

SSN COLLEGE OF ENGINEERING, KALAVAKKAM - 603110
(Autonomous Institution Affiliated to Anna University Chennai)
REGULATIONS 2018
CHOICE BASED CREDIT SYSTEM
MASTER IN BUSINESS ADMINISTRATION
CURRICULA AND SYLLABI
SEMESTER I

S.No	CODE NO	COURSE TITLE		L	T	P	C	No of Sessions
1	PBA1101	Economic Analysis for Business	FC	4	0	0	4	56
2	PBA1102	Statistics for Managerial decisions	FC	3	1	0	4	56
3	PBA1103	Organizational Behaviour	FC	3	0	0	3	42
4	PBA1104	Accounting for Management	FC	4	1	0	4	70
5	PBA1105	Legal Aspects of Business	FC	3	0	0	3	42
6	PBA1106	Principles of Management	FC	2	0	0	2	28
7	VBA0101	Indian Business Environment	VAC	1	0	0	0	14
8	PBA1115	Managerial Communications I*	SDC	0	0	2	2	28
9	PBA1111	Data Analysis I (Lab)	FC	0	0	2	1	28
10	VBA0102	Seminar I	VAC	0	0	2	0	28
TOTAL				20	2	6	23	392

* No end semester exam. Only continuous evaluation.

SEMESTER II

S.No	CODE NO	COURSE TITLE		L	T	P	C	No of Sessions
1	PBA1201	Marketing Management	PC	4	0	0	4	56
2	PBA1202	Human Resource Management	PC	3	0	0	3	42
3	PBA1203	Financial Management	PC	3	0	0	3	42
4	PBA1204	Operations Management	PC	3	0	0	3	42
5	PBA1205	Business Research Methods	PC	3	0	0	3	42
6	PBA1206	Business Information Systems	PC	3	0	0	3	42
7	PBA1207	Applied Operations Research	PC	3	0	1	4	56
8	PBA1215	Managerial Communications II*	SDC	0	0	2	2	28
9	PBA1211	Data Analysis II (Lab)	FC	0	0	2	1	28
10	VBA0201	Seminar II	VAC	0	0	2	0	28
TOTAL				22	0	7	26	406

* No end semester exam. Only continuous evaluation.

SEMESTER III

S.No	CODE NO	COURSE TITLE		L	T	P	C	No of Sessions
1	PBA1301	Strategic Management	PC	3	0	0	3	42
2		Elective I	PE	3	0	0	3	42
3		Elective II	PE	3	0	0	3	42
4		Elective III	PE	3	0	0	3	42
5		Elective IV	PE	3	0	0	3	42
6		Elective V	PE	3	0	0	3	42
7		Elective VI	PE	3	0	0	3	42
8	PBA1316	Summer Internship	SI	0	0	2	6	28
TOTAL				21	0	2	27	322

SEMESTER IV

S.No	CODE NO	COURSE TITLE		L	T	P	C	No of Sessions
1		Elective VII	PE	3	0	0	3	42
2		Elective VIII	PE	3	0	0	3	42
3	PBA1418	Final Semester Project	FSP	0	0	0	12	
TOTAL				6	0	0	18	84

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1101	ECONOMIC ANALYSIS FOR BUSINESS	4	0	0	4

LEARNING OUTCOMES

CO-1 To have a broader understanding of principles relating to micro and macro economics.

CO-2 Familiarity with the application of these principles in business.

UNIT – 1 INTRODUCTION

6

Introduction – Definition of Economics - Micro and Macro Economics - Basic Economic Concepts: Scarcity, Choices, and Opportunity Cost –Basic Economic Problems: What to Produce, How to Produce, For Whom to Produce – Production Possibilities Curve - Assumptions, Factors influencing shift of PPC – Economic Systems: Mixed Economy, Socialism, and Capitalism – Characteristics, Merits and Demerits – Economic Decisions in Different Systems – Environmental Economics.

UNIT – 2 CONSUMER & PRODUCER BEHAVIOUR

13

Demand and Supply: Law of Demand – Determinants of Demand – Elasticity of Demand – Law of Supply – Determinants of Supply – Change in Quantity Supplied – Exceptional Supply

Market Equilibrium: Equilibrium Price and Output – Consumer Surplus, Producer Surplus and Market Efficiency – Government Intervention in the Market – Market Failure.

Consumer Behaviour: Law of Diminishing Marginal Utility – Law of Equi-marginal Utility – Indifference Curves – Income Effect, Price Effect and Substitution Effect.

Producer Behaviour: Production Function – Short-run Production Function – Law of Diminishing Marginal Returns – Returns to Scale - Marginal Rate of Technical Substitution – Long-run Production Function – Cost of Production – Cost Concepts – Cost Curves in the Short Run –Cost Curves in the Long Run – Economies and Diseconomies of Scale – Relationship between Price, Average Revenue and Marginal Revenue.

UNIT – 3 PRODUCT AND FACTOR MARKET

13

Market Structures: Perfect Competition, Monopoly, Monopolistic Competition, Oligopoly – Characteristics –Comparison between Perfect Competition and Monopoly – Price fixation under different market structures - Price Discrimination.

Factor Market: Introduction – Theory of Marginal Productivity – Determination of Equilibrium Price of a Factor – Determination of Wages, Rent and Interest.

UNIT – 4 PERFORMANCE OF ECONOMY 12

Macroeconomic Goals – Components of Macro Economics: Households, Firms, Government, Rest of the World – Circular Flow Diagram & Equilibrium of Four Sector Economy – Aggregate Demand and Aggregate Supply – Measures of Economic Activity – Methods of Measuring National Income - Uses – Difficulties – Real Income, Per Capita Income and Growth Rate – National Income Equilibrium: Consumption and Savings – Investment Theory – Multiplier Concept.

UNIT – 5 MACRO ECONOMIC PROBLEMS & ROLE OF MONEY 12

Role of Government – Economic Functions of Government – Types of Budget – Government Revenue – Government Expenditure – Public Debt – Government Policy – Fiscal Policy – Monetary Policy – Impact of Fiscal and Monetary Policy.

Macroeconomic Problems: Business Cycle: Characteristics, Phases – Unemployment: Types, Impact, Measures – Inflation: Calculation, Causes, Effects, Measures to Control Inflation - Price Indices CPI – Money & Banking – International Economics.

TOTAL SESSIONS: 56

TEXT BOOK:

Deviga Vengedasalam, Karunagaran Madhavan, Principles of Economics, 3rd Edition, Oxford, 2013.

