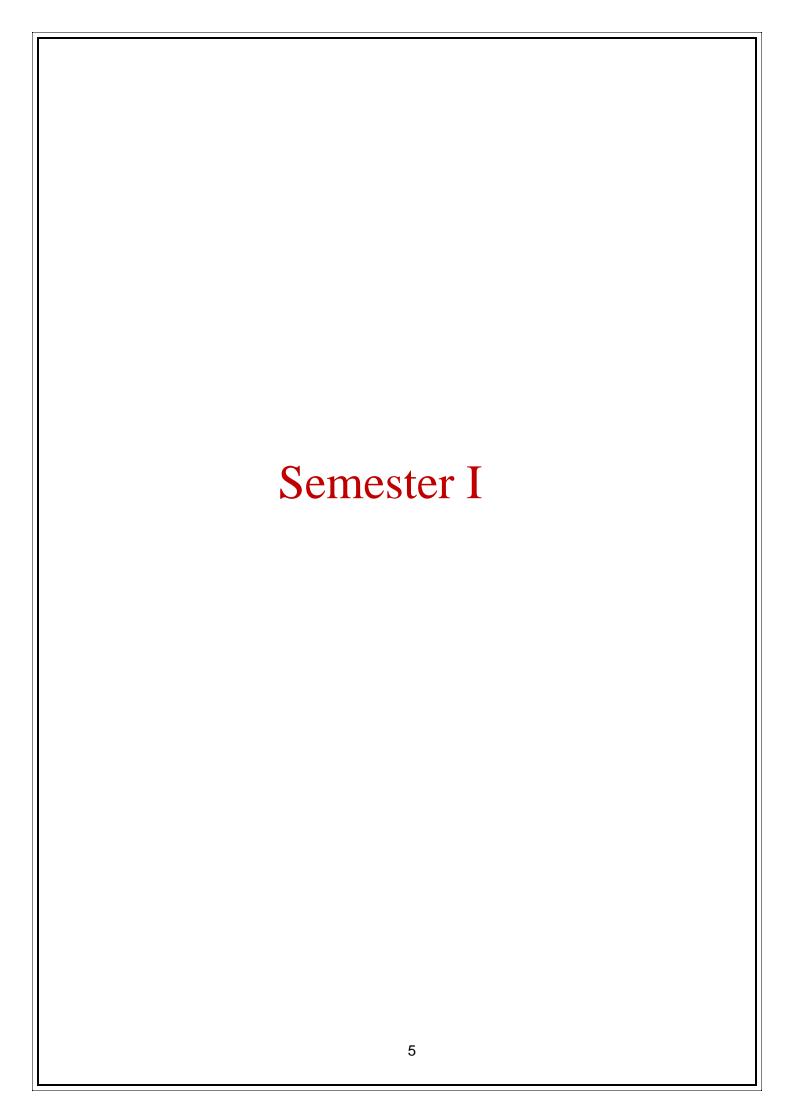


Table: Apprenticeship Embedded Degree Program: Three/Four year Bachelors in Commerce with Double Major in Logistics and Commerce (Eligibility: Anyone who has completed Higher Secondary or Equivalent belonging to any stream — Arts/ Science/ Commerce/ Vocation/ Diploma in Engineering) w.e.f. 2025-26

Semester	Core-I (Credit 4)	Core-II (Credit 4)	Core-III (Credit 4)	MDC (Credit 3)	AEC (Credit 4)	SEC (Credit 3)	VAC (Cre dit 3)	Com muni ty Enga geme nt & Servi ces/ Field work/ Inter nship	Total Cred it
Semester I	1.Fundamenta ls of Logistics 2.Materials Management 3.Warehousin g & Distribution Centre Operations 4.Freight Forwarding (Ocean& Air Cargo)	Financial Accounting				Business Organisatio n & Manageme nt	Envir onme ntal Studi es and Disas ter mana geme nt		26
Semester II	5.Forecasting and Inventory Management 6.Surface Transportation 7.Data Spread Sheet 8.MIS for Logistics		Corporate Accountin g and Reporting	Business Statistics and Data Interpreta tion	English: Busines s Commu nication		Good Citiz enshi p		30
Semester III	9.Retail Logistics and E-Commerce 10.Linear Logistics 11.Port Terminal Logistics 12.Specializati on Module – Course I	GST & Indirect Tax	Managem ent Accountin g	Financial Market & Institution					27

Semester	Core-I (Credit 4)	Core-II (Credit 4)	Core-III (Credit 4)	MDC (Credit 3)	AEC (Credit 4)	SEC (Credit 3)	VAC (Cre dit 3)	Com muni ty Enga geme nt & Servi ces/ Field work/ Inter nship	Total Cred it
Semester IV	13.Specializati on Module – Course II 14.Business Data Analysis 15.Business Application Software	Corporate Legal Framework	Auditing & Corporate Governan ce		English: Word and Presenta tion Skills	Business Regulatory Framework			27
Semester V	APPERENTIC ESHIP (Credit 20)								20
Semester VI	APPERENTIC ESHIP (Credit 20)								20
Credit Summar y	15 x 4 = 60 (+ 40)	3 x 4 = 12	3 x 4 = 12	2 x 3 = 6	2 x 4 = 8	2 x 3 = 6	2 x 3 = 6		150
Semester VII	16.Research Methodology & Research Ethics 17. Fundamentals of Securities Analysis and Portfolio Management 18. Fundamentals of Operations Research and Quantitative Techniques	19. Corporate Restructuri ng and Business Valuation 20. Internation al Business Environme nt							20

Semester	Core-I (Credit 4)	Core-II (Credit 4)	Core-III (Credit 4)	MDC (Credit 3)	AEC (Credit 4)	SEC (Credit 3)	VAC (Cre dit 3)	Com muni ty Enga geme nt & Servi ces/ Field work/ Inter nship	Tota Cred it
Semester VIII	21. Sustainable Development & Corporate Social Responsibility 22. Fundamentals of Commodity Markets							Resear	20
	3x4 = 12 + 2x4 = 8	2x4						12	190



Semester	Core -I	Core -II	Core -III	Multi-	AEC	SEC	VAC
				disciplina			
				ry			
Semester	1.Fundamentals of	Financial				Business	Environment
I	Logistics	Accounting				Organisation	al Studies
	2.Materials					Management	and Disaster
	Management						management
	3. Warehousing &						
	Distribution Centre						
	Operations						
	4. Freight						
	Forwarding						
	(Ocean& Air						
	Cargo)						

Semester-I PAPER I

Fundamentals of Logistics

Credit 4

Unit -1: Introduction to Logistics:

History of Logistics Need for logistics- Cost and Productivity, cost saving & Productivity improvement. Logistics Cost, reduction in logistics cost, benefits of efficient Logistics, Principles of Logistics, Technology & Logistics -Informatics, Logistics optimization. Listing of Sub-sectors of Logistics.

Unit -2: Logistics and Customer Service:

Definition of Customer Service Elements of Customer Service-Phases in Customer Service-Customer Retention - Procurement and Outsourcing - Definition of Procurement/ Outsourcing - Benefits of Logistics Outsourcing - Critical Issues in Logistics Outsourcing.

Unit -3: Global Logistics:

Global Supply Chain - Organizing for Global Logistics-Strategic Issues in Global Logistics - Forces driving Globalization - Modes of Transportation in Global Logistics Barriers to Global Logistics - Markets and Competition - Financial Issues in Logistics Performance - Integrated Logistics - Need for Integration - Activity Centers in Integrated Logistics. Role of 3PL&4PL.

Unit -4:

- a) Warehouse: Warehouse-Meaning, Types of Warehouses Benefits of Warehousing.
- b) Transportation- Meaning; Types of Transportations, efficient transportation system and Benefits of efficient transportation systems.
- c) Courier/Express Courier/Express-Meaning, Categorization of Shipments, Courier Guidelines, Pricing in Courier Express Sector for international and domestic shipping.
- d) E-Commerce Meaning, Brief on Fulfillment Centers, Reverse logistics in e-commerce sector, Marketing in e-commerce and future trends in e-commerce.

Unit -5:

- a) EXIM: Brief on EXIM/FF&CC, Multi-modaltransportation, brief on customs clearance, bulk load handling and brief on trans-shipment.
- b) Supply chain.
- c) Cold chain.
- d) Liquid Logistics.
- e) Rail Logistics

- ✓ Course Material Prepared by LSC
- ✓ Fundamentals of Logistics Management (The Irwin/Mcgraw-Hill Series in Marketing), Douglas Lambert, James R Stock, Lisa M. Ellram, McGraw-hill/Irwin, First Edition, 1998.
- ✓ Vinod V. Sople (2009) Logistic Management (2nd Edn.) Pearson Limited.
- ✓ Logistics Management for International Business: Text and Cases, Sudalaimuthu & Anthony Raj, PHI Learning, First Edition, 2009.
- ✓ Fundamentals of Logistics Management, David Grant, Douglas M. Lambert, James R. Stock, Lisa M. Ellram, McGraw Hill Higher Education, 1997.
- ✓ Logistics Management, Ismail Reji, Excel Book, First Edition, 2008.

PAPER II

Materials Management

Credit 4

Unit-1: Introduction:

Materials Management - Evolution, Importance, Scope and Objectives- Interface with other functions. -Supply Chain Management -Objectives- Components, Trade off Customer Service & Cost. Supply Chain Analytics.

Unit-2: Purchasing:

Purchasing and procurement activities under Materials management- Purchasing Methods-Purchasing and quality Assurance- Purchase Cycle – governmental purchasing practices and procedures - Negotiation & Bargaining – Vendor relations

Unit-3: Inventory:

Need of Inventory -Types of Inventory - Basic EOQ Model - EOQ with discounts - Different types of Analysis. Forecasting -methods of forecasting-Material Requirement Planning (MRP) - Input and output of MRP system -BOM Explosion -MRP II.

Unit-4: Quality control of material:

Incoming material quality control- statistical quality control (Various control charts) - Inventory control & Cost Reduction techniques. Value Analysis & Value Engineering. Standardization – need and importance. Codification - concept, benefits.

Unit-5: Stores:

Functions- Stores layout-documentation- Materials handling and storage systems,- Principles of Materials Handling system – Safety issues

- ✓ Course Material Prepared by LSC
- ✓ Materials management: procedures, text and cases A.K. Datta
- ✓ Materials management: An integrated approach P. Gopalakrishnan
- ✓ Introduction to Materials management J.R. Tony Arnold & Stephen N. Chapman
- ✓ Purchasing and Materials Management K S Menon
- ✓ Handbook of Materials Management Gopalakrishnan

PAPER III

Warehousing & Distribution Centre Operations

Credit 4

Unit-1: Introduction to Warehouse (Storage and Packaging) Background - Types of Warehouses - Broad functions in a warehouse - warehouse layouts and layout related to functions. Equipment requirement in warehouse -Strategic Aspects of Warehouse.

Unit-2: Receiving of Goods-Advanced shipment notice (ASN)-Goods Receipt note-(GRN)-Stages involved receipt of goods-Visual inspection of goods unloaded-Formats for recording of goods unloaded from carriers- Procedure for Arranging of goods on dock -Put away of Goods- its activity-Put away list and its need-Put away of goods into storage locations-storage location codes and its application

Unit-3: Procedure to prepare warehouse dispatches-Preparing Packaging List/Dispatch Note-Packaging-its importance of packing-Packing Materials-reading Labels-quality parameters in packing significance-Cross Docking Method-and its application- Automation: Pick / Put-to-Light-A Frame -Automated Order Selection —Pick-N- Go - Outbound Sorters - Automatic Truck Loading.

Unit-4: Distribution – Definition – Need for physical distribution —concept—system perspective – functions of distribution —marketing forces affecting distribution. Channels of distribution: role of marketing channels – channel functions – channel structure —designing distribution channel – choice of distribution channels

Unit-5: Warehouse Safety Rules and Procedures: Hazardous cargo – Procedure for Identification of Hazardous Cargo - safety data sheet- Familiarization with the industry. Health, Safety & Environment - 5S Concept on shop floor. Personal protective Equipment's (PPE) and their uses.

- ✓ Course Material Prepared by LSC
- ✓ Definitive Guide to Warehousing, The: Managing the Storage and Handling of Materials and Products in the Supply Chain (Council of Supply Chain Management Professionals) 1st Edition
- ✓ Warehouse Management: A Complete Guide to Improving Efficiency and Minimizing Costsin the Modern Warehouse III Edition-Gwynne Richards

PAPER IV

Freight Forwarding (Ocean & Air Cargo)

Credit 4

Unit-1: Introduction to EXIM, Freight forwarding and custom clearance – types of custom clearances – Importance of custom clearance – certificate of origin, ICEGATE and insurance – custom Act – Regulations pertaining to custom clearance – different modes of freight forwarding – process of freight forwarding.

Unit-2: Operation Procedures of Freight Forwarding - The procedures for Pre-Operating Checks and Operational checks to be performed for every shipment / consignment

Unit-3: List of basic handling of errors and the Operational errors that occur in common - Procedure for checking of shipping bill, Airway bill based on invoice and packing list received from department for Freight Forwarding. Regulations (EXIM/IATA/Countries)/COM based on permutations and combinations of weight vs volume.

Unit-4: Cargo handling, INCO terms and terminologies used in Cargoes - Different Types of Cargoes for transportation. Full Export and Import value of the cargo – Importer and exporter Code (IEC), The registered PAN based Business Identification number received from the Directorate General of Foreign Trade -Different type of Cargo, their quantity and value - Packaging requirement for the cargo during shipment from the shipper- Inspection procedure for the cargo while unloading - DO's and DON'T's while handling different cargo

Unit-5: Documentation of Freight Forwarding process as per customer timelines and requirements - Carting, unloading, Stacking, Loading; and Stuffing - Procedure for dealing with loss or damage to goods - Different P.G.A and their roles. Technical knowledge on Containers; Pallets; Palletization; Fumigation- Letters of Credit and payment Terms. Etc. computer and its application in internal systems of documentation.

- ✓ Course Material Prepared by LSC
- ✓ J P Saxena, Warehouse Management and Inventory Control- Vikas Publication House Pvt Ltd, First Edition, 2003.
- ✓ Warehouse Management: Automation and Organisation of Warehouse and Order Picking Systems [With CDROM], Michael Ten Hompel, Thorsten Schmidt, Springer verlag, First Edition, 2006.
- ✓ Management Guide to Efficient Money Saving Warehousing, Stephen Frey, Gower, 1982.
 5. Swapna Pillai, Export Import Procedures & Documentation, Sahitya Bhawan Publication, 2020.

