Rates, Forward Rates, Quoting Forward Rates, Organisation of the Foreign Exchange Markets, Currency Futures, Currency Options; Currency Swaps; Corporate Exposure Management; Alternative Definitions of Foreign Exchange Risk.

SECTION- B

Exposure Information System, Alternative Strategies for Exposure Management, Exposure Management Techniques, Organisation of the Exposure Management Function, Parameters and Constraints on Exposure Management; Theory and practice of Forecasting Exchange Rates-Economic Fundamentals, Financial and Socio-Political Factors, Technical Analysis; Tax Treatment of Foreign Exchange Gains and Losses; FEMA.

## Specialization GROUP G :( OPERATIONS MANAGEMENT)

### Project Management

#### SECTION A

Unit I: Project Management Concepts - Characteristics of a project Need for project management, Roles of project managers.

Unit II: Project Organizational Structures and Behaviors - Organisation for projects, Roles and responsibilities of project team members and team leader, Different types of teams, Identify leadership styles of project managers, Techniques used to manage groups and individuals, Identify sources of diversity, either corporate or ethnic, that impact project team effectiveness.

Unit III: Project Planning: Statement of work (SOW) and overall project goals, Work breakdown structure (WBS), Preparation of Task-Flow network, CPM-PERT, Gantt chart, Schedule the completion of all work elements, Planning project communication, Quality Planning.

Unit IV: Cost Estimating and Budgeting - Preparing cost estimates, budgets and expenditures, Effort and Time estimation, Developing cost summaries for tracking project expenditures, Developing cost forecasts to proactively control future planned expenditures.

Unit V: Resource Allocation - Identifying resource requirement, Scheduling resources, Analyze optimal labour utilization for cost effectiveness and schedule efficiency.

#### SECTION B

Unit VI: Project Performance Measurement and Control - Concept of earned value performance measurement, Use of Project Management Information Systems (PMIS) to monitor, evaluate, and control planned cost and schedule performance, Conducting periodic project performance evaluation audits.

Unit VII: Project Evaluation and Termination - Analyzing project performances versus cost and schedule constraints, Identify causes associated with project success and failure. Ways in which a project can be terminated upon completion.

Unit VIII: Contracting For Project Managers - Define contract administration and its role in project management, .Project Procurement cycle, Contract Administration policies and procedures, Select contract types for various situations, Contract Proposal Development, Contract Terms & Conditions, Contract Negotiation.

Unit IX: Risk Management Process - Analyze the risk management process cycle within a company, Defend the role of risk management in overall project management, Identify risk management activities throughout the project life cycle, Identify the risk management process.

Unit X: Introduction to Project Management Software and Case Studies - Introduction to MS-Project software, Study of Recent Case-Studies in project management.

### 2. Business Process Reengineering

#### SECTION A

Unit I: Introduction to BPR - What is BPR? Need of BPR, BPR in USA, Europe, India.

Unit II: Process Analysis - Identify business process to be redesigned, Measure the existing process; Customer, Competition, Cost and Technology as Drivers.

Unit III: IT and Learning in Organizations - Information- A source of knowledge, Integration of knowledge & information.

Unit IV: Cultural Factors in Managing Process Improvement - Understanding LPG, Managing people with multi-cultures and ethnic groups in process improvement.

Unit V: Redesigning Business Processes - Identifying key issues, breakpoints, Selecting the leader and team, technology, designing the process.

## SECTION B

Unit VI: Employee Incentives - Motivating employees, Designing incentive schemes for employees.

Unit VII: Managing Quality - Managerial responsibility in Managing quality, Managing for Quality.

Unit VIII: Managing Change - Dynamics of Change Management, Understanding behaviour, Changing attitudes and behaviours.

Unit IX: Trends & Techniques - FMS, CAD/CAM, Robotics and Robots, Group Technology, Trend in Service Automation.

Unit X: Case Studies based on above topics.

## Specialization GROUP H :( BANKING & FINANCIAL SERVICES MANAGEMENT )

### Banking In India

#### SECTION A

Unit I: Overview - Definition-utility of banks – banks and economic development -types of banks with their individual functions –Role of RBI – Monetary management –business in the globalized era, Rights of a banker, Clayton's case, Banker's Obligation to honour cheques, Secrecy of customers' accounts.

Unit II: Customers' Accounts - Introduction for opening new accounts, opening of savings, current and fixed deposit accounts Minor's accounts, Club accounts, Partnership accounts, Joint stock company's account. Attorney's account, Joint accounts, Insolvency of the customer.

Unit III: Payment of Cheques - Form of Cheque, Date, Amount, Insufficiency of funds, customer's signature, Countermanding payment of cheque, Crossing, Not Negotiable Crossing, Endorsements and Effect of Material Alterations.

Unit IV: Collection of Cheques - Liability for conversion, Protection to the collecting Banker, Duties of Collecting Banker.

Unit V: Bills of Exchange - Definition, Parties, Accommodation Bill, Calculation of Date of Maturity, Dishonour of Bills, Noting and Protesting, Drawee in Case of Need.

#### SECTION B

Unit VI: Bank Drafts

Unit VII: Advances - Advances against various securities, Life Policy, Fixed Deposit Receipt, Goods, Shares, Advances against Guarantees, Advances to Small-scale industries, Registration of Charge under Companies Act, 1956. Accounts Receivable financing Advances for priority sectors—Hypothecation, Documentation.

Unit VIII: Guarantees.

Unit IX: Balance Sheet Study.