REFERENCE BOOKS:

1. Paul A. Samuelson, William D. Nordhaus, Sudip Chaudhuri and Anindya Sen, Economics, 19th edition, Tata McGraw Hill, New Delhi, 2010.
2. Geetika, Piyali Ghosh, Purba Roy Choudhury, Managerial Economics, 2nd Edition, McGraw Hill.
3. D.N. Dwivedi, Managerial Economics, 7th Edition, Vikas, 2011.
4. Debabrata Datta, Managerial Economics, PHI Learning Pvt. Ltd., 2017

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1102	STATISTICS FOR MANAGERIAL DECISIONS	3	1	0	4

LEARNING OUTCOMES

CO-1 Demonstrate an understanding of basic concepts in Statistics and their applications.

CO-2 Identifying the business problem and applying suitable statistical tests for the predetermined data set to solve the business problem.

CO-3 Formulate and use appropriate models of data analysis to find feasible solution for business-related problems.

CO-4 Understand and communicate from the statistical outputs into managerial recommendations.

UNIT -1 DESCRIPTION

8

Importance of Statistics in Business Analysis – Population - Descriptive Statistics – Measures of Central Tendency – Mean, Median and Mode – Measures of Dispersion – Range – Mean Deviation – Standard Deviation and Variance.

UNIT – 2 PROBABILITY

10

Basic definitions and rules for probability – conditional probability independence of events – Baye’s theorem, and random variables - Probability distributions – Binomial – Poisson and Normal distributions.

UNIT – 3 SAMPLING DISTRIBUTION AND ESTIMATION

9

Sampling techniques – Introduction to sampling distributions – sampling distribution of mean and proportion – application of central limit theorem – Estimation – Point and Interval estimates for population parameters of large sample and small samples – determining the sample size.

UNIT – 4 INFERENCE STATISTICS

19

Parametric tests - one sample and two sample tests for means and proportions of large samples (z-test) - one sample and two sample tests for means of small samples (t-test) - F-test for two sample standard deviations - ANOVA one and two way.

Non parametric tests – Chi-square test for single sample standard deviation – Chi-square tests for independence of attributes and goodness of fit – Sign test for paired data - Rank sum test – Kolmogorov - Smirnov – test for goodness of fit - comparing two populations - Mann – Whitney U test and Kruskal Wallis test – One sample run test.

UNIT – 5 PREDICTIVE STATISTICS

10

Correlation – Coefficient of Determination – Rank Correlation – Regression – Estimation of Regression line – Method of Least Squares – Standard Error of estimate.

TOTAL SESSIONS: 56

TEXT BOOKS:

1. Richard I. Levin, David S. Rubin, Statistics for Management, 7th Edition, Pearson Education,,2011.
2. Aczel A.D. and Sounderpandian J., “Complete Business Statistics”, 6th Edition, Tata McGraw –Hill Publishing Company Ltd., New Delhi, 2011.

REFERENCE BOOKS:

1. Srivatsava TN and ShailajaRego, Statistics for Management, 3rd Edition, Tata McGraw Hill,2016.
2. Anderson D.R., Sweeney D.J. and Williams T.A., Statistics for business and economics, 11th Edition, Thomson (South – Western) Asia, Singapore, 2012.
3. Ken Black, Business Statistics for contemporary decision making, 5th Edition, Wiley India Edition, 2011.

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1103	ORGANIZATIONAL BEHAVIOUR	3	0	0	3

LEARNING OUTCOMES

CO-1 Describe and explain the basic organizational behavior theories and principles, and analyze their influences in the workplace.

CO-2 Analyze and explain individual human behavior in the workplace and the factors that influence them.

CO-3 Describe the factors that influence group behavior such as group cohesiveness, communication, conflict, leadership, power and politics.

CO-4 Portray how Organizational Culture, Climate, Change & Development can have influence on organizational effectiveness.

CO-5 Analyze a given situation and identify causes for the situation and recommend alternate courses of action.

UNIT -1 INTRODUCTION

5

Definition - need and importance of organizational behaviour – Nature and Scope – Workforce Diversity and its impacts– Contributing disciplines to OB - Organizational behaviour models – Framework.

UNIT – 2 INDIVIDUAL BEHAVIOUR (1)

8

Individual Behaviour – Individual Similarities and Differences - Personality – Types – Factors influencing personality – Personality Development – Theories of Personality- Emotions - Emotional Intelligence – Theories- Perceptions – Importance –Process of Perception - Factors influencing perception – Attribution Theory & Applications.

UNIT – 3 INDIVIDUAL BEHAVIOUR (2)

10

Learning – Types of learners – The learning process – Learning theories – Misbehaviour and Organizational behaviour modification - Types – Management Intervention - Attitudes – Characteristics – Components – Formation – Measurement – Values-Job satisfaction – Determinants – Measurements – Influence on behaviour - Motivation – Importance – Theories of Motivation – Applications of Motivation – Effects on work behaviour

UNIT – 4 GROUP BEHAVIOUR**10**

Group structure – Formation – Groups in organizations – Influence – Group dynamics – Group decision making techniques - Team building – Conflicts – Levels of Conflicts – Resolving Conflicts – Conflict Management Styles - Meaning – Importance – Leadership styles – Theories – Leaders Vs Managers - Power - Sources of power – Power and Politics

UNIT – 5 DYNAMICS OF ORGANIZATIONAL BEHAVIOUR**9**

Organizational culture and climate – Factors affecting Organizational Climate – Importance - Organizational Change – Importance – Stability Vs Change – Proactive Vs Reaction Change – The change process – Resistance to Change – Managing Change - Organizational Development – Characteristics – Objectives –Stress – Work Stressors – Prevention and Management of Stress.

TOTAL SESSIONS: 42**TEXT BOOK:**

Aswathappa. K, Organizational Behaviour, 12th Edition, Himalaya Publishing House, 2016.

REFERENCE BOOKS:

1. Stephen P. Robins, Organisational Behavior, 17th Edition, PHI Learning / Pearson Education, (Global edition) , 2016.
2. Fred Luthans, Organisational Behavior, 12th Edition, McGraw Hill, 2014.
3. Udai Pareek, Understanding Organisational Behaviour, 3rd Edition, Oxford Higher Education, 2011.
4. Margie Parikh, Rajen Gupta, Organizational Behaviour, 1st Edition, McGraw Hill, 2010

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1104	ACCOUNTING FOR MANAGEMENT	4	1	0	4

LEARNING OUTCOMES

CO-1 To identify financial transactions, journalize them, draw up a trial balance and prepare final accounts

CO-2 To read, analyze, interpret, and evaluate the financial performance of companies using financial tools such as ratio analysis, funds flow and cash flow analyses

CO-3 To compare and evaluate the performance of companies

CO-4 To be able to interpret cost accounting statement and apply various methods of costing

CO-5 To be able to analyze and evaluate information for cost ascertainment, planning, control and decision making

CO-6 To be able to solve cases and extract relevant information in the above areas

CO-7 To be able to prepare financial planning statements and their usage in strategic decision making and control