PAPER I

Financial Accounting

Credit 4

Course Objectives

The course aims to help learners to acquire conceptual knowledge on financial accounting, to impart skills for recording various kinds of business transactions and to prepare financial statements.

Course Outcomes

- At the end of this course the learner will be able to;
- Apply the generally accepted accounting principles while recording transactions and preparing financial statements of sole-traders;
- Compute depreciation and inventories to be recorded in financial statements
- Demonstrate accounting process under computerized accounting
- System;
- Create financial statements of sole proprietor and partnership firms;
- Prepare accounts for inland branches and not-for-profit organizations.

Unit I: Introduction

- Accounting principles: Concepts and Conventions. Introduction to Accounting Standards and Indian Accounting Standards (AS &Ind-AS), Accounting Cycle: Journal, Ledger, Trial Balance, Financial Statements (IND AS-1). Capital & Revenue Recognition (IND AS 18), Accounting for Inventory (IND AS-2)
- Depreciation (IND AS-16): Nature of depreciation causes of depreciation, Factors, Methods of computing depreciation; Disposal of depreciable assets- change of method, Relevant Accounting Standard.
- **Final Accounts**: Preparation of Financial Statements of a Sole Trader including adjustments. Errors & their rectification.

Unit II:

- Accounting for partnership Firms: Partner's Capital Accounts; profit and Loss Appropriation Account, Accounts Prepared on admission, Death and Retirement of Partners; Accounts on Dissolution of partnership Firm.
- Accounting for Hire purchase and Installment Purchase; Lease accounting (IND AS 116)/ Royalty accounting

Unit III: Accounting for Branch and Not-for Profit organizations

1. Accounting for Branch:

Concept of Dependent branches; Branch Accounting debtors system, stock and debtors' system, branch final account system and wholesale basis system. Independent branches: concept, accounting treatment with necessary adjustment entries; Incorporation of Branch Trial Balance in Head Office Books for home branches.

2. Accounting for Not-for-Profit Organizations

Meaning of Not-for-Profit Organization; Significance of Receipt and Payment Account, Income and Expenditure Account and Balance Sheet; Difference between Profit and Loss Account and Income and Expenditure Account; Preparation of Receipt and Payment Account, Income and Expenditure Account and Balance Sheet.

Unit IV: Computerized Accounting Systems

Computerized Accounting Systems: Computerized Accounts by using any popular accounting software Creating a Company; Configure and Features settings; Creating Accounting Ledgers and Groups; Creating Stock Items and Groups; Vouchers Entry; Generating Reports - Cash Book, Ledger Accounts, Trial Balance, Profit and Loss Account, Balance Sheet, and Cash Flow Statement. Selecting and shutting a Company; Backup, and Restore data of a Company.

Suggested Readings

- ✓ Goyal, Bhusan Kumar-Fundamentals of Financial Accounting Taxmann's.
- ✓ S.P. Jain and K.L. Narang- Financial Accounting—Kalyani Publisher
- ✓ Gupta R.L. Radhaswamy. M-Financial Accounting, Sultan Chand and Sons
- ✓ R.K. Mittal / M.R. Bansal/Sahadev Swain, Financial Accounting, VK Global Publication
- ✓ Tulsian P.C., Financial Accounting, Pearson Education
- ✓ S.N. Maheshwari, and. S. K. Maheshwari. Financial Accounting. Vikas Publishing House.
- ✓ Jawahar Lal & S. Srivastava, B. Com-Financial Accounting, Himalaya Publishing House.

SEC PAPER I

Business Organization & Management (Semester-I)

Credit 3

Course Objectives

The course aims to acquaint learners with the basics of Business concepts and functions, forms of Business Organisation and functions of Management.

Course Outcomes

At the end of this course the learner will be able to;

Course Outcomes At the end of this course the learner will be able to;

- Distinguish and explain each form of business.
- Prepare draft of Article of Association & Memorandum of Association for a business;
- Explain principles and functions of management implemented in the organisation;
- Identify the managerial skills used in business;
- Analyse the concept of Delegation of Authority, coordination, and control.

Course Outlines

Unit 1: Concept and Forms of Business Organisations

Concepts of Business, Trade, Industry and Commerce- Objectives and functions of Business-Social Responsibility of a business, Ethical Conduct & Human Values. Forms of Business Organisation-Meaning, Characteristics, Advantages and Disadvantages of Sole Proprietorship – Meaning, Characteristics, Advantages and Disadvantages of Partnership – Kinds of Partners - Partnership Deed - Concept of Limited liability partnership – Meaning, Characteristics, Advantages and Disadvantages of Hindu Undivided Family – Meaning, Advantages and Disadvantages of Co-operative Organisation and Joint Stock Company.

Unit 2: Principles and Functions of Management

Management - Meaning - Characteristics - Fayol's 14 Principles of Management. Functions of Management; Planning, Organising, Staffing, Directing, Coordinating and Controlling; Levels of Management, Skills of Management, Scientific Management - meaning, objectives, relevance and criticism.

Unit 3: Leadership and Management

Distinction between leadership and management, Leadership theories (trait theory, behavioural theory, contingency theory), Management styles (autocratic, democratic, laissez-faire), Developing leadership skills competencies

Suggested Readings

- ✓ Management Concepts and Organizational Behaviour" by K. Aswathappa published by Himalaya Publishing House, Cuttack, Odisha.
- ✓ Business Organisation and Management" by M. C. Shukla and T. S. Grewal published by Sultan Chand & Sons, Bhubaneswar, Odisha.
- ✓ Business Organization and Management" by K. C. Gupta published by V K Publications, Bhubaneswar, Odisha.
- ✓ Essentials of Business Organisation and Management" by S. K. Bhatia published by Kalyani Publishers, Cuttack, Odisha.
- ✓ Daft, R. L. (2015). Organization theory & design. Cengage Learning.
- ✓ Drucker, P. F. (2017). The effective executive: The definitive guide to getting the right things done. Harper Collins.
- ✓ Kotter, J. P. (2014). Leading change. Harvard Business Review Press.
- ✓ Mintzberg, H., Ahlstrand, B., &Lampel, J. (2019). Strategy safari: A guided tour through the wilds of strategic management. Routledge.
- ✓ Robbins, S. P., Coulter, M., &DeCenzo, D. A. (2017). Fundamentals of management. Pearson.

VAC

Paper I Environmental Studies & Disaster Management

Credit 3

Unit 1: Multidisciplinary nature of environmental studies (8 Periods)

- Definition, scope and importance
- Need for public awareness
- Environmental Pollution

Definition

- Cause, effects and control measures of:-
- a) Air pollution
- b) Water pollution
- c) Soil pollution
- d) Marine pollution
- e) Noise pollution
- f) Radiation pollution

Unit 2: Natural Resources: (8 Periods)

Renewable and non-renewable resources:

Natural resources and associated problems.

- a) Forest resources: Use and over-exploitation, deforestation, case studies. Timber extraction, mining, dams and their effects on forest and tribal people.
- b) Water resources: Use and over-utilization of surface and ground water, floods, drought, conflicts over water, dams-benefits and problems.
- c) Mineral resources: Use and exploitation, environmental effects of extracting and using mineral resources, case studies.
- d) Food resources: World food problems, changes caused by agriculture and Overgrazing, effects of modern agriculture, fertilizer-pesticide problems, waterlogging, salinity, case studies.
- e) Energy resources: Growing energy needs, renewable and non-renewable energy sources, use of alternate energy sources. Case studies.
- f) Biodiversity: Introduction-Definition; Biogeographically classification of India India as a mega diversity nation. Hot sports of biodiversity, Threats to biodiversity. Endangered and endemic species of India. Conservation of biodiversity. In Situ and Ex-so conservation of biodiversity

Unit-3: Disaster Management (8 Periods)

- a) Disaster Management: Types of disasters (natural and Man-made) and their causes and effect)
- b) Vulnerability Assessment and Risk analysis: Vulnerability to various disasters (Flood, Cyclone, Earthquake, Heat waves, Desertification and Lighting)

- c) Institutional Framework: Institutional arrangements for disaster management (National Disaster Management Authority (NDMA), State Disaster Management Authority (SDMA), Disaster Management Act, 2005, District Disaster Management Authority (DDMA), National Disaster Response Force (NDRF) and Odisha Disaster Rapid Action Force (ODRAF)
- d) Preparedness measures: Disaster Management cycle, Early Warning System, PreDisaster and Post-Disaster Preparedness, strengthening of SDMA and DDMA, Community Preparedness for flood cyclone, heat waves, fire safety, lightening and snake biting. Stakeholders' participation, Corporate Social Responsibility (CSR)
- e) Survival Skills: Survival skills adopted during and after disaster (Flood, Fire, Earthquake, Cyclone and Lightening), Disaster Management Act-2005, Compensation and Insurance

Unit 4: Social Issues and the Environment (6 Period)

A.

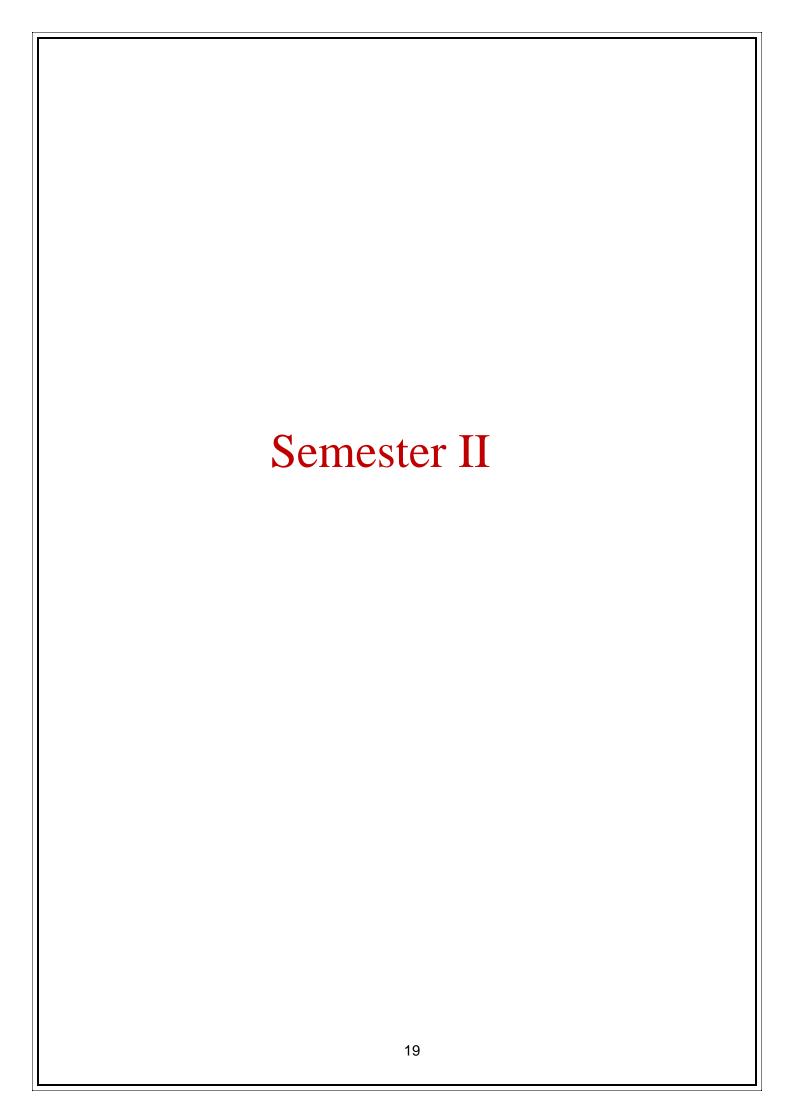
- a) Environmental Ethics: Issues and possible solutions.
- b) Climate change, global warming, acid rain, ozone layer depletion, nuclear
- c) Accidents and holocaust. Case studies
- d) Environment Protection Act
- e) Air (Preservation Control of Pollution) Act
- f) Water (Preservation Control of Pollution) Act
- g) Wildlife Protection Act
- h) Forest Conservation Act
- i) Solid waste management Cause, effect and Control Measure of Urban and Industrial waste (Role of each individual in conservation of Natural resources and prevention of pollution)

В.

- a) Human Population and the Environment
- b) Population Ecology: Individuals, species, population, community
- c) Human population growth, population control method
- d) Urbanisation and its effect on society

Unit 5: Field work (15 Periods of 30 hrs)

- Visit to an area to document environmental assets: river/forest/flora/fauna, etc.
- Visit to a local polluted site- Urban/Rural/Industrial/Agricultural
- Study of common plants, insects, birds and basic principles of identification.
- Study of simple ecosystems-pond, river, Delhi Ridge, etc.



Semester	Core-I	Core- II	Core-III	Multi- disciplinary	AEC	SEC	VAC
Semester II	1.Forecasting and Inventory Management 2.Surface Transportation 3.Data Spread Sheet 4.MIS for Logistics		Corporate Account & Reporting	Business Statistics & Data Interpretation	English: Business Communication		Good Citizenship

PAPER V

Forecasting and Inventory Management

Credit 4

Unit – 1:

Forecasting: Meaning –Need -Types of forecasts –Demand Forecasting- Types of Demand Forecasting- Importance - Demand planning v/s Forecasting-Sources of demand-Supply chain dynamics

Unit – 2:

Sales and Operations Planning- Goals and objectives of S&OP -Collaborative Planning-Types - Collaborative planning, forecasting and replenishment- Cyclic decomposition techniques. Short-term forecasting techniques- Technology Forecasting and Methodologies: Role of Technology Information Forecasting and Assessment Council (TIFAC).

Unit – 3:

Inventory: Purpose of Inventory- -Types of Goods -General Management of Inventory- Multi-Echelon Inventory Systems -Use of Computers in Inventory Management- Evaluation of Performance of Materials Function-Latest trends in Inventory Management

Unit – 4:

Codification – Classification – Methodology–Requirement of codes – Coding Structure and Design – Advantages - International Codification – Right Quantity – Economic Ordering Quantity - Costs associated with Inventories- Models in logistics

Unit - 5:

Influence of production policy on inventory levels – inventories and customer service level – steps to improve inventory management – optimum inventory –Inventory management uncertainty (fixed order quantity model) - Calculation of safety stocks.

