ANNA UNIVERSITY OF TECHNOLOGY
COIMBATORE

DIRECTORATE OF ONLINE AND DISTANCE EDUCATION

PG DIPLOMA
(Academic Year: 2007-08)

SYLLABUS
WITH CURRICULUM & REGULATIONS
1. PRELIMINARY DEFINITIONS AND NOMENCLATURE

In this Regulation, unless the context otherwise requires:

i) “Programme” means PG Diploma programme.

ii) “Branch” means specialization or discipline of PG Diploma programme.

iii) “Course” means a theory or practical subject that is normally studied.

iv) “University” means ANNA UNIVERSITY OF TECHNOLOGY COIMBATORE.

2. PROGRAMMES OFFERED

1. Animation and Multimedia
2. Bioinformatics
3. Business Administration
4. Business Process Outsourcing
5. Computer Applications
7. Environmental Management
8. Financial Management
9. Foreign Trade
10. Hospital Management
11. Human Resource Management
12. Industrial Safety
13. Information Technology
15. Investment Management
16. Labour Management
17. Marketing Management
18. Materials Management
19. Networking
20. Petroleum Exploration
21. Petroleum Refinery and Petro Chemicals
22. Retail Management
23. Software Project and Quality Management
24. Software Quality Assurance
25. Supply Chain Management
26. Trade Mark and Patent Analysis
27. Transport Management

3. ADMISSION

1. Candidates seeking admission to the PG Diploma Programme should possess the degree from a recognized University.

2. The eligibility criteria shall be prescribed by the Syndicate of the University from time to time.
4. STRUCTURE OF PROGRAMME
1. Every Programme shall have a curriculum comprising of theory and practical courses, and a project work with well defined syllabi.
2. The medium of instruction, examinations and project report shall be in English.

5. DURATION AND PATTERN
A student is normally expected to complete the PG Diploma Programme in one year but in any case not more than 3 years from the admission.

6. INTERACTIVE LEARNING PROGRAMME
1. Interactive Learning Programmes are arranged on Saturdays and Sundays or on Public Holidays. University will arrange Tele Conference / Case Studies in different centres after due notification.
2. Students need to effectively use the ILPs where they can interact with the faculty. The schedule of ILP will be notified in the website. However attending the ILP classes are not mandatory for PG Diploma programmes.

7. SYSTEM OF EXAMINATION
1. Each course (theory and practical) and project work shall be evaluated for a maximum of 100 marks.
2. The University examinations of 3 hours duration shall ordinarily be conducted between December & January and between May & June.

8. REQUIREMENTS FOR APPEARING FOR UNIVERSITY EXAMINATION
A candidate shall normally be permitted to appear for the University examination of the current year if he/she satisfied the following condition requirement:
- Student is expected to attend all ILP classes and secure 100% attendance. However, in order to allow for certain unavoidable reasons, the student is expected to attend at least 50% of the ILP classes (Three pair of Saturday and Sunday). For PG Diploma programmes the attendance in ILP classes is not mandatory.
- Registration is mandatory for current semester / year examinations as well as arrears examinations. Student is expected to register for examination for all courses of that semester / year.
9. PASSING REQUIREMENTS

1. A candidate, who secures not less than 50% of total marks prescribed for all the courses, shall be declared to have passed the Examination. If a candidate fails to secure a pass / absent in a particular course, it is mandatory that he/she register and reappear for the examination in that course during the next examination is conducted in that course; he/she should continue the same till he/she secures a pass.

2. A candidate who opts for project work shall be declared to have passed in the Project work and Viva–voce examination, if he/she secures an overall minimum of 50% marks. If a candidate fails to secure a pass / absent in the Project work and Viva-voce examination may be permitted to resubmit a project and appear for the viva – voce for the second time if so recommended by the examiners. No candidate shall be permitted to submit the project work and appear for the Viva – Voce on more than two occasions.

   Note: - If a student indulges in malpractice in any of the University examinations, he/she shall be liable for punitive action as prescribed by the University from time to time.