UNIT -1 FUNDAMENTAL PRINCIPLES OF ACCOUNTING (10+3)

Meaning and definition – Types of Accounting – Accounting Principles – Concepts and Conventions – Double Entry System – Journal – Ledger – Trial Balance – Final Accounts – Trading and Profit and Loss Account – Balance Sheet – Closing & Adjustments entries – Examples

UNIT – 2 JOINT STOCK COMPANIES (12+3)

Meaning and Definitions – Types of Companies – Formation or incorporation of company – Share Capital – Final Accounts of Companies – Profit or loss prior to incorporation – Procedures for calculating profit prior to incorporation – Examples

Ind AS1 – important disclosure norms

UNIT -3 FINANCIAL PERFORMANCE ANALYSIS (14+3)

Uses, scope and limitations of financial statement analysis – Precautions in comparison – Comparative analysis – Common Size analysis – Trend analysis

Ratio Analysis – meaning and definitions – objectives – Merits and Demerits – Classification of Ratios

Fund flow - Meaning and definition – Objectives – Advantages – Limitations – Statement of changes in Working Capital - Procedure for preparing Fund Flow Statement

Cash flow - Meaning and definition – Cash from Operation, Investment and Financing Activities - – Objectives – Advantages – Limitations – Procedure for preparing Cash Flow statement (AS-3).

UNIT -4 COST AND MANAGEMENT ACCOUNTING (12+3)

Definitions – Objectives – Advantages and Limitations of Cost Accounting – Classification of Costs; Cost Unit, Cost Centres – Cost Sheet Preparation – Manufacturing Cost Statement – Single or output costing – Job Costing , Batch Costing –Contract Costing – Target costing

Process Costing – Meaning and Definitions – difference between process costing and job costing – preparing process costing – Treatment of Normal Loss, Abnormal Loss and Abnormal Gain – Treatment of Stock in the process accounts – Introduction to Activity Based costing and advantages with examples

Marginal costing - Meaning and Definitions – Characteristics – Assumptions – Advantages – Limitations – BEP Analysis – BEP Charts – CVP Application in decision making

Standard Costing and Variance analysis – Meaning and definition - Standard costing and budgetary control – Variance Analysis – Material Cost Variance – Labour Cost Variance – Overhead Cost Variance – Fixed Cost Variance – Sales Variance – Margin variances

UNIT- 5 FINANCIAL PLANNING AND CONTROL (8+2)

Meaning of Budget – Characteristics – Essentials of Budget – Advantages and Limitations – Classification of Budgets – Budget Preparation Process – Forecasting Methods - Performance Budget -Zero Based budgets -Budgetary Controls

TOTAL SESSIONS: 70

TEXT BOOKS:

1. Ashish K. Bhattacharya, Financial Accounting for Business Managers, 5th Edition, Prentice-Hall of India Pvt. Ltd., 2006
2. T.S.Reddy&Y.Hariprasad Reddy, Financial Accounting & Management Accounting, 4th Edition, Margham Publications, 2008

3. R. Narayanaswamy, Financial Accounting- A Managerial Perspective, 5th Edition, Prentice-Hall of India Pvt. Ltd., 2002

REFERENCE BOOKS:

1. Robert N. Anthony, David F. Hawkins, Kenneth A. Merchant, Accounting Text & Cases, 13th Edition, Tata McGraw Hill Publishing Co. Ltd. , 2003

2. Horngren, Sundem, Elliott, Introduction to Financial Accounting, 11th Edition, Pearson Education, 2005

3. Ambrish Gupta, Financial Accounting for Management, 5th Edition, Pearson Education, 2005

4. Needles, Powers and Crosson, Financial and Managerial Accounting, 9th Edition Cengage Learning, 2015

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1105	LEGAL ASPECTS OF BUSINESS	3	0	0	3

LEARNING OUTCOMES

CO-1 Familiarity with the laws that have an influence on business

CO-2 An appreciation of the spirit behind the various laws that influence business

CO-3 A basic understanding of what can be done and what cannot be done within the legal framework.

UNIT -1 LAW OF CONTRACTS

12

A. General Principles of Law of Contracts:

Introduction – Definition of contract - Formation of contract –Essential elements – offer, acceptance, consideration, capacity, free consent and legality of the object - Void contracts -

Performance of contracts – offer to perform - contracts which need not be performed, performance by whom, demand of performance by whom, time and place of performance – Breach of contract and its remedies

B. Special contracts:

1. Bailment - pledge, lien, indemnity and guarantee

2. Sale of Goods - Types and formation contract of sale - conditions and warranties - transfer of property - performance of sales contracts - rights of an unpaid seller - auction sales

3. Contract of Agency – Nature of agency – Creation and types of agents - Rights and duties of Principal and Agent – termination – of - agency.

4. Negotiable instruments Act 1881 - Nature and requisites of negotiable instruments - Types of negotiable instruments - liability of parties. Defects in negotiable instruments - holder in due course - special rules for cheques and drafts - discharge of negotiable instruments

UNIT-2 CONSUMER PROTECTION ACT AND INTRODUCTION OF CYBER LAWS

8

Consumer Protection Act–Definition of a consumer - Consumer Rights - Unfair trade practices - Consumer dispute redressal agencies - Competition Act 2002– Introduction, Definitions, prohibition of certain agreements, abuse of dominant position and regulation of combinations - Competition Commission of India – Duties, powers and functions - IT Act–

Digital signature - recognition of electronic documents - formation of contracts - data protection, offences and penalty - Introduction to IPR– Copyrights, Trademarks, Patent Act.

UNIT-3 OTHER MISCELLANEOUS LAWS

2

Payment of Wages – what is wage, rules for payment of wages, deductions from wages. Employees Provident Fund – application, basic wages employee, EPF Scheme, Employees pension Scheme. Gratuity- scope of coverage, payment, forfeiture and exemptions.FEMA – regulation and management of foreign exchange, directorate of enforcement and its powers.

Business and fundamental rights under the Constitution [Art. 12, 14, 19(1)(g)]

UNIT-4 LAWS PERTAINING TO BUSINESS ORGANIZATIONS

12

A.Nature and types of business organizations - Partnership firms, Limited Liability Partnerships.

B.Partnership - Definition, formation, partnerships and other associations, duration, rights and duties of partners to one another, types of partners, reconstitution of partnership.

C.Limited Liability Partnerships – Introduction, Incorporation of LLP, duties, rights and liabilities of partners, partnership v. LLP.