- ✓ Course Material Prepared by LSC
- ✓ Sunil Chopra and Peter Meindl, Supply Chain Management Pearson Education Asia, 3rd edition, 2007 Chaman L Jain, "Fundamentals of Demand Planning & Forecasting", Graceway Publishing Company 3rd edition.
- ✓ Operations Research Concepts, Problems & Solutions- Kapoor V.K.-Sultan Chand & Sons/2017- 978-81-8054-854-3 (TC-532)
- ✓ Vijay Kumar Khurana, 2007, Management of Technology and Innovation, Ane books India, Chennai Further Reading Source
- ✓ Simchi-Levi, David, "Designing and Managing Supply Chain", Tata McGraw Hill, 3rd Edition, 2007.
- ✓ David E Mulcahy, "Warehouse Distribution and Operations Handbook, McGraw Hill, 6thEdition, 1993.

PAPER VI

Surface Transportation

Credit 4

Unit – 1:

Introduction to surface transportation -Need - functions of transportations in logistics -Types of transportations metrics -various land transport carriers and their Load capacities - types of temperature-controlled carriers- inter modal transport -verification of carriers and drivers -transit rules

Unit – 2:

Transportation Optimisation -Documentation for transportation - GST - E Waybill Filing - Importance of consignment number -Transportation Telematics-Vehicle tracking system - GPS systems -Procedure for downloading and reading tracking data from devices -Probable reasons for delay or any issues during transit -Solutions - re-routing

Unit – 3:

Organisation structure in a Transport organization- Incident management systems & Processes - hazmat goods rules-Importance ofsafety data sheet and labels-Procedure for Consolidation of consignments of optimal loads -Reporting discrepancies such as pilferages, loss or damage of goods in transit -Checking insurance and claims -steps to close deliveries.

Unit – 4:

Benefits of efficient transportation systems-emerging trends in transportation sector-pricing in transportation sector-govt regulations on transportation in India. Safety procedures during transit and emergency response steps - List of good practices in driving.

Unit – 5:

Customer Management-Vendor coordination for return truck loads-DG Handling – features and facilities offered by railways – innovative schemes-facilities to popularize rail logistics in India

- ✓ Course Material Prepared by LSC
- ✓ J P Saxena, Warehouse Management and Inventory Control-Vikas Publication House Pvt Ltd, First Edition, 2003.
- ✓ A Practical Guide to Logistics: An Introduction to Transport, Warehousing, Trade and Distribution -Jerry Rudd-Kogan Page publications
- ✓ Management Guide to Efficient Money Saving Warehousing, Stephen Frey, Gower, 1982.
- ✓ Kapoor Satish K., and Kansal Purva, 'Basics of Distribution Management: A Logistical Approach', Prentice HALL of India

PAPER VIII

MIS for Logistics

Credit 4

Unit – 1:

Introduction- IT and management opportunities and challenges-Strategic planning and models - Information management & IT Architecture – IT Architecture & infrastructure, cloud computing and services, Virtualization and Virtual Machines.

Unit – 2:

Database Technology- Data warehouse- Data Mart Technologies- Data and Text mining-Business Intelligence & Analytics, Digital and physical document management. Networks, collaboration & sustainability: Business IT networks & components, communication technologies – Sustainability and Ethical issues - Internal control Business Control and Auditing.

Unit – 3:

Dissemination of technology information- and strategic planning – Technology choice and evaluation methods – Analysis of alternative technologies – Implementing technology programmes- Intellectual Capital - An introduction to Intellectual Property Right - Patent - Copyrights - Trademarks and other issues.

Unit – 4:

Functional Area & Compliance systems: Management levels and functional systems Enterprise Systems and applications: Enterprise systems, Enterprise Resource Planning (ERP), Supply Chain Management (SCM), Collaborative Planning, Forecasting, and Replenishment system (CPFR), Customer Relationship Management (CRM). Performance Management: Data visualization, Mashups, and Mobile intelligence, Fleet Management Information System.

Unit – 5:

Business Process and Project Management: - Architecture & IT design, System development, Software & Applications for management (Business software tools), Support system. ERP modules -sales and Marketing, Accounting, Finance, Materials and Production management etc.

- ✓ Course Material Prepared by LSC
- ✓ Kenneth C. L., Jane P. L., & Rajnish Dass (2001) Management Information System Managing the Digital Firm. Pearson Education: New Delhi.
- ✓ Ravi, K. & Andrew, B. W. Frontiers of Electronic Commerce. Pearson Education: New Delhi.
- ✓ Kenneth, C. L., & Jane, P, L. (2001) Essentials of MIS. Prentice Hall India: New Delhi.
- ✓ Sadagopan, S. (2003) Management Information System. Prentice Hall India: New Delhi.
- ✓ Eff, O.Z. (2003) Management Information Systems. Vikas Publishing House Pvt. Ltd.: New Delhi.

CORE III

PAPER I Corporate Accounting and Reporting

Credit 4

Course Objectives

The course aims to:

- Understand the principles of corporate accounting and financial reporting.
- Apply accounting standards and regulations to prepare and analyze financial statements.
- Interpret financial information to assess the financial performance and position of a company.
- Develop skills in financial reporting and disclosure requirements for different stakeholders.
- Analyze contemporary issues and challenges in corporate accounting and reporting.

Course Outcomes

After completion of the course, learners will be able to:

- Understanding of Corporate Accounting Principles.
- Preparation and Analysis of Financial Statements.
- Interpretation of Financial Information.
- Financial Reporting Skills.
- Analysis of Contemporary Issues.

Unit I: Accounting for Share Capital and Debentures

Types of shares; Issue and Pro-rata allotment of shares; concept & process of book building; forfeiture and reissue of forfeited shares; Issue of rights and bonus shares; ESOPs and Buy Back of shares. Issue and redemption of preference shares; Issue and redemption of debentures;

Unit II: Final Account of Companies including one Person Company (IND-AS.1)

Preparation of financial statements of corporate entities including one Person company (excluding calculation of managerial remuneration) as per Division I and II of Schedule III of the Companies Act 2013; Preparation of Financial Statements.

Unit III: Corporate Reconstruction and Profit or Loss Prior to Incorporation

- **Internal Reconstruction:** Different forms of Internal Reconstruction; Accounting treatment for alteration of share capital and reduction of the share capital; Preparation of balance sheet after Internal Reconstruction.
- External Reconstruction: accounting for amalgamation in the nature of merger and in the nature of acquisition (IND-As.103)
- **Profit or loss Prior to Incorporation:** Meaning of profit or loss prior to incorporation; accounting treatment of profit or loss prior to incorporation.

Unit IV: Consolidated financial statement and Reporting

- Consolidation process and elimination entries, Intercompany transactions, Revaluation of
 assets and liabilities, Non-controlling interests (NCI), equity method investments (INDAs.110), issue of bonus shares and distribution of dividend from pre and post-acquisition
 period. Preparation of consolidated financial statements.
- Reporting: Financial reporting (As per IND-As.1), non-financial reporting: Business Responsibility and Sustainability Reporting (As per LORD, SEBI), Environmental Social and Governance Reporting, Sustainability Reporting (As per GRI). Integrated Reporting (As per IIRC)

Suggested Readings

- ✓ Goyal, B. K., Corporate Accounting. New Delhi: Taxmann Publication.
- ✓ Jain, S. P., &Narang, K. L. Corporate Accounting. New Delhi: Kalyani Publishers.
- ✓ Maheshwari, S. N., Maheshwari, S. K., &Maheshwari, S. K. Corporate Accounting. New Delhi: Vikas Publishing House.
- ✓ Mukherjee, A., &Hanif, M. Corporate Accounting. New Delhi: TataMcGraw Hill Education.
- ✓ Shukla, M. C., Grewal, T. S., & Gupta, S. C. Advanced Accounts. Vol.-II. New Delhi: S. Chand Publishing.
- ✓ Sehgal, A. Fundamentals of Corporate Accounting. New Delhi: Taxmann Publication.
- ✓ Dam, B. B. &Gautam, H. C. Corporate Accounting. Guwahati: Gayatri Publications.
- ✓ Goyal, V. K., &Goyal, R. Corporate Accounting. New Delhi: PHI Learning.
- ✓ Monga, J. R. Fundamentals of Corporate Accounting. New Delhi: Mayur Paperbacks.

MDC

PAPER I

Business Statistics and Data Interpretation

Credit 3

Course Objectives

The course aims to develop amongst the learners the ability to summarise, analyse and interpret quantitative information for business decision making

Course Outcomes

After completion of the course, learners will be able to:

- Examine and understand the various descriptive properties of statistical data;
- Evaluate probability rules and concepts relating to discrete and continuous random variables to answer questions within a business context;
- Analyse the underlying relationships between the variables to use simple regression models;
- Analyse the trends and tendencies over a period of time through time series analysis;
- Examine and apply index numbers to real life situations.

Course Outlines

Unit 1: Descriptive Statistics

Measures of Central Tendency: Concept and properties of averages including Arithmetic mean, Median and Mode. Measures of Dispersion: An overview of Range, Quartile Deviation and Mean Deviation; Standard deviation; Variance and Coefficient of variation. Moments: Computation and significance; Skewness; Kurtosis.

Use Microsoft Excel for data analysis and interpretation

Unit 2: Probability and Probability Distributions

Theory and approaches to probability; Probability Theorems: Addition and Multiplication; Conditional probability and Bayes' Theorem. Expectation and variance of a random variable. Discrete Probability distributions: Binomial and Poisson (Properties and Applications). Normal distribution: Properties of Normal curve; Computation of Probabilities and Applications.

Use Microsoft Excel for data analysis and interpretation

Unit 3: Time Series Analysis and Index Numbers

Time Series Data; Components of time series; Additive and Multiplicative models. Trend analysis; Fitting of trend using principle of least squares – linear and second-degree parabola. Shifting of Origin and Conversion of annual linear trend equation to quarterly/monthly basis and vice-versa.

Meaning and uses of index numbers. Construction of Index numbers: Methods of Laspeyres, Paasche and Fisher's Ideal index.

Use Microsoft Excel for data analysis and interpretation

Suggested Readings

- ✓ Anderson, D. R. (2019). Statistics for learners of Economics and Business. Boston, United States: Cengage Learning.
- ✓ Statistics for Management by Richard I. Levin and David S. Rubin published by Kalyani Publishers, Cuttack, Odisha.
- ✓ Douglas A. Lind, Robert D. Mason, William G. Marchal. (2022).
- ✓ Basic Statistics for Business and Economics. New York, United States: Mc-Graw-Hill International editions.
- ✓ Gupta, S. C., & Gupta, I. (2018). Business Statistics. Mumbai, India: Himalaya Publishing House.
- ✓ Gupta, S. P., & Gupta, A. (2018). Business Statistics: Statistical Methods.

AEC Paper I

English Communication

Credits: 4

SL	Modules	Outcomes
No.		
	English Language and	Communication, its Importance and
1	Communication:	Factors
1	Introduction	Types of Communication
		 Verbal and Non-verbal Communication
		Styles of Communication
	English Language and	Types of Listening
	Communication: Listening	 Speaking to communicate effectively
2	and Speaking	 Style of speaking in Various Situations
		English Pronunciation
	English Language and	 Reading methods and techniques.
3	Communication: Reading	 Reading texts to Understand meaning
3	and Writing	Writing Process
		Writing short and Long texts
	English Language and	Grammar
4	Communication: Grammar	Sentence structure
	and Vocabulary	 Functions of Language

Refence Book:

✓ A Coursebook for ENGLISH COMMUNICATION (Publisher: Orient BlackSwan)

VAC

Paper II

Good Citizenship

3 Credit

Objectives/Learning Goals of the Course

- Development of good human being and a responsible citizen
- Developing a sense of right and wrong leading to ethically correct behavior.
- Inculcating a positive attitude and a healthy work culture.

Learning Objectives:

- Understanding Basic Values of Indian Constitution.
- Understand how to be a patriot.
- Develop professionalism and understand the ethics relating to various professions.

1. Indian Constitution (1 Credit= 15 hours)

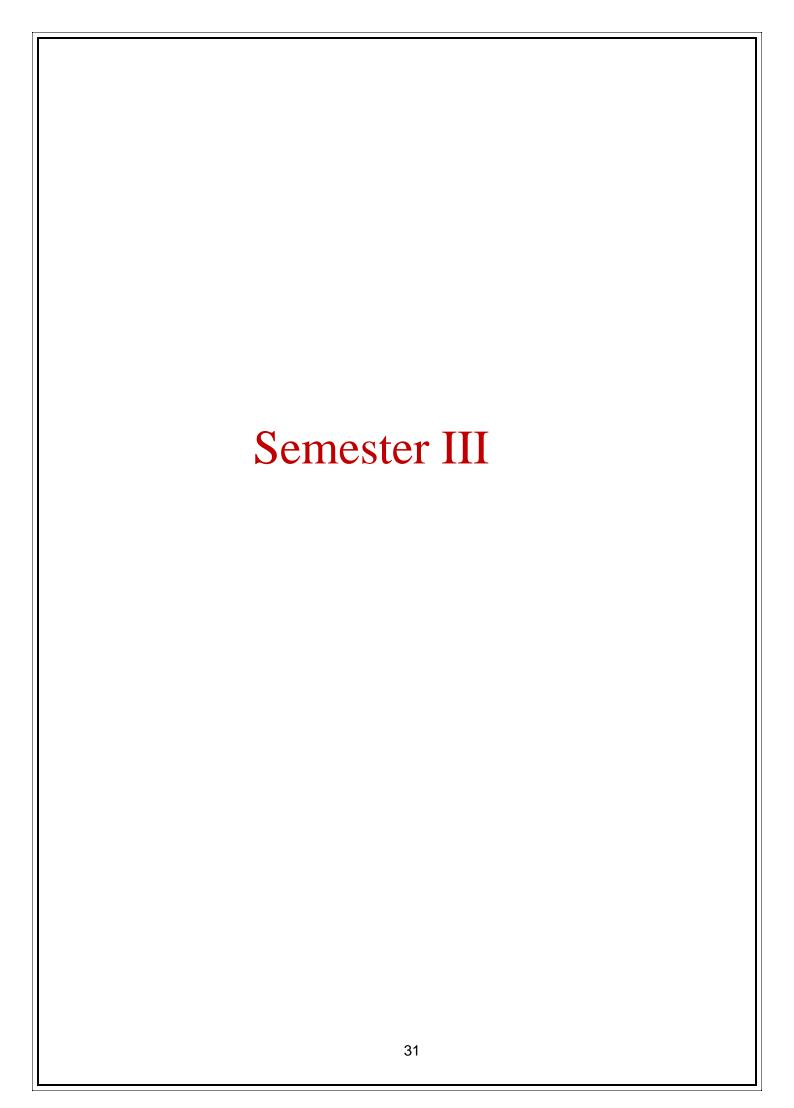
Salient Values of Preamble: Sovereign, Socialist, Secular, Democratic, Republic, Justice, Liberty, Equality and Fraternity

2. Patriotism (1 Credit= 15 hours)

Patriotic Value and ingredients of nation building, Concept of Good Citizenship, Emotional connection with the country, Duties of citizens and Qualities of good citizens

3. Work Ethics (1 Credit= 15 hours)

Punctuality, Cleanliness, Law abidingness, Rational Thinking and Scientific Temper



Semester	Core-I	Core-II	Core-III	Multi- disciplinary	AEC	SEC	VAC
Semester III	Retail Logistics and E-Commerce Linear Logistics Port Terminal Logistics Specialization Module – Course I	GST and other Indirect Taxes	Management Accounting	Financial Markets & Institutions			

PAPER IX

Retail Logistics and E-Commerce

Credit 4

Unit – 1:

Concept and Scope: Concepts of Retail Logistics and supply chain- Importance of Logistics in these days global Sourcing, Dimension of Logistics: Macro and Micro aspects-Supply chain contours: Backward and forward linkages

Unit - 2:

Logistics and Retail Marketing: Logistics as a Support function of Order Fulfilment, Assembling & Labelling from Multi-storage points and Delivery- Logistics as an interface of Market forecasting, Stock level management and other relevant activities till transportation, preparation for dispatch and outbound documentation and customer facilitation tracking out-bound shipments.