10. ELIGIBILITY FOR THE AWARD OF DEGREE

A student shall be declared to the eligible for the award of the PG Diploma Degree provided the student has

- Successfully completed the course requirements and passed all the prescribed examinations within a maximum period 3 years reckoned from the commencement of the course to which the candidates was admitted.

- The award of Degree must have been approved by the Syndicate of the University.

11. CLASSIFICATION OF THE DEGREE AWARDED

1. A candidate who qualifies for the award of the Degree having passed the examination in all the courses in his/her first appearance within a maximum period of 1 year (1 year from the admission) and securing an aggregate of not less than 75% of total marks shall be declared to have passed the examination in Distinction.

2. A candidate who qualifies for the award of the Degree having passed the examination in all the courses within a maximum period of 1 year reckoned from the commencement of study and securing an aggregate of not less than 60% of total marks shall be declared to have passed the examination in First Class.
3. A candidate who qualifies for the award of the Degree having passed the examination in all the courses not within a maximum period of 1 year reckoned from the commencement of study and / or securing an aggregate of less than 60% of total marks shall be declared to have passed the examination in Second Class.

4. All other candidates shall be declared as failed candidates.

12. **GRADING SYSTEM**

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<th>Grade Points</th>
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# PG Diploma Curriculums

## PG Diploma in Business Administration

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**Total Credits**: 18

### PG Diploma in Financial Management

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<td>FUTURES, OPTIONS AND DERIVATIVES</td>
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**Total Credits**: 15

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**Total Credits**: 15

### PG Diploma in Hospital Management

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**Total Credits**: 15
### PG Diploma in Human Resource Management

**Branch Code - 308**

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**Total Credits** 15

### PG Diploma in Industrial Safety

**Branch Code - 309**

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**Total Credits** 18

### PG Diploma in Intellectual Property Rights

**Branch Code - 310**

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**Total Credits** 15

### PG Diploma in Labour Management

**Branch Code - 311**

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**Total Credits** 15
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### PG Diploma in Materials Management

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### PG Diploma in Retail Management

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### PG Diploma in Supply Chain Management

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### PG Diploma in Transport Management

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<td>AIR TRANSPORT</td>
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<td>131603</td>
<td>ROAD &amp; RAIL TRANSPORT</td>
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<td>131604</td>
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### PG Diploma in Bioinformatics

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<td>BIOINFORMATICS COMPUTING</td>
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<td>PERL PROGRAMMING FOR BIOINFORMATICS</td>
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<td>131706</td>
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### PG Diploma in Computer Applications

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<td>COMPUTER GRAPHICS AND MULTIMEDIA</td>
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<td>WEB TECHNOLOGY</td>
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### PG Diploma in Information Technology

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<td>INFORMATION TECHNOLOGY SERVICES</td>
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<td>E-COMMERCE</td>
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<td>DATA WAREHOUSING AND DATA MINING</td>
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### PG Diploma in Investment Management

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<td>130504</td>
<td>FUTURES, OPTIONS AND DERIVATIVES</td>
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<td>FINANCIAL SERVICES</td>
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**Total Credits** 15

### PG Diploma in Petroleum Exploration

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<td>PETROLEUM GEOLOGY</td>
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<td>132104</td>
<td>OIL AND GAS FIELD DEVELOPMENT</td>
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**Total Credits** 18

### PG Diploma in Petroleum Refinery and Petrochemicals

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**Total Credits** 18

### PG Diploma in Trademark and Patent Analysis

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**Total Credits** 15
### PG DIPLOMA IN ANIMATION AND MULTIMEDIA
**Branch Code - 324**

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<td>MULTIMEDIA AND WEB DESIGNING</td>
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**Total Credits** 18

### PG DIPLOMA IN NETWORKING
**Branch Code - 325**

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**Total Credits** 18

### PG DIPLOMA IN SOFTWARE QUALITY ASSURANCE
**Branch Code - 326**

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**Total Credits** 18

### PG DIPLOMA IN SOFTWARE PROJECT AND QUALITY MANAGEMENT
**Branch Code - 327**

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<td>SOFTWARE ESTIMATION AND COSTING</td>
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**Total Credits** 18
PG DIPLOMA SYLLABUS

COURSE CODE: 130101

PRINCIPLES OF MANAGEMENT

OBJECTIVE: To expose with the challenges of New Millennium and to increase the confidence level.