D.Companies Law (Act of 2013): Majorprinciples– Definition of Company, Characteristics, lifting the corporate veil, Company v. Partnership, Kinds of companies.Formation of companies, Memorandum and Articles of Association,Prospectus, Directors -appointment, powers, duties and liabilities, Corporate Governance

E.Corporate insolvency and resolution under IBC – Definition of corporate person, corporate debtor, debt, default, insolvency professional, financial and operational creditors. Insolvency resolution process – who can file an application, admission, moratorium and public announcement, appointment of insolvency professional (IP), Powers and duties of IP, members and meeting of committee of creditors, submission of resolution plan, order by NCLT.

UNIT-5 BUSINESS TAXATION

8

Income Tax- Assessment year, previous year, assessee, residential status, business, capital assets, company, dividend, scope of income, manufacturing, person, profits and gains from business – an overview of allowable expenses, allowances, exemptions and deductions from profits and gains from Business, Tax avoidance and evasion versus tax planning.

GST- Introduction, unique features, taxable event, classification, valuation, input tax credit.

TOTAL SESSIONS: 42

REFERENCE BOOKS:

1.Kapoor,N.D., Elements of Mercantile Law,30th Edition,Sultan Chand & Sons,New Delhi,2015

2.P.K.Goel,Business Law for Managers,Indian Text Edition, Biztantara Publishers, India, 2008.

3.AkhilshwarPathack,Legal Aspects of Business, 4thEdition, TataMcGrawHill,2009.

4.P.P. S. Gogna, Mercantile Law,11thEdition,S.Chand&Co.Ltd., India,2015

5.Maheshwari,S.N. and S.K.Maheshwari,A Manual of Business Law,6th Edition,Himalaya Publishing House, 2015.

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1106	PRINCIPLES OF MANAGEMENT	2	0	0	2

LEARNING OUTCOMES

CO-1 Demonstrate the basic concepts of management and its theories.

CO-2 Describe the functions of management and roles of managers.

CO-3 Describe how the managerial tasks of planning, organizing, directing and controlling can be executed in a variety of circumstances.

CO-4 Appreciate the use of qualitative and quantitative information to formulate best control methods.

UNIT -1 INTRODUCTION

6

Introduction to Management - Nature and Significance of Management – Science or Art - Managerial roles - Mintzberg - An overview of functional areas of Management – Levels – Process - Managerial skill - Evolution of Management Thought - Classical School of Thought (Contributions of Taylor and Fayol) – Neo-classical School – Human Relations Approach (Hawthorne Experiments) and Behavioural Science Approach (brief outline) – Modern Management Theory - Quantitative Approach, Systems Approach and Contingency Approach.

UNIT -2 PLANNING

6

Nature and Purpose – Steps in Planning process – Vision – Mission – Objectives – Managing by Objective (MBO) - Strategies, Policies and Procedures – Forecasting - Planning Tools and Techniques –Decision Making - Decision Making steps and process – Types of Decision Making –Decision Making Styles – Group Decision Making and its techniques.

UNIT -3 ORGANIZING

6

Nature and purpose – Formal and Informal organization – Organization Chart – Organization Structure – Types – Line and Staff authority – Project & Matrix Structure –Committees - Centralization & Decentralization - Departmentalization – Delegation of authority –Span of Control – Factors affecting span - Cases

UNIT -4 STAFFING & DIRECTING

5

Staffing – Selection and Recruitment – Career development – Training – Performance Appraisal.

Directing – Meaning – Definition – Principles of Directing – Nature & Importance of Directing – Communication – Process of Communication – Barrier in Communication – Effective Communication.

UNIT -5 CONTROLLING

5

Process of Controlling – Types of Control - Budgetary and Non-budgetary control techniques –Purchase control - Process control – Cost control - Quality control& tools – Inventory control.

TOTAL SESSIONS: 28

TEXT BOOKS:

1. Andrew J. Dubrin, Essentials of Management, 9th Edition, Thomson Southwestern,2012.
2. Tripathi,P.C&Reddy,P.N, Principles or Management, 5th Edition, Tata McGraw Hill, 2010.

REFERENCE BOOKS:

1. Harold Koontz, and Heinz Weihrich, Essentials of Management, An International and Leadership Perspective, 9th Edition, McGraw Hill, 2013.
2. Charles W.L Hill and Steven L McShane, ‘Principles of Management,Special Indian Edition, McGraw Hill Education, 2007.
3. Samuel C. Certo and TervisCerto, Modern management: concepts and skills, 12th Edition, Pearson education, 2012.

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1115	MANAGERIAL COMMUNICATIONS I	0	0	2	2

AN ILLUSTRATIVE LIST OF AREAS:

Introduction to Business Communication – process, barriers

Non-verbal communication

Grammar

Active Listening

Oral communication – Structuring and delivering a talk

Articulation

Inter-personal communication

Active Reading skills – speed reading

Comprehension – written and spoken

Presentation skills

Vocabulary – Introduction to etymology – business jargon

Good writing – basic grammar

Business letters and reports

Email etiquette

Summarizing and paraphrasing

Group Discussion

Debating

Effective telephone conversation

Celebrity introduction

Cross-cultural communication

Content writing

Conducting meetings

Interviewing skills

TOTAL SESSIONS: 28

SUGGESTED REFERENCES:

1. Bovee, Thill&Schatzman, Business Communication Today, 13th edition ,Pearson
2. NageshwarRao and Rajendra Das, Business skills, HPH
3. Lesikar, R.V. &Flatley, M.E. Basic Business Communication – Connecting in a digital world, 13thEdition, McGraw Hill Publishing Company Ltd.
4. John Seely, Oxford Guide to Effective Writing and Speaking, 3rd edition, Oxford Publishing.
5. M Ashraf Rizvi, Effective Technical Communication, 2ndEdition, TMH.
6. Meenakshi Raman and Sangeeta Sharma, Technical Communication, 3rdEdition, Oxford Publishing.

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1111	DATA ANALYSIS I	0	0	2	2

LEARNING OUTCOMES

CO-1 Understand key concepts in the field of Business Intelligence and its important role in helping businesses achieve their goals

CO-2 Be more productive and creative in their use of Excel for business data analysis and reporting

CO-3 Use powerful excel functions like Lookup functions and others to undertake more dynamic calculations and analysis; as well as use Text functions to manipulate data into desired formats

CO-4 Employ Goal Seek and Scenario Manager to conduct sensitivity analysis and solve practical business problems

CO-5 Utilize Pivot tables and slicers to conduct more effective data manipulation and analysis

CO-6 Create effective charts and dashboards in Excel for improved data visualization, Import data using Power Pivot

CO-7 Design and develop model to enhance decision making process

UNIT -1 OVERVIEW OF THE BASICS OF EXCEL

2

Understanding Excel files, Ribbon and shortcuts - Protecting and un-protecting worksheets and cells - Excel Versions - Entering data using Autofill (Number Series) - Creating your own custom list - Cell referencing (Relative, Absolute and Mixed) - Named ranges - Using merger and centre - Text Wrapping

UNIT -2WORKING WITH FUNCTIONS

5

Basic Excel Functions(Sum, Max, Min, Count, Average) - Logical Functions (AND, OR, NOT) - Writing conditional expressions (using IF) - Nesting: Combining simple functions to create complex functions - Calculation of CAGR - Aggregation / Power Functions (CountIF, CountIFS, SumIF, SumIFS, AverageIF, AverageIFS, OFFSET, INDIRECT), Filtering IFS Functions by a Variable Value - Using lookup and reference functions (VLOOKUP, HLOOKUP, MATCH, INDEX, LOOKUP) - VlookUP with Exact Match, Approximate Match - Using VLookUP to consolidate Data from Multiple Sheets - Date and time functions

- Text functions - CHOOSE Function - Database functions (Daverage, Dcount, Dcounta, Dget, Dmax, Dmin, Dproduct, Dstdev) - Formula Error, Array formula –Simple finance functions.