Unit – 3:

Reverse Logistics: Basic of reverse logistics - concept, key activities, coordinating with carriers, route map optimization, collecting pickup and feedback - Types of reverse logistics -Roles and responsibilities- Best practices in reverse logistics

Unit – 4:

E-Commerce: Introduction to E-commerce logistics including delivery and pickup models and the overall logistic setup — Order Processing — Activities in order processing — Types of order processing — Procedures for generating plans and schedules through MIS

Unit – 5:

Types of Ecommerce- B2B-B2C and intra business. Retail Ecommerce – Retailing through internet, Direct Online Sales model and its types- Business Models for ecommerce. Electronic Payment system, Electronic CRM Applications. E-Security

- ✓ John Fernie & Leigh Sparks, Logistics and Retail Management: Emerging Issues and New Challenges in the Retail Supply Chain, Kogan Page 3rd Edition, 2009
- ✓ James B. Ayers & Mary Ann Odegaard, Retail Supply Chain Management, Taylor & Francis, 2nd edition
- ✓ Mr. Gibson G, "Retail Management: Functional Principles & Practices", Jaico Publishing house, 6th Edition, 2003.
- ✓ Ray, Supply Chain Management For Retailing, TMH, 2010.
- ✓ James B. Ayers, Retail Supply Chain Management, Auerbach Publications, 2007.

PAPER X

Linear Logistics

Credit 4

Unit – 1:

Definitions of liner trades; tramp trades; containerization- Unitization - containerization, liner operations, port organization - Vessel loading and discharging, liner trade routes, The major ports, liner service options - Liner trade - ship types - Tonnages; basic ship layout, types of container ships, Ro-Ro barge carrying vessels, The refrigerated cargo ship conventional (Break bulk) vessels future vessel developments, economy of scale, shipboard handling equipment.

Unit – 2:

Cargoes & cargo equipment – Dangerous goods IMO special goods, cargo handlings other methods of lifting cargo port handling equipment, port terminals; port and terminal management; the role of ships officers - agent. Liner Shipping operations- Management and policy, ship management and operations, independent ship management, insurance, trade of commercial department, accounting, budgeting, freight collection and port disbursements agency duties.

Unit – 3:

Containerization unitization and inter-modalism - Growth in world trade unitization; container dimensions, types of container other container expressions container inventory, owning, leasing meeting the demand for containers tracking the container fleet, container control, FCLS LCLS & ICDS, legal & insurance implications in the container trade.

Unit – 4:

The Bill of Lading and other Documentation - The Bill of Lading UK bill of lading Act 1855 and UK carriage of goods by sea Act 1992, The use of Bill of Lading in liner trades, Bill of Lading documentary credits, Bill of Lading clauses The printed clauses — The evidence of the contract, other forms of Bill of Lading other liner documents, Intl conventions relating to Bill of Lading, paperless trading

Unit – 5:

The Exchange of goods transfer - Transfer of funds from country to country, methods of payments in international trade who are the merchants, international contracts of sale INCO terms; Legal aspects of the liner trades - The carrier insurance the carrier's liability for the cargo the liabilities of the agent, legal aspects of the Bill of Lading, cargo claims general average (GA), security, ISPS code.

- > Course Material Prepared by LSC
- ➤ Ship Operation Management, Fujita,N.H. Publisher, 1974.
- ➤ Ship Operation Management, Bertrams Publication, 2010.
- ➤ Handbook of Ship Calculations, Construction and Operation, Charles H. Hughes, Wexford College Press, 2008.
- > Ocean Shipping Elements of Practical Steamship Operation, Robert Edwards Annin,

PAPER XI

Port Terminal Logistics

Credit 4

Unit – 1:

Difference between Major and Minor Ports - Ports in India - Natural Harbours - New Ports to be developed in India - Major Ports of the World - Largest Port in the world - Port Officials and their roles - Role of Ports - Who are Port users

Unit – 2:

Container Terminals - Privatisation of Terminals - Reason for Privatisation - Major Terminal Operators in India - Terminal Operators of the world - Privatisation the need of the hour - Agreement between and existing Port Terminal and the new operator

Unit – 3:

Import Cycle - Export Cycle - Positions and Places in a Terminal - Facilities in a Terminal - Container Monitoring and stacking - CFS inside a Terminal - Reasons for Congestion of a terminal - de-congesting the terminal - Window system in a terminal.

Unit – 4:

Major Port Trust Act - Port as a custodian of the cargo - Transit sheds - Cargo receivers - Wharfs and Berths - Various berths in a Port - Meaning of Berth Restrictions - Port equipment's and damage - Extra services - Berth reservation schemes

Unit – 5:

Port Tariff - Pilots and their duties - Tugs and its usage - Night navigations - Light Dues- Tariff Authorities of Major Port - Revision of rates - Port Trustees - Safety Procedures - Introduction of ISPS - Damage to Port property by ships - Compensation and confiscation of cargo to adjust dues

- ✓ Course Material Prepared by LSC
- ✓ Major Port Trust Act Government of India
- ✓ Port Industry Statistics, American Association of Port Authorities
- ✓ AP MOLLOR Guide book on Terminal
- ✓ DUBAI PORT AUTHORITIES Manual

PAPER XII

Specialization Module Course I

Credit 4

Group A

INTRODUCTION TO AVIATION INDUSTRY & AIRPORT OPERATIONS

Unit 1 History of Aviation & Key Organizations in the Aviation Industry

- a) History of Aviation through the ages-Origins in Greek Mythology- The Wright Brothers-Aviation in the era of World War 1 & 2- Commercial Aircraft Era- Modern Jetliners
- b) Key Organizations in the Aviation Industry
- 1. ICAO- International Civil Aviation Organization,
- 2. IATA-International Air Transport Association
- 3. MoCA Ministry of Civil Aviation,
- 4. DGCA Directorate General of Civil Aviation
- 5. AAI- Airports Authority of India,
- 6. AAICLAS- Airports Authority of India Cargo Logistics Allied Services
- 7. AERA- Airport Economic Regulatory Authority 8. BCAS- Bureau of Civil Aviation Security

Unit 2 Freedoms of the Air & the Airline Business

- a. Freedoms of the Air- Overview- Nine Freedoms of the Air
- b. Airline Business
 - i Business Models- Legacy, Low Cost, Charter, Regional, Cargo & Hybrid
 - ii Airplane Manufacturers- Primary Manufacturers- Boeing, Airbus and others
 - iii Narrow Body v/s Wide Body- Definition & Features
 - iv The Airline Industry as a Business- Key Functions in the Airline Business
 - v Airline Codeshares & Alliances
 - a. Concept, b. Key Benefits, c. Major Airline Alliances
 - vi Airline Cabin Classes- First, Business, Premium Economy & Economy

Unit 3 World Geography & Airline Communication Protocol

Unit 4

Traffic Conference Areas, Time Zones, Codes-Country, City, Carrier, Currency, Aircraft Registration, Airline Phonetics, Airport Operations

- a. Key Stakeholders, Airport Types, Airport Revenue Sources, Airport Functional Layout-Landside, Governmental Agencies at Airport, Baggage Handling, Airside Operations
- b. Airport as an Operational System- Infrastructure &Facilities, Airport Operations Control Centre (AOCC), Airport Collaborative Decision Making (ACDM), Key Information Technology Systems at Airports

Unit 5

Concessionaire Activities at Airports (terminology restricted to Indian scenario)

- a. Non-Aero Activities- Retail, Food & Beverage, Real Estate, Car Rentals Car Parking, Currency & Banking, Advertising
- b. Maintenance Repair & Overhaul (MRO)- Types of MRO Models
- c. Ground Handling
 - i Concept, ii Self-Handling V/s Outsourced Handling
- iii IATA Standard Ground Handling Agreement

Text & Reference Books:

- ✓ Course Material Prepared by LSC
- ✓ Airport Operations-Norman Ashford, Pierre Coutu, John Beasley-McGraw-Hill Education; 3rdedition (16December2012)
- ✓ Principles of Airport Economics-P.S. Sengupta-Excel Books(1December2007)
- ✓ Managing Airports An International Perspective Anne Graham Routledge; 5edition (June9,2018)
- ✓ IATA Airport Handling Manual 40th edition Year of Publication 2020
- ✓ IATA Ground Operations Manual 9th edition Year of Publication 2020

Group B

FIRST MILE OPERATIONS

Unit 1: Role of First Mile in E-Commerce Logistics

Difference between First Mile, Line Haul and Last Mile operations. -First Mile Operations-Overview. -Why is First Mile operations important in e-commerce logistics-First Mile process flow.

Unit 2: Shipment Pickup Operations

Shipment pickup process. -Pickup operations staff - roles and responsibilities. -Pickup coordination. -Safety and security of shipments during pickup-Pickup documentation.

Unit 3: Shipment Processing Operations

Primary and secondary processing. -Bagging operations. -Manual processing operations-Automated processing operations

Unit 4:

Layout of A Processing Centre Inbound operations - Processing Operations-Outbound Operations-Safety and security-Processing Centre staff - roles and responsibilities

Unit 5:

First Mile Analytics and Metrics

Productivity-Pickup operations metrics-Processing operations metrics-First Mile dashboard.

Tools and Applications

Pick up tools and applications-Processing tools and applications-Exceptions in First Mile and impact on operations Tools and communication to resolve exceptions.

Text & Reference Books:

✓ Course Material Prepared by LSC

Group C

PRINCIPLES AND PRACTICES OF TOURISM

Unit – 1:

Basics of Tourism-History & Growth-Tourism & Economy, Multiplier Effect-Principles, Components &

Types of Tourism – Service Industry, Passenger Transportation. Travel Agencies

Unit – 2:

Domestic & International Tourism-Tourism Policy & Initiatives of Govt – Dept of Tourism, ITDC, IRCTC Etc Inbound & Outbound Tourism – Segmentation, Bookings, Package Tours-Travel Agencies, Destinations & Infrastructure – Ratings

Unit – 3:

Tourism- Road-Road Infrastructure – Connectivity to destinations, Quadrangle, Highways, Bharatmala Project-Road Vehicles – Cabs, Minibuses, luxury buses, Double deck sleeper. Regulations-Single point. Multiple destinations, Group booking, Cluster approach.

Unit – 4:

Tourism by Rail-Infrastructure – Rail destination. Toy trains to Hills – Shimla, Darjeeling, Ooty – Last mile connectivity-Railway Initiatives – Rail Yatrik Niwas at stations, Budget hotels. Online bookings, Tourist lounges. Bookings – Group ticket, package tours, circular journey ticket etc.- Tourist trains – Palace on Wheels, Maharaja, Deccan Odyssey, Rail package tours, Coach Bookings itinerary.

Unit – 5:

Trends in Tourism-Sustainable tourism – Ecological & environmental issues-Heritage, Religious, Medical, Leisure, Conferences Tourism, Destination weddings-New destinations- Statue of Unity, Akshardham, Winter tourism etc

Suggested Readings:

✓ Course Material Prepared by LSC

CORE II

PAPER II

GST and other Indirect Taxes (Customs)

Credit 4

Course Objectives

The course aims to provide understanding about salient features of GST law and implications of its various provisions for different classes of suppliers, to be applied in real life business scenario.

Course Outcomes

After completion of the course, learners will be able to:

- Explain the concept, need, and utility of indirect taxes;
- Implement the provisions relating to supply under GST in real life scenario;
- Apply the provisions of levy of GST and identify various returns under GST and payment of taxes;
- Evaluate the concepts of Customs Act, various custom duties and computation of the assessable value for charging customs duty

Unit I: Basic Concepts

Concept and features of Indirect Taxes, Difference between Direct and Indirect Taxes, Concept of GST, Relevant Definitions under GST law, Constitutional aspects of GST. GST Council: Constitution, Structure and functioning.

Unit II: Concept of supply and Levy of GST

Concept of supply including composite and mixed supply, Place, Time and Value of taxable supply, Significance of consideration. Basis of Charge of GST, Inter-State Supply, Intra-state supply, GST rates notified for supply of various goods and services, Reverse charge mechanism, Composition levy, Exemptions from GST, Power to grant exemptions, Exempted goods under exemption notifications, Exempted services under exemption notifications, Input tax credit.

Unit III: Procedures under GST

Registration under GST law, Tax invoice credit and debit notes, Different GST returns, Electronic liability Ledger, Electronic credit Ledger, Electronic cash ledger, Different assessment under GST, Interest applicable under GST (Period), Penalty under GST, Various provisions regarding e-way bill in GST, Mechanism of Tax Deducted at Source (TDS) and tax collected at source (TCS), Audit under GST.

Unit IV: E-filling of GST returns and Customs Law

Understanding the GST return preparation process, Data entry and validation of GST return details, Uploading GST returns using offline/online tools, Filing GSTR-1 (Outward Supplies), Filing GSTR-3B (Monthly Summary Return), Filing GSTR-9 (Annual Return). Compliance and Error Handling; Overview of GST compliance requirements, Identifying common errors and discrepancies in GST

returns, Strategies for error correction and reconciliation. Basic concepts, Territorial waters and High seas; Types of custom duties; Valuation.