MODULE I


MODULE II


MODULE III


MODULE IV


MODULE V


MODULE VI

Challenges in Management: Change Management - Timing of Change - Reaction to change - Planning organisational Change - Technological Change - Effective use of Communication Devices and IT.

TEXT BOOK


REFERENCE

OBJECTIVE: To equip budding managers with a complete, comprehensive review of essential human resource management concepts and techniques.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V
Employer and Employee relations– Collective bargaining- process–Unions-Ethics– Dominants of Ethical Behavior -Discipline – Protecting Safety &Health

MODULE VI
HRIS - HR Records – HR Accounting – HR Audit — Maintaining International Employees.

TEXT BOOK

REFERENCE BOOKS
OBJECTIVE: To Inculcate an Analytical approach to Financial Decision Making process focusing on various aspects of Capital and Money Markets.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK

REFERENCE
I.M.Pandey. “ Financial Management”.
OBJECTIVES: To gain knowledge in the concepts of marketing and to acquire capability in strategies formulations and tactics development.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK
Philip Kotler, Kevin Lane Keller, Marketing Management PHI, 12th edition.

REFERENCE
OBJECTIVE: To highlight the value of Corporate Governance and Business Ethics this yields economic prosperity and social development.

MODULE I

MODULE II
Shareholders & their Role – Legendary Rights – Responsibilities and Accountability of Stock owner – Directors Role – Duties – Committee – Tenure of Director – Nature of Voting

MODULE III

MODULE IV
Ethics – Definition – Types of ethical dilemmas – Overcoming ethical dilemmas – Ethical challenges – Business and its product

MODULE V

MODULE VI

TEXT BOOK:
2. Marianne M. Jennings – Business Ethics – Cengage Learning
COURSE CODE: 130201
BUSINESS PROCESS OUTSOURCING

MODULE I

Introduction to BPO-drivers of BPO- BPO vs ITO-taxonomy of BPO services-BPO for
Strategic advantage-BPO as global capability outsourcing-process centric organizations-Business
process portfolio management-implications of BPO strategic partnering model

MODULE II

BPO and its stakeholders-business process management-capturing and sharing process
knowledge-business process performance measurement-business process innovations-business
process migration strategies

MODULE III

Managing BPO- lifecycle methodology for BPO-process due diligence-outsourcing
management structure-BPO contract negotiation and monitoring-IT management competency-
BPO IT infrastructure model-technology management practices-client organisation

MODULE IV

HR challenges for Indian BPO sector-HR practices-motivation and compensation
strategies-relationship building in BPO-value creation in relationships-from relationships to
partnership-maturity model for BPO relationships

MODULE V

Managing risk in Outsourcing-mitigation strategies-strategic BPO-characteristics of
strategic outsourcing-analysing strategic outsourcing options-planning framework for strategic
partnering

MODULE VI

BPO Industry in India- comparision of voice and nonvoice BPO-leading voice players in
the global industry-attributes of successful leaders in BPO operations- cost of attritions-industry
segregation-market size and opportunity-effect of platform on BPO

TEXT BOOK

2007
COURSE CODE: 130202
CALL CENTRE TECHNIQUES

MODULE I
Understanding call centers—call centers – basis call center technology – call monitoring – evolution of the call center- evolution of the call center representative – characteristics of a successful call centers representative

MODULE II
Creating a positive work climate - call center climate – the team – positive and negative behavior – handling interpersonal conflict -addressing the call: it’s all attitude - the power of attitude – overcoming a negative attitude – creating a positive first impression – make every call a success