UNIT -3 DATA VALIDATIONS **2**

Specifying a valid range of values for a cell - Specifying a list of valid values for a cell - Specifying custom validations based on formula for a cell.

UNIT -4 SORTING AND FILTERING DATA **3**

Sorting tables - Using multiple-level sorting - Using custom sorting - Filtering data for selected view (AutoFilter) & Removing Duplicates - Using advanced filter options – Sparklines

UNIT -5 WHAT IF ANALYSIS **3**

Goal Seek - Data Tables - Scenario Manager - Sensitivity analysis

UNIT -6 FORMATTING **3**

Using auto formatting option for worksheets - Using conditional formatting option for rows, columns and cells - Rows to repeat at the top etc., gridlines

UNIT -7 WORKING WITH REPORTS **5**

Creating subtotals - Multiple-level subtotals - Creating Pivot tables - Formatting and customizing Pivot tables - Consolidating data from multiple sheets and files using Pivot tables - Consolidating multiple sets of data into single workbook - Show Value As (% of Row, % of Column, Running Total, Compare with Specific Field) - Viewing Subtotal under Pivot - Creating Slicers – Using Pivot Tables and Slicers to describe data

UNIT -8 CHARTS **5**

Using Charts - Formatting Charts - Data Visualization – Power BI, Power Query

TOTAL SESSIONS: 28

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1201	MARKETING MANAGEMENT	4	0	0	4

LEARNING OUTCOMES

CO-1 Demonstrate a familiarity and understanding of principles and concepts in management.

CO-2 Demonstrate knowledge of contemporary issues that have an impact on the business and industry.

CO-3 Apply the relevant knowledge gained to read situations, analyze and solve tactical business problems.

CO-4 Ability to communicate effectively, to achieve organizational and individual goals.

CO-5 Work in teams of diverse people to meet organizational goals.

CO-6 Demonstrate leadership skills appropriate for managerial roles in organizations.

CO-7 Identify and appreciate the ethical issues in management decision area.

CO-8 Ability to pursue lifelong learning.

UNIT 1

8

Marketing- Evolution and Meaning in the contemporary context - Challenges and Opportunities- Role of Marketing in the organizational processes and effectiveness - Value creation- Meaning and Purpose - Product types - Marketing to consumers, Business/ Institutions, Government - Services Marketing- Reorientation of organisations with customer centricity.

UNIT 2

8

Marketing Plan- Strategic Inputs- Planning Process- Environmental scanning- Internal and External Consistencies- Growth avenues with leverage on marketing- Insight into strategic planning Processes

UNIT3 **8**

Understanding of Buyer Behaviour and decision making processes in Consumer& Industrial products and Services- Markets, Structure and Analysis of Competition and Managerial actions.

UNIT 4 **8**

Segmentation- targeting- Positioning- Marketing Mix – Product and Brand management.

UNIT 5 **8**

Pricing options, methods - evaluation- Distribution channel systems - design and control - Franchising and Retailing.

UNIT 6 **8**

Mass communication and Sales Promotion - Public relations - Enhancing marketing efficiency in Digital environment- Personal selling – Stages in selling cycle- sales force efficiency enhancement.

UNIT 7 **8**

Marketing Research and Information Systems - Customer relationship management processes - Ethical Issues in Marketing - Emerging Issues in marketing - Global Markets and marketing.

TOTAL SESSIONS: 56

TEXT Book:

Philip Kotler and Kevin Keller, Marketing Management,15th edition, PHI, 2016

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1202	HUMAN RESOURCE MANAGEMENT	3	0	0	3

LEARNING OUTCOMES

CO-1 Discuss and describe the various functions of a Human Resource Manager including staffing and selection, training and development, performance appraisal, compensation and Career Mgt.

CO-2 Apply human resource management concepts across a variety of contexts, situations and incidents to draw up suitable plans for various HR functions for a given situation.

CO-3 Identify and evaluate the HR practices in a company in the context of its culture and business environment.

UNIT -1 INTRODUCTION AND PERSPECTIVES OF HUMAN RESOURCE MANAGEMENT

5

Introduction - Concept of Human Resource Management - Nature and Importance of HRM - Scope of Human Resource Management - History and Evolution of Human Resource Management - Functions of Human Resource Management - Role of HR Executives - Human Resource Policies – HRIS - Human Resource Accounting and Audit.

UNIT -2 THE CONCEPT OF BEST FIT EMPLOYEE

8

Job Analysis and Design - Concept of Job Analysis - Process of Job Analysis - Methods of Job Analysis - Concept of Job Design - Importance of Human Resource Planning - Process of Human Resource Planning - Need for Human Resource Planning - Forecasting human resource requirement - HR Forecasting Techniques - Concept of Recruitment - Factors Affecting Recruitment - Sources of Recruitment - Recruitment Policy – Selection - Selection Process - Selection Test – Interviews – Evaluation – Placement - Induction and Socialization.

UNIT -3 TRAINING AND EXECUTIVE DEVELOPMENT

9

Meaning of Training - Areas of Training - Types of training – purpose – benefits - Methods of Training - Concept of Management – Development - Management Development Methods - Differences between Training and Development - Evaluation of Training.

UNIT -4 SUSTAINING EMPLOYEE INTEREST

11

Concept of Job Evaluation, Objectives – Techniques - Advantages and Limitations - Introduction to Competency management - Compensation Management - Wage and Salary Administration - Managing Wages - Concept of Rewards and Incentives - Managing Benefits in Organizations - Concept of Employee Welfare - Welfare Measures- Types - Employee Career Planning and Growth - Concept of Employee Growth - Managing Career Planning - Elements of a Career Planning Programme - Succession Planning - Concept of job Change – Promotion – Demotion - Transfer and Separation - Implications of job change.