Suggested Readings

- ✓ Rout P.K. & Others GST and Indirect Taxes, kalyani publishing house.
- ✓ Haldia, Arpit&Mohd, Taxmann's GST Law & Practice
- ✓ Bangar, Vandana&Bangar, Yogendra, Comprehensive Guide to Indirect Tax Laws—GST & Customs

Latest revisions and notifications relating to GST & Customs

CORE III

PAPER II

Management Accounting

Credit 4

Course Objectives

The course aims to enable students to acquire knowledge of concepts, methods and techniques of management accounting for the purpose of managerial planning, control and decision making.

Course Outcomes

After completion of the course, learners will be able to:

- Examine the conceptual framework of Management Accounting and identify the differences between various forms of accounting.
- Analyse budgetary control system as a tool of managerial planning and control.
- Evaluate the standard costing system as a tool of managerial control.
- Recognise the concept of marginal costing and cost-volume-profit analysis.
- Analyse techniques of decision making.
- Discuss the concept of responsibility accounting and performance measurement.

Unit 1: Introduction to Management Accounting

Meaning, objectives, nature and scope of management accounting, Difference between different forms of accounting- Cost, Financial and Management accounting, Cost control and Cost reduction.

Unit 2: Budgetary Control and Standard Costing Systems

- Budgeting and Budgetary Control: Concept of budget, budgeting and budgetary control; objectives, merits and limitations; Functional Budgets; Fixed and Flexible budgeting; An overview of different approaches to budgeting (Zero base budgeting, Performance budgeting and Programme budgeting)
- Standard Costing and Variance Analysis: Meaning of standard cost and standard costing; advantages, limitations and applications; Variance Analysis material, labour, overheads and sales variances. Control ratios.

Unit 3: Marginal Costing

Concept of marginal cost and marginal costing; Absorption versus Variable Costing: Distinctive features and income determination; Cost-volume-profit analysis; Break-even Analysis-Statements, mathematical and graphical approaches; Profit-volume ratio, angle of incidence, margin of safety, key factor, determination of cost indifference point.

Unit 4: Decision Making

Steps in Decision making process. Concept of relevant costs. solving various short -term decision making problems using marginal costing and differential costing techniques – Profitable product mix, Acceptance or rejection of special/ export offers, Make or buy, Addition or elimination of a product line, sell or process further, operate or shut down and Pricing decisions.

- ✓ Sharma / Gupta Management accounting, Kalyani publishing house.
- ✓ Management Accounting, 4th Edition Pillai R.S.N. & Bagavathi S. Chand Publishing
- ✓ Arora, M. N. (2019). Management Accounting. Delhi, India: Himalaya Publishing House.
- ✓ Management Accounting: Principles & Practice, 3rd Edition Sahaf M.A. Vikas Publishing
- ✓ Cost and Management Accounting, Ravi M Kishore, taxman publishing house.
- ✓ Goel, R. K., &Goel, I. (2019). Concept Building Approach to Management Accounting for B. Com (Hons.), Delhi, India: Cengage.
- ✓ Maheshwari, S. N., & Mittal, S. N. (2019). Management Accounting. Delhi, India: Shri Mahaveer Book Depot.
- ✓ Maheshwari, S. N., Maheshwari, S. K., &Maheshwari, S. K. (2021). Principles of Management Accounting. Delhi, India: Sultan Chand & Sons.
- ✓ Maheshwari, S. N. (2015). Management Accounting and Financial Control. Delhi, India: Sultan Chand & Sons.
- ✓ Shah, P. (2015). Management Accounting. Delhi, India: Oxford University Press.
- ✓ Singh, S. (2023). Management Accounting. Delhi, India: PHI Learning Pvt. Limited.
- ✓ Singh, S. K., & Gupta, L. (2021). Management Accounting: Theory and Practice. Delhi, India: A. K. Publications.
- ✓ Tulsian, P. C., & Tulsian, B. (2023). Advanced Management Accounting.
- ✓ Drury, C. (2020). Management and Cost Accounting. China: Cengage.
- ✓ Horngren, C. T., Foster, G., & Dattar, S. M. (2002). Cost Accounting: A Managerial Emphasis. Delhi, India: Prentice Hall of India Ltd.
- ✓ Khan, M. Y., & Jain, P. K. (2021). Management Accounting. Delhi, India: Tata McGraw Hill Publishing Co.
- ✓ Usry, M. E., & Lawrence, H. H. (2010). Cost Accounting: Planning and Control. Delhi, India: S. Chand.

MDC PAPER II

Financial Markets and Institutions

Credit 3

Course Objectives

- Understand the structure and organization of financial markets.
- Analyze the functions and operations of various financial institutions.
- Explore the role of financial intermediaries in the economy.
- Examine the regulatory frameworks governing financial markets and institutions.
- Assess the impact of financial market developments on economic activity.
- Develop critical thinking and analytical skills in evaluating financial market trends and dynamics

Course Outcomes

After completion of the course, learners will be able to:

- Students are able to know the features of different financial markets and their role in economic development.
- Students are able to know the functions of financial markets and capital markets.
- Students are able to know about the commercial Banks and their role in project financing and working capital finance and also about the massive growth of NPAs.
- Students are able to know about the role of insurance companies, NBFCs and Mutual Funds.
- Understand the basics of financial services and its various dimensions.

Unit I: An Introduction to Financial System and its Components

Financial markets and institutions. Financial intermediation, Functions and components of Financial System Financial system and economic development. An overview of the Indian financial system.

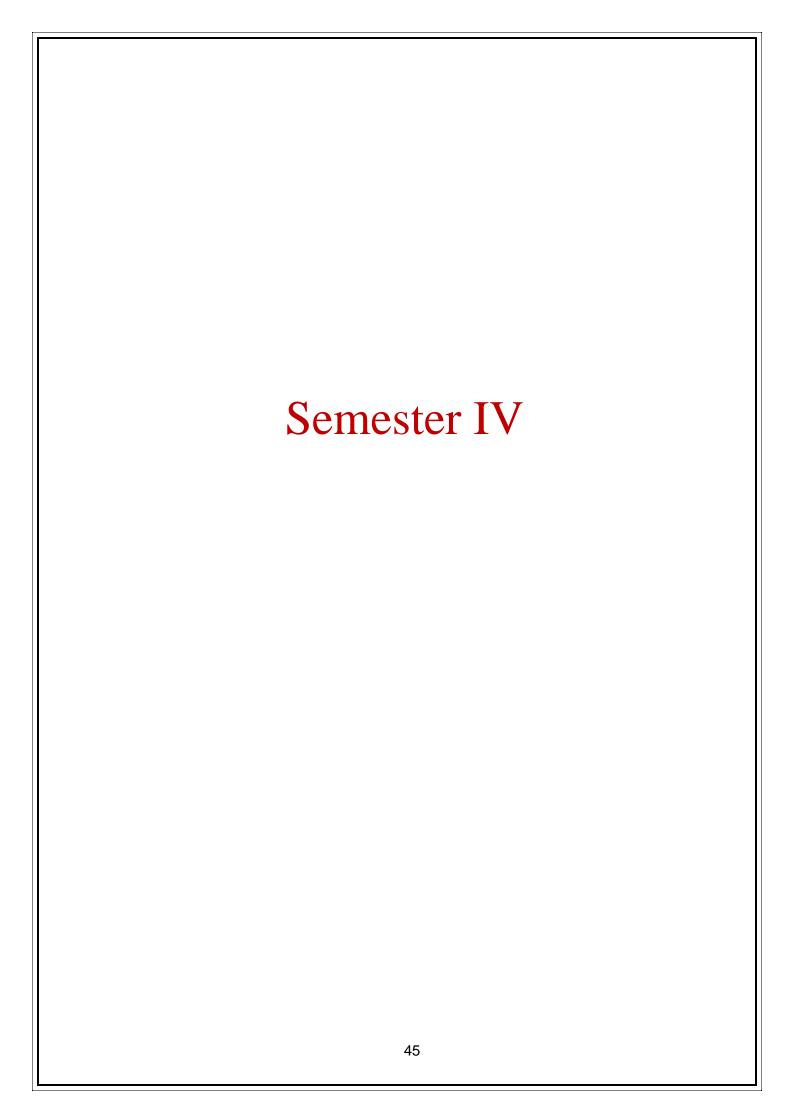
Unit II: Financial Market

Money market-functions, organization and instruments. Role of Central Bank in money market; Indian money market-An overview. Capital Markets- functions, organization and instruments. Indian debt market; Indian equity market-primary and secondary markets; Role of stock exchanges in India.

Unit III: Financial Institution

Commercial banking-introduction, its role in project finance and working capital finance. Development Financial Institutions (DFIs). problems of NPA, Financial Inclusion. Life and non-life insurance companies in India; Non-banking financial companies (NBFCs); Mutual Funds; Types and role in Capital Market, Regulation of Mutual Funds.

- ✓ Gupta S. K. Financial Market, Institution and Services, Kalyani publishing house.
- ✓ Bhole, L.M., Financial Markets and Institutions. Tata McGraw Hill Publishing Company
- ✓ Khan, M.Y., Indian Financial System Theory and Practice. New Delhi: Vikas Publishing House
- ✓ Financial Services and Markets, PandianPunithavathy Vikas Publishing
- ✓ Sharma, G.L., and Y.P. Singh. Contemporary Issues in Finance and Taxation. Academic Foundation, Delhi
- ✓ Khan and Jain, Financial Services, Tata McGraw Hill
- ✓ Singh, J.K., Venture Capital Financing in India. Dhanpat Rai and Company, New Delhi.
- ✓ Annual Reports of Major Financial Institutions in India



Semester	Core-I	Core-II	Core-III	Multi- disciplina ry	AEC	SEC	VAC
Semester IV	 Specializati on Module Course II Business Data Analysis Business Application Software 	Corporate Legal Framework	Auditing & Corporate Governance		English: Word and Presentation Skills	Business Regulato ry Framewo rk	

CORE I

PAPER XIII Specialization Module Course II

Credit 4

Group A INTRODUCTION TO CARGO INDUSTRY

Unit – 1:

History of Air Cargo & Multi Modal forms of Transport

- a. History of Air Cargo & Mail, Air Freight, Air Express, Overnight Air Express & Air Mail
- b. Other Multi Modal forms of Transport- Rail, Sea & Surface Transport- Key Concepts

Unit – 2:

Key Organizations Facilitating Air Cargo

International Air Transport Association (IATA), International Civil Aviation Organization (ICAO), International Federation of Freight Forwarders Association (FIATA), The International Air Cargo Association (TIACA)

Unit – 3:

Air Cargo Business Models

Freighters, Charters, Integrators, Combination Carriers, Systems), Couriers, E-commerce, Postal mail

- a. Key Concepts- Brief Introduction to the Business Models
- b. Impact of various Business Models in relation to geography, size and scope

Unit – 4:

Key Stakeholders & Key Terminologies

- a. Key Stakeholders- Airports, Airlines (Direct), Airlines through General Sales Agents (GSA) or General Sales & Service Agents (GSSA), Shippers, Freight Forwarders, Custom Brokers, Consolidators, Trucking
- b. Key Terminologies & Abbreviations

Unit – 5:

Training & Development in Air Cargo Industry

- a. Importance of Training in the Aviation & Cargo Industry
- b. Areas of Training in the Air Cargo Industry
- c. Key Organizations facilitating Training &Development in the Aviation & Air Cargo Industry.

Text & Reference Books:

- ✓ Course Material Prepared by LSC
- ✓ Air Cargo Management- Air Freight and The Global Supply Chain- Michael Sales-Routledge (2016)
- ✓ Air Cargo and Logistics- Classics and Contemporary practice by Rico Merket and Jackie Walters- Academic Publishers (01 June, 2019)
- ✓ Moving Boxes by Air The Economics of International Air Cargo by Peter S. Morrell and Thomas Klein Routledge; 2 edition (19 October 2018)

Group B

LAST MILE OPERATIONS

Unit – 1:

Introduction

- 1.1 What is Last Mile in Ecommerce?
- 1.2 Importance of Last Mile in the supply chain
- 1.3 Last Mile Delivery challenges for ecommerce
- 1.4 Trends in Last Mile delivery
- 1.5 Route optimization in Last Mile operations

Unit – 2:

Last Mile Processes

- 2.1 Delivery Process & its challenges
- 2.2 Reverse pickup process in Last mile operations
- 2.3 Challenges in Reverse Pickup process
- 2.4 Tools and applications in Last Mile operations
- 2.5 Considerations for effective last mile logistics strategy

Unit – 3:

Metrics

- 3.1 Metrics to measure in last file
- 3.2 Automation and technology driving metrics.

Unit – 4:

Customer service

- 4.1 Customer service and its importance
- 4.2 Good and bad customer service (Dos and Don'ts of customer service)
- 4.3 Relationship between metrics and customer service.

Unit – 5:

Prospects of Last Mile Logistics 5Hrs

- 5.1 Innovations in Last Mile Logistics
- 5.2 Technology Trends in Last Mile Delivery
- 5.3 Last Mile Delivery Market Future Prospects

Text & Reference Books:

✓ Course Material Prepared by LSC

Group C

COMMERCIAL ASPECTS OF TRANSPORTATION

Unit – 1:

Commercial Aspects in Transportation – A Perspective-Role and importance of Commercial Aspects, relative strengths of rail vs road-Concept of commercial viability vis a vis operational feasibility-Issues/ functions included in the commercial aspects, organisational set up to handle these.

Unit – 2:

Commercial Aspects involving Passenger transportation –Passenger Services on Indian Railways; Booking and Reservation of passengers, Various class of services, types of tickets, concessions etc-Passengers Services in Road Sector, A state subject- differences from State to state-Supplementary and related services such luggage, parcel, refunds, catering etc.

Unit -3:

Commercial Aspects involving Goods / Freight transportation—Different components of freight traffic, Booking and delivery of freight traffic on Railways, Demurrage and Wharfage, sidings-Booking and delivery of goods in roadways, agencies involved and their role-Claims and liabilities, Organisational set-up and procedure for Claims' compensation.

Unit – 4:

Pricing of Transport-Basic consideration in pricing; Different type of costs involved in computing price, Relativity index of passenger fares in Indian Railways; surcharges and discounts-Principles of classification and Rate fixation and routing of traffic-Cost of service vs value of service, Cross subsidisation etc.