Unit X: Customer Service in Banks.

## 2. Financial Services

#### SECTION A

Unit I: Overview –Financial System and Financial Markets, Participants in Financial Markets and Financial Services: An Introduction.

Unit II: Financial Services: An Overview– Management of Risk in Financial Services and Regulatory Framework for Financial Services.

Unit III: Financial Market Operations– Stock Exchange: Functions and Organizations, Broking and Trading in Equity.

Unit IV: Financial Market Operations –Broking and Trading in Debt, Mutual Funds.

Unit V: Merchant Banking Services - Merchant Banking: An Introduction, Issue Management.

#### SECTION B

Unit VI: Restructuring & Merger - Corporate Restructuring and Mergers and Project Financing.  
Unit VII: Asset Financing Services - Leasing and Hire Purchase and Debt, Securitization.  
Unit VIII: Credit Rating - Housing Finance and Credit Rating.  
Unit IX: Allied Financial Services - Credit Cards, Financial Services by Banks and Insurance Companies.  
Unit X: New Services in Banking - Venture Capital, Factoring, Forfeiting and Bill Discounting.

## Specialization GROUP I : ( AGRI-BUSINESS MANAGEMENT )

### Agri-Input Management

#### SECTION A

Agri-Input Management: Introduction, Concept of Agricultural Inputs; Fertilizer Technology and Management: Role of fertilizer in agri production, raw materials needed for and principles of manufacture of nitrogen, phosphatic, and potassic fertilizers, secondary nutrient sources and micronutrients formulation infrastructures for marketing and distribution of fertilizers; fertilizer quality control and pricing policy, constraints in fertilizer use and emerging scenario of fertilizer use, scope of bio-fertilizers; environmental pollution due to fertilizers. Laboratory exercises will include fertilizer sampling, quality evaluation, formulation of fertilizer mixture, and methods of fertilizer recommendation for crops, study of fertilizer marketing systems. Demand and supply scenario of major agro inputs seed, fertilizers, agrochemical tractor and other farm machines, pricing agro inputs; information system for agro-input marketing

#### SECTION B

Agro-Chemicals & Technology Management: Role, status and organisation of agro-chemical industry in the Country; alternate of novel methods of pest control, integrated pest management; role of biological controls as plant protection methods; methods of quality control qualitative and quantitative agrochemicals and residue analysis; guidelines for the use of agrochemicals, environment; adulteration and legal requirements. Seed Production Technology: Importance of quality seeds in agriculture; principles and methods of seed production of cereals, pulses, oilseeds and miscellaneous field crops; principles of seed certification and certification agency, seed laws and seed law enforcement; seed processing drying, cleaning, grading, treatment, weighing, bagging and handling of seeds; installation and management of seed processing plants- Seed storage; loss of seed viability during storage; seed packaging storing breeder, foundation and certified seeds; Seed industry in India-present status and future prospects; role of public, private and cooperative sectors; national policy and programmes seed demand and supply; forecasting seed demands; seed trade and export potential, organization of seed industry in India; Human resource development in seed industry , managing seed industry efficiently.

### 2.Agri-Technology Management

#### SECTION A

Management of Floriculture and Landscaping: Recent advances in floriculture industry; evolution of new cultivators and production technology of ornamental plants; special techniques for forcing of dehydration of flowers; response of flowers to environmental conditions landscape gardening; style of gardening, Anaesthetic and Socio- aesthetic newly developed towns and cities; commercial cultivation of flower crops: rose, gladiolus, tuberose, marigold, aster, carnation, cilium chrysanthemum, use of plant sircquors flower production, extraction, purification and storage of essential oils and perfumes; post harvest changes in cut flowers, storage and packing of cut flowers determining optimum time harvesting of flowers for export and home use.

## SECTION B

Management of Biotech Industries: The course content includes agricultural needs & application of biotechnology for agricultural uses and benefits; tissue culture, disease surveillance and diagnostics industries bioprocess engineering and quality products and productivity based industries, their structure, quality parameters, marketing, Intellectual Property Rights bio-diversity concepts and social and legal implications.

## Specialization GROUP J :( POWER MANAGEMENT)

### 1. Energy Conversion & Power Plant Systems

#### SECTION A

Sources of energy, classification of energy sources, quality & concentration of energy source, fossil fuel: coal, oil gas, Alternative sources of energy, geothermal, tidal & nuclear energy Solar, wind hydro power bio mass fuel cell, MHD, Resources of energy use pattern in different regions of the world, global trend for clean technology

#### SECTION B

Types of power station, steam power station based on fossil fuels, thermal power plant equipment: boiler, turbines, generator etc, gas turbine power station. Combined cycle power plant, cogeneration concept cogeneration alternative; Fluidized bed technology ,recent advance in power plant IGCC ,HYDRO power generation ,nuclear power plant diesel engine ,study visit to power plant.

### 2. Electricity Industry Structure & Regulations

#### SECTION A

Understanding the present environment, Introduction to Electricity industry Structure in India & abroad, Indian Electricity Act-1910, Indian electricity (Supply) Act- 1948, Industrial Safety Act-1948; Electricity Bill 2001, Implication on Industry on Industry , Restructuring and Reforms of Power Sector, privatization and Implication.

#### SECTION B

Role of regulatory commissions, Indian and international scenario, Deregulation process- abroad and implications; Energy Conservation act-2001, implications, Role of generator, distributors, consumers, manufacturers etc; Economics of energy conservation including tax relief and other incentives Role of various institutions