UNIT -5 PERFORMANCE EVALUATION, EMPLOYEE DISCIPLINE AND GRIEVANCE

9

Performance Appraisal - Overview of Performance Appraisal - Concept and Need for Performance Appraisal - Types of Appraisal Methods – Benefits – Feedback - Industry practices - Meaning and Objectives of Discipline.

Grievance and Grievance Procedure - Concept of Grievance - Causes of Grievances - Forms and Effects of Grievance - Grievance Handling Procedure - Need for Grievance Redressal Procedure.

TOTAL SESSIONS: 42

TEXT BOOK:

VSP RAO, Human Resource Management, 3rd Edition, Excel Books, 2010.

REFERENCE BOOKS:

1. Dessler, Human Resource Management, 14th Edition, Pearson Education Limited,, 2015.
2. Decenzo and Robbins, Fundamentals of Human Resource Management, 11th Edition Wiley, 2013.
3. PravinDurai, Human Resource Management, 2nd Edition, Pearson, 2016
4. Aswathappa K, Human Resource Management, 7th Edition, McGraw Hill, 2010

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1203	FINANCIAL MANAGEMENT	3	0	0	3

LEARNING OUTCOMES

CO – 1 Understand the role and functions of finance in organisations and apply them in the appropriate context

CO – 2 Understand the importance of time value of money, valuation of financial assets and apply them from the investment point of view.

CO – 3 Understand the various types of risks, measurement of risks and ability to analyze them from the context of financial assets

CO – 4 Able to analyse and determine optimum cost of capital and analyse capital investment decisions of projects based on capital budgeting techniques

CO – 5 Able to assess working capital needs and effective management of current assets and financing decisions

UNIT -1INTRODUCTION TO FINANCIAL MANAGEMENT 8

Interface between Finance and Other Functions – Financial decisions in an organisation - Interface between goal of the firm, responsibility of finance manager and financial system - Profit Maximization versus Shareholder Wealth Maximization – Agency Problem – Risk – Return trade off.

Indian Financial System - Functions of Financial System - markets, features and participants – Financial Markets – Financial Intermediaries – Financial Instruments - Regulatory infrastructure

UNIT -2 TIME VALUE OF MONEY 9

Concept of Time Lines –Determinants of time value of money - Mechanics of compounding and Discounting – Future Value of a single amount – Future value of an annuity – Present

Value of a single amount – Present Value of an annuity – Calculation of the annual percentage yield - effective rate of interest - nominal interest rate.

Valuation of Financial Securities – Valuation Concept from Investment point of view - Bond Valuation – Bond Yields – Bond Market - Preference Stock Valuation – Yield calculation
Equity Valuation – Dividend capitalization Model – Growth versus Constant Dividend – Earnings capitalization model – Determinants of Price Earnings – PE ratio.

UNIT -3 RISK AND RETURN AND LEVERAGES 7

Historical Returns and Risk – Expected Return – Types of Risks – Single Asset Risk – Risk and Return of portfolio – Measurement of Market Risk – Beta Determinants – Capital Asset Pricing Model

Analysis and Impact of Leverage (Business and Financial Risk) - Understanding the difference between business risk and financial risk - Usage of break-even analysis in a variety of analytical settings - Operating leverage, financial leverage, and combined leverage – Implications of leverages

UNIT –4 CAPITAL BUDGETING 9

Capital Budgeting Process – Project Classification – Elements of Cash Flow stream – Basic principles of cash flow estimation - Investment Criteria - Techniques of Capital Budgeting – Discounted Cash Flow Methods versus Non Discounted Cash Flow Methods - Net Present Value – Benefit Cost Ratio – Internal Rate of Return – Modified Internal Rate of Return – Payback Period – Accounting Rate of Return

UNIT -5 WORKING CAPITAL MANAGEMENT 9

Working Capital Policy– Objective of Working Capital Management - Static and Dynamic view of Working Capital - Determinants of working capital - Characteristics of Current Assets – Level of Current Assets - Factors Affecting Composition of Working Capital – Approaches to working capital and finance - Criteria for Evaluation of Working Capital Management - Financing Current Assets - Sources of Finance - Trade Credit, Short-term bank finance, PDs, CPs and Factoring - Management of Current Assets

- **Inventories** - Role of Inventories in Working Capital, Cost of carrying inventories, Inventories planning and tools and techniques
- **Receivables** – Purpose and cost of Maintaining Receivables, Impact of Credit Policy and Process of Credit Evaluation - Monitoring Receivables - Tools and techniques.
- **Cash** - Difference between profits and cash, Factors affecting cash management and Internal Treasury Controls - Tools and techniques of determining optimum cash

TOTAL SESSIONS: 42

TEXT BOOKS:

1. J. Van Horne and John M. WachowiczJr, Fundamentals of Financial Management, 13th Edition, Pearson, 2008
2. Prasanna Chandra , Fundamentals of Financial Management, 5th Edition, McGraw Hill, 2012

REFERENCE BOOKS:

1. Prasanna Chandra, Financial Management – Theory and Practice, 9th Edition, McGraw Hill, 2017
2. Rajiv Srivastava and Anil Misra, Financial Management, 2nd Edition, Oxford University Press, 2012
3. M.Y. Khan and P.K. Jain, Financial Management – Text, Problems, cases, 6th Edition, McGraw Hill, 2014
4. I.M. Pandey, Financial Management, 10th Edition, Vikas Publishing House, 2010

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1204	OPERATIONS MANAGEMENT	3	0	0	3

LEARNING OUTCOMES

CO-1 Critical understanding of an integrated and structured approach to planning and decision-making for a competitive advantage through operational excellence.

CO-2 Appreciation of the role of Operations Management functions, recognise its interfaces with other functional areas and with its external environment.

CO-3 Basic knowledge of problem solving techniques in the field of operations management.

CO-4 Apply appropriate management tools in the design, operation and improvement in the creation of a firm's products and services.

UNIT -1 INTRODUCTION TO OPERATIONS MANAGEMENT 6

Operations Management – Nature, Importance - Differences between services and goods - System Perspective – Functions – Challenges -Current Priorities -Recent Trends - Operations Strategy – Strategic Fit –Framework - Measures for Operational Excellence - World-Class Manufacturing Principles & Practices

UNIT -2 DESIGNING OPERATIONS 9

Facility Location – Theories - Steps in Selection - Location Models - Capacity Planning – Long range – Types - Developing capacity alternatives - Process – Planning – Selection – Strategy - Major Decisions - Facility Layout – Principles – Types - Planning tools and techniques - Design of Service Systems - Personnel scheduling in Services - Product Design – Influencing factors – Approaches – Stages – Legal - Ethical and Environmental issues - Project Management – Scheduling Techniques – PERT - CPM

UNIT -3 PLANNING AND CONTROL OF OPERATIONS 9

Demand Forecasting – Need, Types, Objectives and Steps - Overview of Qualitative and Quantitative methods - Overview of Sales and Operations Planning - Master Production Schedule – MRP - MRP II and ERP - Resource Planning CRP and DRP - Scheduling - work

centres – nature, importance - Priority rules and techniques - Shop floor control - Flow shop scheduling - Johnson’s Algorithm – Gantt charts

UNIT -4 SOURCING AND SUPPLY MANAGEMENT 9

Supply Chain Management - Purchasing – Objectives – Functions – Policies - Sourcing & Supply Management - Vendor rating and Value Analysis - Make or Buy Decisions - E-Procurement - Inventory – Objectives, Costs and control techniques - Selective Control - Overview of JIT - Lean Management.