Unit – 5:

Marketing Strategies for Commercial growth – Need for marketing, Rail vs Road: Complementary and not competitive role, High profit yielding commodities-Incentive schemes, IT-enabled user-friendly solutions for Booking, payment, tracking consignments and trains, Passenger movement – PRS, etc-Future trends: technology induced improvements in various aspects of commercial working.

Textbooks

✓ Course Material Prepared by LSC

CORE I

PAPER XIV

Business Data Analytics

Credit 4

Course Objective

- Understand the fundamentals of data analytics: Students should be able to grasp the basic concepts and principles of data analytics, including data types, data sources, and data processing techniques.
- Develop proficiency in data manipulation and exploration: Students should gain hands-on experience in manipulating and exploring data using tools such as spread sheets, databases, and data visualization software.
- Learn statistical methods and techniques for data analysis: Students should acquire knowledge of statistical methods commonly used in business data analysis, including descriptive statistics, hypothesis testing, regression analysis, and time series analysis.
- Apply data analytics techniques to real-world business problems: Students should be able
 to identify business problems that can be addressed through data analysis, formulate
 appropriate analytical approaches, and interpret the results to make informed business
 decisions.
- Gain proficiency in data visualization: Students should develop skills in visualizing data effectively using graphs, charts, and dashboards to communicate insights and findings to stakeholders.
- Understand the ethical and legal considerations in data analytics: Students should be aware of ethical issues related to data privacy, confidentiality, and bias, and understand the legal frameworks governing the collection, storage, and use of data.
- Explore emerging trends and technologies in business data analytics: Students should stay updated on the latest trends, tools, and technologies in the field of data analytics, including machine learning, artificial intelligence, and big data platforms.

Course Outcomes

- After completion of the course, learners will be able to:
- Learn about the basics of analytics, the types and their application;
- Learn the technique of projecting growth, income and cash from accounting data for the future through time-series models;
- Learn accounting ratios and forecasting through the SLR model;
- Learn data visualization through graph, SLR & the method of Least Squares for estimation of parameters;
- Learn the use of R-Programming for analysing accounting data.

Unit 1: Introduction to Business Data Analytics

Understanding Data Analytics in Business, Definition and Importance of Business Data Analytics, Overview of Data Analytics Lifecycle: Collection, Cleaning, Analysis, Interpretation, and Visualization, Role of Data Analytics in Decision-Making and Business Strategy, Data Collection and Preprocessing. Sources of Business Data: Internal and External, Data Collection Methods: Surveys, Interviews, Observations, etc. Data Cleaning and Preprocessing Techniques: Handling Missing Values, Outliers, and Data Transformation, Exploratory Data Analysis (EDA). Descriptive Statistics: Measures of Central Tendency, Dispersion, and Distribution, Data Visualization Techniques: Histograms, Box Plots, Pie-charts, Doughnut, Scatter Plots etc. Identifying Patterns and Trends in Data using EDA

Unit 2: Business Analytics Tools in Excel

Introduction to Excel for Data Analytics, Advanced Data Analysis in Excel, PivotTables and Pivot Charts for Data Summarization and Visualization. Data Analysis Tools: Goal Seek, Solver, Scenario Manager, Slicer etc., Practical Applications in Excel, Case Studies and Business Scenarios, Hands-on Exercises and Projects to Apply Excel Skills in Real-World Analytics Tasks, Integration with External Data Sources and Automation Techniques

Unit 3: Data Visualization with Power BI

Introduction to Power BI, Overview of Power BI: Features, Components, and Benefits, Connecting to Data Sources: Excel, Databases, Online Services, etc. Creating Interactive Dashboards and Reports, Data Transformation and Modeling in Power BI, Creating Advanced Data Visualizations: Charts, Maps, and Gauges, Advanced Analytics and Insights in Power BI, Analyzing Data with Power BI, Sharing and Collaborating on Power BI Dashboards and Reports

Unit 4: Data Visualization with Tableau

Introduction to Tableau, Overview of Tableau Desktop and Tableau Server, Connecting to Data Sources: Excel, Databases, Cloud Services, etc. Building Interactive Dashboards and Visualizations, Data Preparation and Analysis in Tableau, Data Cleaning and Transformation using Tableau Prep Builder, Exploratory Data Analysis with Tableau Desktop: Drag-and-Drop Analytics, Creating Calculated Fields and Parameters, Advanced Visualization Techniques in Tableau, Implementing Advanced Chart Types: Tree Maps, Heat Maps, and Dual Axis Charts, Dashboard Design Best Practices and Interactivity Features

Project Work and Assessment: Application of Business Data Analytics Techniques and Tools in Real-World Business Scenarios, Project Planning, Execution, and Presentation, Integration of Skills Learned Throughout the Course

- ✓ Alexander, M., Decker, J., &Wehbe, B. (2014). Microsoft Business Intelligence Tools for Excel Analysis. New Jersey: Wiley.
- ✓ Kumar, D. U. (2017). Business Analytics: The Science of Data Driven Decision Making. New Jersey: Wiley.
- ✓ Motwani, B. (2019). Data Analytics with R. New Jersey: Wiley.
- ✓ North, M. (2012). Data Mining for the masses. Athens, Georgia: Global Text Project.
- ✓ Paul, T. (2011). R Cook book. New York: O Reilly Media'
- ✓ Provost, F., & Fawcett, T. (2013). Data Science for Business. New York: O'Reilly Media

CORE I

PAPER XV

Business Application Software

Credit 4

Course Objectives

- Understand Financial Modelling Concepts.
- Develop Proficiency in Excel.
- Apply Financial Modelling Techniques.
- Enhance Analytical Skills.
- Communicate Results Effectively.
- Problem-Solving and Decision Making.
- Explore Industry Applications.
- Collaborative Learning

Course Outcomes

After completion of the course, learners will be able to:

- Understanding Financial Modelling Principles.
- Proficiency in Excel-Based Modelling.
- Application of Financial Modelling Techniques.
- Effective Communication Skills.
- Critical Thinking and Analytical Skills.
- Practical Skills for Finance Careers.
- Industry-Relevant Knowledge.
- Continuous Learning and Professional Development.

Unit 1: Introduction to Business Application Software

Understanding Business Application Software, Definition and Importance of Business, Application Software, Overview of Tally and One ERP Systems, Role of Excel and PowerPoint in Business Operations, Introduction to Tally ERP 9, Installation and Setup of Tally ERP 9, Basic Navigation and Interface Overview, Creating Company Profiles and Configurations, Practical Application of Tally ERP 9, Accounting and Financial Management in Tally, Inventory Management and Stock Control, Generating Financial Reports: Balance Sheet, Profit & Loss Statement

Unit 2: Advanced Tally Features and Functions

Advanced Accounting Features in Tally ERP 9, Creation of Ledgers and Sub-ledgers, Advanced Voucher Entries: Contra, Payment, Receipt, Journal, etc., Handling Multi-Currency Transactions, Budgets and Controls in Tally, Tally Customization and Integration, Customizing Tally Reports and Invoice Formats, Integration with Excel for Data Import and Export, Integrating Tally with Other Business Applications, Introduction to One ERP, Overview of Enterprise Resource

Planning (ERP), Introduction to One ERP System and Modules, Key Features and Benefits of One ERP Implementation

Unit 3: Excel for Business Analysis and Reporting

- Excel Basics and Functions, Introduction to Excel Interface and Navigation, Basic Formulas and Functions: SUM, AVERAGE, IF, VLOOKUP, etc., Data Entry and Formatting Techniques, Advanced Excel Features, Data Analysis Tools: PivotTables, PivotCharts, Data Validation, Advanced Formulas and Functions: INDEX-MATCH, SUMIFS, COUNTIFS, etc.
- Excel Macros and Automation, Excel Integration with AI, Introduction to AI Integration in Excel, Using AI-Powered Features for Data Analysis and Prediction, Leveraging AI for Enhanced Decision-Making and Business Insights

Unit 4: Effective Presentation with PowerPoint

PowerPoint Basics and Design Principles, Introduction to PowerPoint Interface and Layout, Designing Effective Slides: Layouts, Fonts, Colors, Graphics, Tips for Creating Engaging Presentations, Advanced PowerPoint Features, Animation and Transition Effects, Slide Master and Custom Templates, AI Integration in PowerPoint, Using AI-Powered Design Suggestions, Leveraging AI for Presentation Insights and Feedback

Project Work and Assessment: Practical Application Projects

Application of Tally, One ERP, Excel, and PowerPoint Skills in Real-World Business Scenarios, Project Planning, Execution, and Presentation

CORE II

PAPER III

Corporate Legal Framework

Credit 4

Course Objectives

The course aims to impart the learner's working knowledge of the provisions of the Companies Act, 2013.

Course Outcomes

After completion of the course, learners will be able to:

- Explain relevant definitions and provisions relating to issue of prospectus and allotment of shares;
- Synthesize company processes, meetings, and decisions;
- Describe the framework of dividend distribution, Accounts of the company and Audit and Auditors of company;
- Determine the role of Board of directors and their legal position;
- State regulatory aspects involved in Oppression, Mismanagement, corporate restructuring and Winding Up and to study the composition of Adjudicating Authority i.e. NCLT and NCLAT and its powers.

Unit I: Introduction to Companies Act, 2013

Important definitions: Prospectus and Share Capital, Allotment of securities, Private Placement, share capital, basic requirements, alteration of share capital, Sweat Equity, Bonus issue, issue of shares at premium and discount, Further issue of shares, buy-back of shares.

Unit II: Management and Administration

Board Meetings, Annual General Meeting, Extraordinary General Meeting, Requisites of a valid meeting, Convening of Meetings, Minutes and Resolutions; Postal ballot; voting through electronic matters.

Unit III: Directors and their Powers

Board of directors, cclassification of directors, women directors, independent director; appointment and qualifications of directors; Director Identification Number (DIN); Disqualifications, Removal of directors; Legal positions, Powers, Duties and responsibilities; Additional Director, Alternate Director, Nominee Director, Director appointed by casual Vacancy, Key Managerial Personnel, Managing Director, Manager and Whole Time Director.

Unit IV: Oppression, Mismanagement, Corporate Restructuring and Winding-Up

Oppression, Mismanagement, Rights to apply, Powers of Tribunal, Provisions related to Compromises, Arrangement and Amalgamations, Concept and Modes of Winding Up; Provisions of winding up under Insolvency and Bankruptcy Code, 2016. National Company Law Tribunal and Appellate Tribunal-Definitions; Constitution of National Company Law Tribunal;

Constitution of Appellate Tribunal; Appeal from orders of Tribunal; Power to punish for contempt.

- ✓ Garg /Gupta/Dhingra Corporate Law, Kalyani publisher.
- ✓ CORPORATE LAWS, Vandana Bansal, Anjali Arora & Jyoti Prakash Rath Vikas Publishing.
- ✓ Business and Corporate Laws Tulsian P.C. S. Chand Publishing.
- ✓ Kumar, A. Corporate Laws. New Delhi: Taxmann Publication.
- ✓ Sharma, J. P. An Easy Approach to Corporate Laws. New Delhi: Ane Books Pvt. Ltd.
- ✓ Chadha R., & Chadha, S. (2018). Company Laws. Delhi: Scholar Tech Press.
- ✓ Hicks, A., & Goo, S. H. (2017). Cases and Material on Company Law. Oxford: Oxford University Press.
- ✓ Kuchhal, M. C., & Kuchhal, A. (2020). Corporate Laws. New Delhi: Shree Mahavir Book Depot.
- ✓ Kumar, A. (2019). Corporate Laws. New Delhi: Taxmann Publication.
- ✓ Sharma, J. P. (2018). An Easy Approach to Corporate Laws.

CORE III

PAPER III

Auditing and Corporate Governance

Credit 4

Course Objectives

The course aims to provide knowledge of auditing concepts, principles, procedures, and techniques in accordance with current legal requirements.

Course Outcomes

After completion of the course, learners will be able to:

- Summarise the basic concepts of auditing and acquaint with latest developments in the area of auditing.
- Describe the need of auditing and the role of auditors.
- Demonstrate the principles, procedures and techniques of auditing.
- Interpret the contents of audit reports.
- Analyse the provisions of Companies Act, 2013 relating to auditor and auditing.

Unit I: Introduction to Auditing

- Introduction Meaning Definition Objectives Differences between Accountancy and Auditing – Types of Audit - Advantages of Auditing – Preparation before commencement of new Audit – Audit Notebook – Audit Working Papers – Audit Program, Recent Trends In auditing: Nature & Significance of Tax Audit – Cost Audit - Management audit.
- Internal Control: meaning and objectives. Internal Check: meaning, objectives. Internal Check as regards: Wage Payments, Cash Sales, Cash Purchases. Internal Audit: Meaning Advantages and Disadvantages of Internal Audit Differences between Internal Check and Internal Audit.

Unit II: Vouching And Verification And Valuation Of Assets And Liabilities

- Meaning Definition Importance Routine Checking and Vouching Voucher Types
 of Vouchers Vouching of Receipts: Cash Sales, Receipts from debtors, Proceeds of the
 sale of Investments. Vouching of Payments: Cash Purchases, Payment to Creditors,
 Deferred Revenue Expenditure
- Meaning and Objectives of verification and valuation Position of an Auditor as regards the Valuation of Assets – Verification and Valuation of different Items: Assets: Land & Building, Plant & Machinery, Goodwill – Investments - Stock in Trade. Liabilities: Bills Payable - Sundry Creditors – Contingent Liabilities.

Unit III: Audit of Limited Companies and Audit Report

- Company Auditor Appointment Qualification Powers Duties and Liabilities Professional Ethics of an Auditor, Audit of Educational Institutions – Audit of Insurance Companies- Audit of Co-operative societies.
- Audit Report and Special Audit Contents and types of audit report, Qualified and Unqualified report; National Financial Reporting Authority. Special Audit: Banking and Insurance company; Forensic Audit.

Unit IV: Corporate Governance

Conceptual framework of Corporate Governance, Corporate Governance Reforms. Major Corporate Scandals in India and Abroad: Common Governance Problems Noticed in various Corporate Failures. Codes & Standards on Corporate Governance.