UNIT -5 FUNDAMENTALS OF QUALITY MANAGEMENT 9

Concept of Quality – Definition – Gurus - TQM Concepts – QFD - Quality Costs - Quality Management Tools - Design of Quality Assurance Systems - Introduction of ISO Standards - Statistical Process Control - OC Curve – AQL - Process Capability - Six Sigma

TOTAL SESSIONS: 42

TEXT BOOK:

Mahadevan B, “Operations Management -Theory and Practice”,3rd Edition, Pearson Education, 2018.

REFERENCE BOOKS:

1. Norman Gaither and Gregory Frazier, Operations Management, 9th Edition ,South Western Cengage Learning, 2002
2. Richard B. Chase, Ravi Shankar, Robert Jacobs ; Operations & Supply Chain Management, 14th Edition, McGraw Hill (Special Indian), 2017

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1205	BUSINESS RESEARCH METHODS	3	0	0	3

LEARNING OUTCOMES

CO-1 To demonstrate a basic understanding of various aspects of business research methodologies.

CO-2 To describe the research process to solve business problem.

CO-3 Carry out literature review that synthesizes and evaluates literature in a specific topic area

CO-4 To identify appropriate techniques associated with qualitative and quantitative business methodologies.

CO-5 To design a research activity for a given business situation

CO-6 To design and develop a business research report and to learn how to communicate the results and acknowledge the ethical implications of the research.

UNIT -1 INTRODUCTION

9

Business Research – Definition and Significance – Characteristics of good research - Types of Research –Exploratory and causal Research – Theoretical and empirical Research – Cross –Sectional and time – series Research – the research process – Research questions / Problems – Research objectives – Literature review – theoretical framework – components of theory- Research hypotheses –Types of hypothesis - Variables in Research.

UNIT-2 RESEARCH DESIGN

9

Research design – Definition – Types of research design – exploratory and causal research design – Descriptive and experimental design – different types of experimental design – Validity of findings – internal and external validity – Measurement and scaling – Attitude measurement - Different scales – Construction of scales – Validity and Reliability of instrument.

UNIT-3 DATA COLLECTION

9

Types of data – Primary Vs Secondary data – Methods of primary data collection – Focus group – Depth interview – Projective Technique - Survey Vs Observation – Methods of

Secondary data – Construction of questionnaire and instrument – Sampling plan – Sample size – determinants optimal sample size – sampling techniques – Probability Vs Non-probability sampling methods.

UNIT-4 DATA PREPARATION & ANALYSIS

9

Data Preparation – editing – Coding –Data entry – Validity of data –Data Analysis – Descriptive Statistics – Univariate Analysis - Testing of Hypothesis : Procedure for Hypothesis testing- Bivariate Analysis – Test of differences and Means of Association - chi square test- ANOVA, Large and small samples (Single Mean, Difference of Means, and Paired Data) –Multivariate Analysis – Factor analysis – Discriminantanalysis – cluster analysis – multiple regression and correlation – multidimensional scaling –Application of statistical software for data analysis.

UNIT-5 REPORT DESIGN, WRITING AND ETHICS IN BUSINESS RESEARCH

6

Research report – Different types - need of executive summary –chapterization – contents of chapter – report writing– Format of a research report – Pictures & Graphs – Interpretation – Oral presentation - Ethics in research – Subjectivity and objectivity in research.

TOTAL SESSIONS: 42

TEXT BOOKS:

1. Donald R. Cooper, Pamela S. Schindler and J K Sharma, Business Research methods, 11th Edition, Tata McGraw Hill, New Delhi, 2012.
2. Uma Sekaran and Roger Bougie, Research methods for Business, 6th Edition, Wiley India, New Delhi, 2012.

REFERENCE BOOKS:

1. Malhotra Naresh K, Marketing Research: Applied Orientation, 6th Edition, Pearson Pub, New Delhi, 2007
2. R. Paneerselvam, Research Methodolog”, 2nd Edition, Prentice Hall of India, New Delhi, 2010.
3. T.N. Srivastava & Shailaja Rego, Business Research Methodology, 2nd Edition, Tata McGraw Hill, 2010
4. William G Zikmund et al Business Research Methods – A south-Asian perspective, 8th Edition, Cengage Learning India Pvt. Ltd., 2012.
5. Naval Bajpai, Business Research Methods, Pearson, 2011.

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1206	BUSINESS INFORMATION SYSTEMS	3	0	0	3

LEARNING OUTCOMES

CO-1 Describe and distinguish the various types of business information systems and their roles in running a business organization.

CO-2 Describe the fundamental concepts of database and design simple database using E-R diagram and normalization concepts.

CO-3 Describe and apply various methodologies, tools and techniques to analyze and design business information systems.

CO-4 Describe business intelligence tools, techniques and its applications.

CO-5 Describe the new information technologies available to businesses today and its applications.

CO-6 Demonstrate an awareness of ethical issues related to usage of IS.

CO-7 Plan and undertake a group project, prepare and deliver structured verbal and written report.

UNIT -1 INTRODUCTION TO INFORMATION SYSTEMS

8

Information System - Define - Differentiate Data, Information and Knowledge - Role of Information Systems - Information Technology - Business Processes- Digitalization – Strategic Information Systems - IS and Competitive Advantage - Types of IS - Transaction Processing Systems - Management Information Systems- Decision Support Systems - Executive Support System - Enterprise Resource Planning.

UNIT -2 DATABASE AND KNOWLEDGE MANAGEMENT

10

Database Fundamentals - Traditional File Approach– DBMS - RDBMS- Designing Databases – Normalization - ER Diagram–SQL Query - Big Data - Data Warehouses and

Data Mart. - Knowledge Management - Concept and Definition - Knowledge Management Value Chain - Types of Knowledge Management Systems - Intelligent Techniques.

UNIT -3 BUSINESS INTELLIGENCE 8

Types of Decisions - Decision Making Process - Decision Support Systems - Business Intelligence –OLAP - Data Mining - Techniques.