- ✓ Das / Das Auditing and Corporate Governance, Kalyani publisher.
- ✓ P N Reddy & Appannaiah, Auditing, HPH
- ✓ BN Tandon, Practical Auditing, Sultan Chand
- ✓ Dr. Nanje Gowda, Principles of Auditing, VBH
- ✓ Dr. Alice Mani: Principles & Practices of Auditing, SBH.
- ✓ K. Venkataramana, Principles and Practice of Auditing, SHBP.
- ✓ MS Ramaswamy, Principles and Practice of Auditing.
- ✓ Dinakar Pagare, Practice of Auditing, Sultan Chand
- ✓ Kamal Gupta, Practical Auditing, TMH R.G Sexena Principles and Practice of Auditing, HPH

AEC Paper II Business Communication Skills – I Credit 4

S. No	Modules	Outcomes
1.	Orientation for Management	 Classroom Manners and Discipline Conduct of Students (Theory & Practical) Grooming Useful Phrases for Everyday Use Asking Questions
2.	Self Esteem	 Know Yourself Accept Yourself (One Activity through a Psychometric test)
3.	Etiquettes and Manners	 College Etiquettes Conversation Etiquettes Social Etiquettes Telephone Etiquettes
4.	Communication Skills (Meaning and Definition)	 Spoken English Phonetics Accent Intonation Practice Proper Pronunciation through Words and Phrases
5.	Communication Skills through Extempore	 Speaking about Objects, Speaking about People Speaking about Events, Speaking about Hospitality Industry – Current Trends
6.	Developing A Positive Attitude	 Meaning and Definition of Attitude How to Develop Positive Attitude 7 Steps to Change Attitude
7.	Group Discussion	 Introduction to GD Do's and Don'ts of GD Useful words Phrases Practice on Basic GD topics
8.	Listening Skills	 Meaning and Significance Do's and Don'ts of Listening Guidelines for Effective Listening Problems and Solutions to become Active Listener

9.	Current Affairs	National & International Ministers and Leaders along with News Makers
10.	Fundamentals of Communication	 Meaning and Significance of Communication Process of Communication Principles of Effective Business Communication 7Cs How to Improve Command over Spoken and Written English Effective Listening
11.	Communicating in a Multicultural World	 Idea of A Global World Impact of Globalization on Organizational and Multicultural Communication Understanding Culture for Global Communication Etic and Emic Approaches to Culture The Cross-Cultural Dimensions of Business Communication Technology and Communication Ethical & Legal Issues in Business Communication Overcoming Cross-Cultural Communication
12.	Business Letter Writing and Presentation Tool	 Need, Functions, and Layout of Letter Writing Types of Letter Writing: Persuasive Letters, Request Letters, Sales Letters, and Complaints, Employment-related letters Interview Letters, Promotion, Letters, Resignation Letters
13	Departmental Communication	 Barriers to Communication Meaning, Need and Types Newsletters Project and Report writing How to make a Presentation Various Presentation Tools, along with Guidelines for Effective Presentation,

SEC PAPER II

Business Regulatory Framework

Credit 3

Course Objectives

- Inculcate among the students the basic principles of law connected with business transactions.
- To enable students to apply the law while entering into contracts
- To provide a basic idea of the law relating to partnership and sale of goods
- To provide an outline of the fundamentals of Company Law
- To convey the core ideas of Intellectual Property Rights

Course Outcomes

After completion of the course, learners will be able to:

- Know the basics of the laws related to contracts
- Demonstrate an understanding of the legal environment of business
- Apply basic knowledge to business transactions and formation of contracts
- Understand and evaluate the law applicable to companies
- Understand and apply the basic principles of IPR

Course Outlines

UNIT I: Indian Contract ACT, 1872

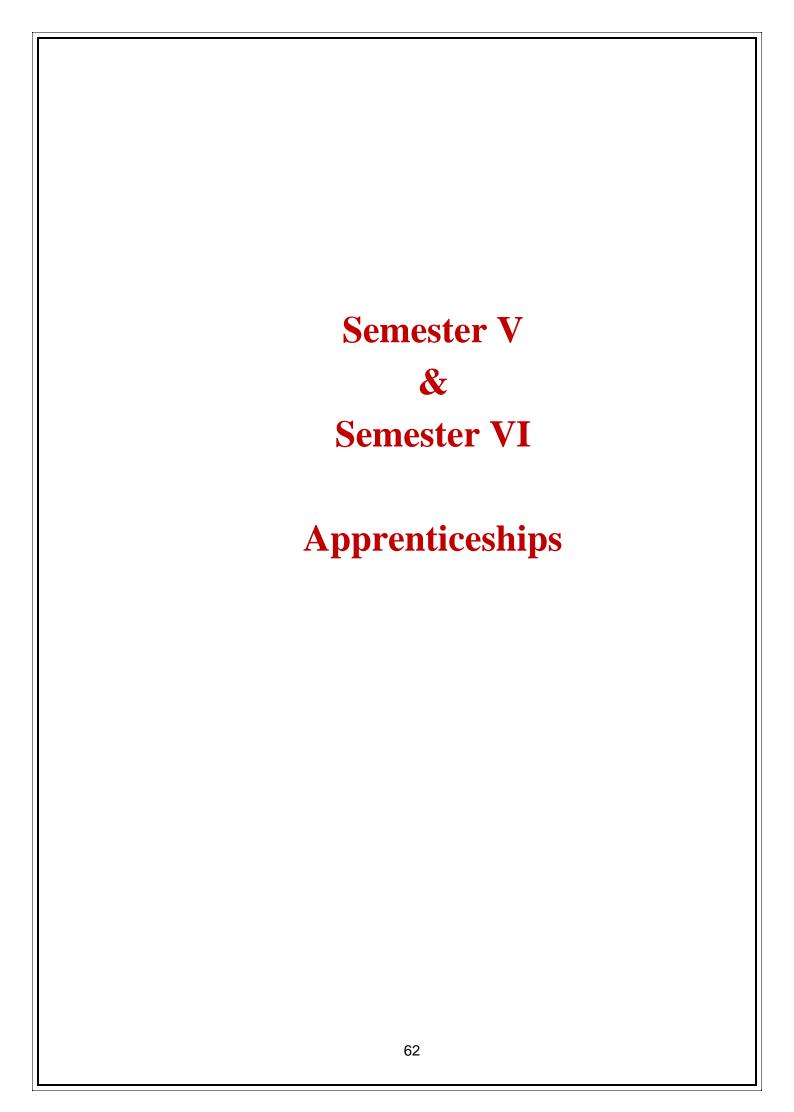
Nature of contract and its essentials, Void, valid and voidable contracts, Consent, consideration and its' impact on contract, Agreements in restraint of trade, Performance, breach, revocation and termination of contract, Agency and bailment contracts, Contract of Indemnity, Contract of Guarantee and Pledge.

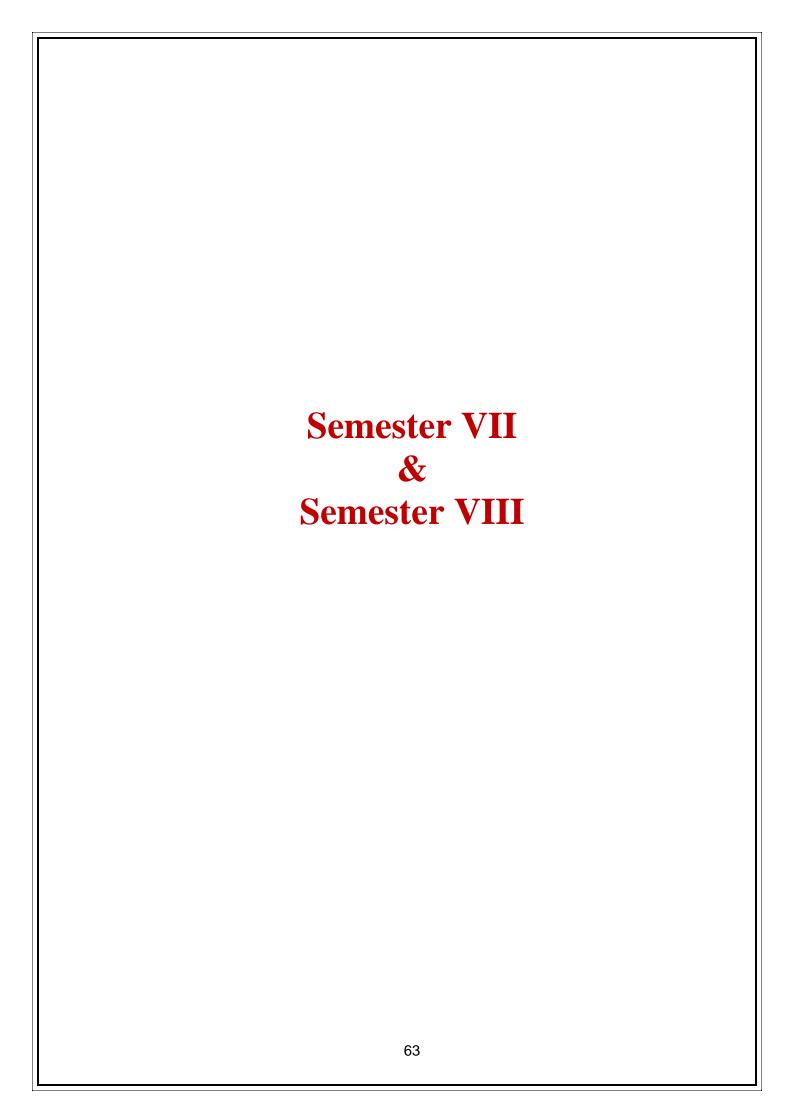
UNIT II: Sale of Goods Act,1930

Nature of sale, conditions and warranties, Performance of contract of sale and right of unpaid seller. Bailment and Pledge.

UNIT III: Competition Act, 2002 and Consumer Protection Act, 2019 Competition Act, 2002: Objectives and basic concepts, Consumer, goods, service, Prohibition of anti-competitive agreements, Prohibition of Abuse of Dominant Position; Consumer Protection Act, 2019: Important definitions, Consumer Disputes Redressal Commission, Measures to Prevent Unfair Trade Practices, Offences and Penalties

- ✓ Garg K.C. / Business Law (Hons.), Kalyani publisher.
- ✓ Bose, D. C. (2008). Business Law. New Delhi: PHI Limited.
- ✓ Business Laws: Semester I: (NEP 2020 for the University of Delhi) Kuchhal M.C. & Kuchhal Vivek Vikas Publishing
- ✓ Business Laws for B.Com. (Hons.) Tulsian P.C. & Tulsian Bharat S. Chand Publishing
- ✓ Chopra, R. K. (2015). Business Laws. New Delhi: Himalaya Publishing House.
- ✓ Kuchhal, M. C., & Kuchhal, V. (2018). Business Laws. New Delhi: Vikas Publishing.
- ✓ Singh, A. (2009). Business Law. Delhi: Eastern Book Company
- ✓ Chadha R., &Chadha, S. (2018). Company Laws. Delhi: Scholar Tech Press.
- ✓ Hicks, A., & Goo, S. H. (2017). Cases and Material on Company Law. Oxford: Oxford University Press. Kuchhal, M. C., &Kuchhal, A. (2020). Corporate Laws. New Delhi: Shree Mahavir Book Depot.
- ✓ Intellectual Property Rights –Law & Practice, ICSI Materials





Core I

PAPER XVI

Research Methodology & Research Ethics

Credit 4

Course Objectives

To acquaint students with the concepts of Survey and Research and provide inputs relating to research methodology, the process of research report writing.

Course Outcomes

After completion of the course, learners will be able to:

- Understand Meaning of Research and role of research in various functional areas;
- Formulate hypothesis and research design;
- Identify Methods of Data collection and pilot study;
- Develop Processing and Analysis of data;
- Apply Report writing techniques and draft research report

Unit-1: Introduction to Research Methodology

Definition of research, Importance of research in academic and professional contexts, Types of research: qualitative vs. quantitative. Research Design and Planning; Formulating research questions and objectives, Selecting appropriate research designs: experimental, observational, survey, case study Developing research hypotheses and variables

Unit-2: Data Collection Methods and Sampling Techniques

Surveys: design, administration, and analysis. Interviews: types, techniques, and ethical considerations. Observational research: participant observation, structured observation. Probability sampling methods: simple random sampling stratified sampling, cluster sampling Non-probability sampling methods: convenience sampling, purposive sampling, snowball sampling.

Unit-3: Data Analysis Techniques and Research Project Design

Qualitative data analysis methods: thematic analysis, content analysis, grounded theory, Quantitative data analysis methods: descriptive statistics, inferential statistics, and regression analysis. Developing a research proposal: objectives, literature review, methodology, timeline. Planning and executing a research project: data collection, analysis, and interpretation

Unit-4: Research Ethics

Ethical principles in research: integrity, respect, fairness, responsibility. Informed consent and confidentiality, Avoiding plagiarism and maintaining academic integrity

- ✓ Swain A.K.P.C Business Research Method & Project Work, kalyani publisher.
- ✓ Research Methodology, Cauvery R./ Nayak, Sudha U.K./ Girija M. &Meenakshi R.S. Chand Publishing
- ✓ Research Methodology: Concepts and Cases, Chawla Deepak &Neena Sodhi Vikas Publishing
- ✓ Cooper, D. R. & Schindler, P. S., Business Research Methods. Boston, Mass.: McGraw-Hill/Irwin
- ✓ Greene, W. H., Econometric Analysis. Pearson Pvt. limited
- ✓ Zikmund, W. G., Babin, B. J., Carr, J. C., & Griffin (2013). Business Research Methods. Cengage Learning limited

Core I

PAPER-XVII

Fundamentals of Securities Analysis and Portfolio Management

Credit 4

Course Objectives

To expose the students on the various avenues available for effective investment and possible way to avoid risk in investments through portfolio Management.

Course Outcomes

After completion of the course, learners will be able to:

- Understand the basic concepts of security and portfolio
- Analyze the individual security
- Construct and Manage a Portfolio
- Evaluate and revise the portfolios

Unit I

- Introduction to Security: Nature and Scope of Security Analysis; Savings vs. Investment, Elements of Investment, Objectives of Investment, Investment Philosophy, Types of Investor, Investor, Speculator & Gambler, Investment Avenues, Features of Investment, Process of Investment, Contemporary Issues in Investment Management.
- Measurement of Risk and Return: Measurement of Stock Return, Systematic Risk and Unsystematic Risk, Measurement of Beta. Measuring Risk and Return in Practice (Using Ms-Excel).