UNIT -4 DEVELOPING INFORMATION SYSTEMS 8

System Development Process (SDLC) -System Development Methodologies –CASE tools - Data flow diagram - Object-Oriented Systems Analysis and Design - Use Case Modeling.

UNIT -5 NEW IT TRENDS AND IS SECURITY 8

Cloud Computing – Social Computing – Mobile Computing – Pervasive Computing – Block chain Technology - Ethics in IT - Securing Information Systems – Vulnerabilities - Computer Crimes - Controls - Tools and Technologies for protecting IS

TOTAL SESSIONS: 42

TEXT BOOKS:

1. Kelly Rainer, Brad Prince and Hugh Watson, Management Information Systems, 4th Edition, Wiley India, 2016
2. Kenneth C. Laudon, and Jane P. Laudon, Management Information Systems: Managing the digital firm, 15th Edition, Pearson Publication, 2018

REFERENCE BOOKS:

1. Kenneth E. Kendal and Julie E. Kendall, Systems Analysis and Design, 9th Edition, Pearson Publication, 2014
2. Ralph M.Stair and George W. Reynolds, Fundamentals of Information Systems, 9th Edition, Cengage Learning, New York, 2018
3. Keri E. Pearlson, Carol S. Saunders and Dennis F. Galletta, Managing and Using Information Systems: A Strategic Approach, 6th Edition, John Wiley & Sons, 2016
4. Ellen F. Monk, Joseph A. Brady, and Emilio I. Mendelsohn, Problem- Solving Cases in Microsoft Access & Excel,15th Edition, Cengage Learning, 2017
5. Sharda Ramesh, DelenDursun and Turban Efraim, Business Intelligence: A Managerial Perspective on Analytics, 3rd Edition, Pearson, 2017

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1207	APPLIED OPERATIONS RESEARCH	3	0	1	4

LEARNING OUTCOMES

CO-1 Define and explain the various concepts and techniques of operations research and their applicability to business situations.

CO-2 Translate a real-world problem, given in words, into a mathematical formulation.

CO-3 Use the relevant mathematical model(s) to make optimal decisions under conditions of certainty, risk and uncertainty

CO-4 Use appropriate software tools to solve problems in operations research and interpret the results to aid decision making under various operational constraints in an organization

UNIT -1 INTRODUCTION TO OPERATIONS RESEARCH AND LINEAR PROGRAMMING (10+3)

Introduction to Mathematical Models – Definition – Evolution - Applications of Operations Research in decision making.

Linear Programming –Formulation - Solution by Graphical and Simplex methods - Big M/ Penalty - Special Cases - Principles of Duality- Sensitivity Analysis.

UNIT – 2 LINEAR PROGRAMMING EXTENSIONS (10+3)

Transportation Models (Minimising and Maximising Problems) – Balanced and unbalanced Problems – Initial Basic feasible solution by N-W Corner Rule - Least cost and Vogel’s approximation methods - Check for optimality by MODI method – Degeneracy - Transshipment Models.

Assignment Models (Minimising and Maximising Problems) – Balanced and Unbalanced Problems - Hungarian and Branch and Bound Algorithms - Travelling Salesman problems - Crew Assignment Models.

UNIT– 3 GAME THEORY**(7+3)**

Game Theory-Two person Zero sum games-Saddle point - Dominance Rule - Convex Linear Combination (Averages) - methods of matrices - graphical and LP solutions.

UNIT – 4 SIMULATION AND DECISION THEORY**(7+3)**

Decision making under risk – Decision trees – Decision making under uncertainty- Monte-Carlo simulation

UNIT – 5 QUEUING AND REPLACEMENT MODELS**(7+3)**

Queuing Theory - Single and Multi-channel models – infinite number of customers and infinite calling source.

Replacement Models-Individuals replacement Models (With and without time value of money) – Group Replacement Models.

TOTAL SESSIONS: 56**TEXT BOOK:**

G. Srinivasan, Operations Research – Principles and Applications, 2nd Edition, PHI, 2010

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1215	MANAGERIAL COMMUNICATIONS II	0	0	2	2

AN ILLUSTRATIVE LIST OF AREAS:

Introduction to Business Communication – process, barriers

Non-verbal communication

Grammar

Active Listening

Oral communication – Structuring and delivering a talk

Articulation

Inter-personal communication

Active Reading skills – speed reading

Comprehension – written and spoken

Presentation skills

Vocabulary – Introduction to etymology – business jargon

Good writing – basic grammar

Business letters and reports

Email etiquette

Summarizing and paraphrasing

Group Discussion

Debating

Effective telephone conversation

Celebrity introduction

Cross-cultural communication

Content writing

Conducting meetings

Interviewing skills

TOTAL SESSIONS: 28

SUGGESTED REFERENCES:

1. Bovee, Thill&Schatzman, Business Communication Today, 13th edition ,Pearson
2. NageshwarRao and Rajendra Das, Business skills, HPH
3. Lesikar, R.V. &Flatley, M.E. Basic Business Communication – Connecting in a digital world, 13thEdition, McGraw Hill Publishing Company Ltd.
4. John Seely, Oxford Guide to Effective Writing and Speaking, 3rd edition, Oxford Publishing.
5. M Ashraf Rizvi, Effective Technical Communication, 2ndEdition, TMH.
6. Meenakshi Raman and Sangeeta Sharma, Technical Communication, 3rdEdition, Oxford Publishing.

COURSE CODE	COURSE TITLE	L	T	P	C
PBA1211	DATA ANALYSIS II	0	0	2	2

LEARNING OUTCOMES

CO1: Demonstrate an understanding of basic concepts in Statistics and their applications using SPSS / R

CO2: Formulate and use appropriate models of data analysis to find feasible solution for business-related problems using SPSS / R

CO3: Understand and communicate from the statistical outputs into managerial recommendations using SPSS / R

UNIT -1 DESCRIPTIVE STATISTICS 7

Introduction to SPSS / R- Descriptive Statistic - Creating and editing a data file - Managing Data - Computing New variables - Recoding Variables - Mean, Median, Mode - Variance and Standard Deviation - Maximum, Minimum, Range, Sum - Descriptive Statistic - Normal Distribution - Skewness and Kurtosis - Percentiles and Quartiles - Stem and Leaf and box plot - Creating Graphs.

UNIT – 2 TESTING OF HYPOTHESIS (PARAMETRIC) 7

t-Test - One sample t-test - Two sample t-test - Paired sample t-test -F Test (ANOVA)

UNIT – 3 TESTING OF HYPOTHESIS (NON PARAMETRIC) 7

Chi-square Tests - KS Test -Mann–Whitney U test - Kruskal Wallis test

UNIT – 4 CORRELATION & REGRESSION 7

Correlation and Regression –Bi-variate Correlation - Simple Linear Regression - Multiple Regression.

TOTAL SESSIONS: 28