Unit-II

- Equity Analysis: Fundamental Analysis: Economic Analysis, Industry Analysis and Company Analysis. Technical Analysis: Various Prices and Volume Indicators, Indices: Various Types of Trends and Indices.
- Market Efficiency: Concept and Importance, Random Walk Theory, the Efficient Market Hypothesis. Forms of Market Efficiency, Testing Different Form of Market Efficiency Using MS-Excel/SPSS

Unit-III

Portfolio Management: Meaning, Importance and Objectives, Phase of Portfolio Management. Portfolio Analysis: Estimating Rate of Return and Standard Deviation of Portfolio Returns; Effects of Combining Securities; Markowitz Risk-Return Optimization.

Unit-IV

Single Index Model: Portfolio Risk: Portfolio Market Risk and Unique Risk, Sharpe's Optimization Solution. Capital Asset Pricing Model and Its Assumptions, Capital Market Line, Security Market Line; Risk Free Lending and Borrowing. Arbitrage Pricing Theory and Multifactor Asset Pricing Models

	ested Readings
~	Barua, Raghunathan and Verma: Portfolio Management, Tata McGraw Hill, Delhi. Bhalla V. K Investment Management, Portfolio Analysis - S. Chand, New Delhi. Clark, James Francies: Investment management. McGraw Hill, International Edition, No. York.

Core I

PAPER XVIII

Fundamentals of Operation Research and Quantitative Technique

Credit 4

Course Objectives

- Understand the fundamental concepts and principles of operations research and quantitative techniques.
- Learn mathematical modeling techniques for representing real-world problems in OR.
- Develop proficiency in optimization methods, including linear programming, integer programming, and nonlinear programming.
- Gain practical skills in applying quantitative techniques to analyze and solve business, engineering, and management problems.
- Learn simulation techniques for modeling stochastic systems and uncertainty in decision-making.
- Explore applications of OR and quantitative techniques in diverse fields such as supply chain management, logistics, finance, and healthcare.
- Develop critical thinking and problem-solving skills through hands-on exercises and case studies.
- Communicate quantitative analysis results effectively through written reports and presentations.

Course Outcomes

After completion of the course, learners will be able to:

- Foundational Knowledge of Operations Research.
- Proficiency in Mathematical Modeling.
- Competence in Optimization Techniques.
- Understanding of Simulation Modeling.
- Applications of OR in Diverse Fields.
- Critical Thinking and Problem-Solving Abilities.
- Effective Communication of Analysis Results.
- Practical Skills for Decision Support

Unit- 1: Introduction to Operations Research

Definition and scope of operations research, Historical development of OR and its applications, Role of quantitative techniques in decision-making. Mathematical Modeling; Formulation of mathematical models for real-world problems, Linear and nonlinear models, Objective functions, decision variables, and constraints

Unit-2: Optimization Techniques and Network Analysis

Linear programming: formulation, graphical solution, simplex method, Integer programming: branch and bound, cutting planes, Nonlinear programming: gradient-based methods, convex optimization. Network modeling techniques: critical path method (CPM), program evaluation and review technique (PERT), Shortest path problems, minimum spanning trees, maximum flow problems

Unit-3: Simulation Modeling

Simulation methodology: discrete event simulation, Monte Carlo simulation, Random number generation, input modeling, output analysis, Applications of simulation in business and engineering. Decision Analysis; Decision trees: construction, analysis, and evaluation, Utility theory and risk analysis, Sensitivity analysis and decision-making under uncertainty

Unit-4: Applications of Operations Research

Supply chain optimization, Inventory management, Production planning and scheduling, Transportation and logistics. Case Studies and Practical Applications, Real-world case studies applying OR and quantitative techniques, Group projects analyzing and solving complex problems using quantitative methods, Presentation and communication of analysis results

Suggested Readings

✓ Operations Research, 4th Edition, Kalavathy S. Vikas Publishing

Core II

PAPER XIX

Corporate Restructuring & Business Valuation

Credit 4

Course Objectives

- Understand the concepts and motives behind corporate restructuring.
- Learn about different forms of corporate restructuring, including mergers, acquisitions, divestitures, and reorganizations.
- Gain proficiency in financial statement analysis and interpretation.
- Develop skills in business valuation techniques and methodologies.
- Analyse the impact of corporate restructuring on shareholder value.
- Explore regulatory and legal considerations in corporate restructuring.
- Apply corporate restructuring and valuation principles to real-world business scenarios.
- Communicate valuation analyses and restructuring strategies effectively.

Course Outcomes

After completion of the course, learners will be able to:

- Understanding of Corporate Restructuring
- Proficiency in Financial Statement Analysis
- Competence in Business Valuation
- Analysis of Restructuring Impact on Shareholder Value
- Understanding of Regulatory and Legal Considerations
- Application of Valuation and Restructuring Principles
- Critical Thinking and Problem-Solving Abilities
- Effective Communication of Valuation Analyses

Unit I: Introduction to Corporate Restructuring

Definition and motives behind corporate restructuring, Types of corporate restructuring: mergers, acquisitions, divestitures, spin-offs, reorganizations. Financial Statement Analysis; Overview of financial statements: balance sheet, income statement, cash flow statement, Ratio analysis: liquidity ratios, profitability ratios, leverage ratios, Common-size analysis and trend analysis

Unit II: Business Valuation Methods

Introduction to business valuation: intrinsic value vs. market value, Valuation approaches: asset-based, income-based, market-based, Discounted cash flow (DCF) analysis, comparable company analysis (CCA), precedent transactions analysis (PTA). Valuation of Mergers and Acquisitions; Methods of valuing mergers and acquisitions, Synergy analysis and valuation adjustments, Valuation considerations in merger negotiations. Valuation of Divestitures and Spin-offs; Valuation considerations in divestiture transactions, Spin-off valuation techniques and analysis, Financial modelling for spin-off transactions.

Unit III: Regulatory and Legal Aspects of Corporate Restructuring

Regulatory frameworks governing corporate restructuring, Legal considerations in mergers, acquisitions, and divestitures, Compliance with antitrust laws and securities regulations

announcer	the impact of nents, Long-tern studies of corpo	m implications	of corporate	restructuring	
World Case	station of corp.		mg transactio		

Core II

PAPER XX

International Business Environment

Course Objectives

- Understand the concepts and theories of international business and globalization.
- Analyze the economic, political, legal, and cultural dimensions of the international business environment.
- Learn about international trade policies, trade agreements, and trade barriers.
- Explore foreign market entry strategies and modes of international expansion.
- Gain insights into managing cultural diversity and ethical challenges in international business.
- Understand the role of technology and innovation in shaping the global business landscape.
- Analyze international business risks and develop risk management strategies.

Course Outcomes

After completion of the course, learners will be able to:

- Understanding of International Business Concepts.
- Analysis of Economic Environment.
- Assessment of Political and Legal Risks.
- Management of Cultural Diversity.
- Evaluation of Trade Policies and Agreements.
- Development of Foreign Market Entry Strategies.
- Integration of Technology and Innovation.

Unit-1: Introduction to International Business

Definition and scope of international business, Theories of international trade and investment, Drivers of globalization and its impact on businesses. Economic Environment of International Business; Global economic systems: capitalism, socialism, mixed economies, Economic indicators and measures: GDP, GNP, inflation, exchange rates, International financial institutions and their role in global finance

Unit-2: Political, Legal and Cultural Environment of International Business

Political systems and ideologies: democracy, authoritarianism, communism, Legal frameworks governing international business: international law, trade regulations, intellectual property rights, Political risk assessment and management strategies, Dimensions of culture: Hofstede's cultural dimensions theory, Cultural differences and their impact on business practices, Managing cultural diversity and fostering cross-cultural communication

Unit-3: International Trade Policies and Agreements

Trade theories: comparative advantage, absolute advantage, factor endowment theory, Trade policies: tariffs, quotas, subsidies, Regional trade agreements and their impact on international business. Foreign Market Entry Strategies; Modes of international market entry: exporting,

licensing, franchising, joint ventures, acquisitions, greenfield investments, Factors influencing the choice of entry mode, Entry strategies for emerging markets vs. developed markets **Unit-4: Technology and Innovation in International Business** Role of technology in facilitating international business operations, Impact of innovation on global competitiveness, Digital transformation and its implications for international business. Managing International Business Risks; Types of international business risks: political risk, financial risk, operational risk, Risk assessment techniques and tools, Risk management strategies and contingency planning.

Core I

Semester VIII

PAPER XXI

Sustainable Development and Corporate Social Responsibility

Course Objectives

- Understand the concepts of sustainable development, corporate social responsibility, and business ethics.
- Explore the relationship between business operations and environmental, social, and governance (ESG) issues.
- Learn about sustainability frameworks, standards, and reporting guidelines.
- Analyze the role of stakeholders in sustainability and CSR initiatives.
- Examine strategies for integrating sustainability and CSR into corporate strategies and operations.
- Assess the impact of sustainability and CSR practices on business performance and stakeholder value.
- Develop skills in sustainability reporting and communication

Course Outcomes

After completion of the course, learners will be able to:

- Understanding of Sustainable Development and CSR.
- Analysis of Environmental and Social Impacts.
- Knowledge of Sustainability Frameworks and Reporting
- Stakeholder Engagement and Governance.
- Integration of Sustainability into Business Strategy.
- Assessment of CSR Performance and Impact.
- Communication and Reporting Skills.
- Application of Sustainability Principles.

Unit-1: Introduction to Sustainable Development and CSR

Definitions and concepts of sustainable development and CSR, Historical evolution and significance of sustainability and CSR in business, **Environmental Sustainability and Business**Operations; Environmental challenges and impacts of business operations, Sustainable business practices: energy efficiency, waste reduction, resource conservation

Unit-2: Social Responsibility and Stakeholder Engagement

Social issues in business: labor practices, human rights, community development, Stakeholder theory and stakeholder engagement strategies. Governance, Ethics, and Corporate Citizenship; Corporate governance principles and practices, Business ethics and ethical decision-making, Role of corporations in global citizenship and community development.

Unit-3: Sustainability Reporting and Standards

Sustainability reporting frameworks: Global Reporting Initiative (GRI), Sustainability Accounting Standards Board (SASB), Integrated reporting and triple bottom line accounting, Assurance and verification of sustainability reports. Sustainable Supply Chain Management; Principles of sustainable supply chain management, Supplier engagement and responsible sourcing practices, Supply chain transparency and traceability

Unit-4: CSR Strategy and Implementation

Developing a CSR strategy: goal-setting, implementation, evaluation, CSR integration into corporate culture and operations, Measuring and evaluating CSR performance and impact. Case studies of companies implementing sustainability and CSR initiatives, Best practices in sustainable development and corporate social responsibility.

Core II

PAPER XXII

Fundamentals of Commodity Markets

Course Objectives

- Understand the Basics of Commodity Markets.
- Learn about Different Types of Commodities.
- Examine Supply and Demand Dynamics.
- Understand Price Determination Mechanisms.
- Explore Risk Management Strategies.
- Study Trading and Hedging Techniques.
- Examine Regulatory Frameworks.

After completion of the course, learners will be able to:

- Foundational Knowledge of Commodity Markets.
- Familiarity with Various Types of Commodities.
- Understanding of Supply and Demand Dynamics.
- Proficiency in Price Determination Mechanisms.
- Skills in Risk Management.
- Competence in Trading and Hedging.
- Awareness of Regulatory Requirements

Unit-1: Introduction to Commodity Markets

Definition of commodities, Historical evolution of commodity trading, Importance of commodities in the global economy. Types of Commodities; Classification of commodities (agricultural, energy, metals, etc.), Characteristics of different commodity types, Major commodity exchanges worldwide.

Unit-2: Participants in Commodity Markets

Overview of market participants (producers, consumers, traders, speculators, hedgers, etc.), Role of intermediaries (brokers, exchanges, clearinghouses, etc.), Importance of market liquidity. Supply and Demand Dynamics; Factors affecting commodity supply and demand, Seasonality and cyclical trends in commodity markets, Impact of geopolitical events and weather patterns. Commodity Pricing Mechanisms; Spot market vs. futures market, Basics of commodity futures contracts, Price discovery process.

Unit-3: Risk Management in Commodity Markets

Overview of price risk, credit risk, and operational risk, Introduction to hedging strategies, Risk management tools (futures, options, swaps, etc.). Fundamental analysis: Supply-demand fundamentals, production forecasts, consumption trends, Technical analysis: Chart patterns, trend analysis, technical indicators, Sentiment analysis: Market sentiment, news impact on prices

Unit-4: Trading Strategies and Regulatory Environment

Overview of trading strategies (trend following, mean reversion, spread trading, etc.), Backtesting and performance evaluation, Risk-reward considerations, Overview of regulatory bodies and frameworks governing commodity markets, Compliance requirements for market participants, Market manipulation and insider trading.

PAPER XXIII

Social Entrepreneurship and Incubation

Course Objectives

- Understand Social Entrepreneurship.
- Explore Social Innovation.
- Learn about Incubation Ecosystems.
- Develop Entrepreneurial Mindset.
- Identify Social Impact Opportunities.
- Understand Funding and Financing.
- Gain Skills in Business Planning and Management.
- Promote Ethical Leadership and Governance.

Course Outcomes

After completion of the course, learners will be able to:

- Comprehensive Understanding of Social Entrepreneurship.
- Ability to Innovate for Social Impact.
- Familiarity with Incubation Ecosystems.
- Entrepreneurial Mindset Development.
- Identification of Social Impact Opportunities.
- Knowledge of Funding and Financing Options.
- Skills in Business Planning and Management.
- Emphasis on Ethical Leadership and Governance.

Unit-1: Introduction to Social Entrepreneurship

Definition and characteristics of social entrepreneurship, Historical overview and contemporary examples of social enterprises. Social Impact Assessment; Methods for measuring social impact, Theory of change and logic models, Impact assessment frameworks and tools

Unit-2: Business Model Design for Social Enterprises

Adapting traditional business models for social impact, Revenue models for sustainability, Balancing financial and social objectives. Social Innovation and Ideation; Techniques for identifying social problems and needs, Ideation and brainstorming for innovative solutions, Human-cantered design and prototyping

Unit-3: Incubation and Acceleration of Social Ventures

The role of incubators and accelerators in supporting social entrepreneurs, Accessing resources: funding, mentorship, and networks, Developing a social enterprise toolkit: business planning, marketing, and legal considerations. Scaling Social Ventures; Strategies for scaling impact while maintaining mission integrity, Partnerships and collaborations for scale, Challenges and opportunities in scaling social enterprises

Unit-4: Ethics and Values in Social Entrepreneurship

Ethical dilemmas and decision-making in social entrepreneurship, Stakeholder engagement and community empowerment, Building a culture of transparency and accountability.