MODULE III

MODULE IV
Matching the customer vocabulary – keeping the call flowing – overcoming speech idiosyncrasies – listening and questioning – effective listening – communicant through accents – questioning skills – managing the call – positive control – effective use of the hold features

MODULE V
Voice mail – using e-mail effectively – minimizing telephone tag – transferring calls effectively – saying no to customers – style flexibility – why is style flexibility important – a style assessment tool – characteristics of the six personality types – phase change and flexibility

MODULE VI
Managing stress and handling different types of customers – stress on the job – handling different types of customers – telephone sales – the role of sales in the call center - belief in your product or service – the selling process – outbound calls – final tips for successful sales calls

TEXT BOOK:
Jack A.Green, “Call Centers, Technology and techniques “ Thomson
COURSE CODE: 130203
MEDICAL TRANSCRIPTION MANAGEMENT

MODULE I
Growth in MT - Employment opportunities - MT role in patient care - attributes of the Medical Transcriptionist - knowledge and skills – striving for accuracy – Ethical guidelines - Cultural diversity.

MODULE II

MODULE III
Transcription process - Editing documents form dictation - Jargon and clipped sentences - Styles of Writing –dictator accent - Proof reading methods – Medical record formats – Legal issues - Important components of medical records - History and Physical – Operative report - Discharge summary - Radiology, Pathology, Autopsy report -Managing medical records

MODULE IV

MODULE V

MODULE VI

TEXT BOOK:
COURSE CODE: 130204
KNOWLEDGE MANAGEMENT

MODULE-I
External influences on organization- Workforce composition- Evolving work roles and responsibilities- Teamwork- Relationship building- Communication- Leadership- Decision making- Change management- Worker motivation- Types of organization- Creating strategic focus- Strategic values and corporate culture- Systems and policies- Employee capabilities- Knowledge as asset—organizational knowledge-Leadership and knowledge management.

MODULE-II
Learning organization- Knowledge systems- Knowledge workers- Phases of knowledge development- Knowledge management infrastructure- Harassing organizational knowledge—Five P’s of knowledge management-Knowledge sharing as a core competency—Developing strategic knowledge community.

MODULE-III
Contribution of disciplines to knowledge—Leadership—Librarianship-HRM-Strategic visionary—Motivator-Communicator-Change agent—Learning facilitator—Strategic knowledge leader—Self managed team—Virtual knowledge team—Leading a knowledge network—Recruiting and selecting knowledge leaders.

MODULE-IV
Organization culture—Knowledge culture principles—Knowledge culture enablers—Knowledge culture during change—Existing knowledge culture—Enhancement planning—Implementing enhancement programs—Pilot testing—Planned culture interventions—Maintaining the knowledge culture.

MODULE-V
Structured support for knowledge management—Organizational structure and staffing—Performance management—Rewards—Learning and development—Knowledge management systems—Subsystems—Phases of managing core knowledge—Developing core knowledge structure—Content authorship.

MODULE-VI
Effective knowledge repositions—Mapping content structure—Repository quality control—Knowledge services—Models of service provision—Learning in a knowledge environment—Working with technology—Knowledge strategy evaluation—Successful knowledge management—Mergers, acquisition and downsizing integrated knowledge development.

TEXT BOOK:
COURSE CODE: 130205
CUSTOMER RELATIONSHIP MANAGEMENT

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V
MODULE VI

TEXT BOOK:
COURSE CODE: 130301
INTRODUCTION TO ERP

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK
OBJECTIVE: To understand the operation functions in manufacturing and service industry and to achieve knowledge in new concepts development in this domain.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI
Inspection and Quality Control – Statistical Quality Control Techniques (Control Charts and Acceptance Sampling – Quality Circles – Introduction to Total Quality Management.

TEXT BOOK:

REFERENCE BOOKS:
COURSE CODE: 130303
PROJECT MANAGEMENT

OBJECTIVE: To identify how business regularly uses Project Management to accomplish unique outcomes with limited resources under critical constraints.

MODULE I

MODULE II
Functional Manager vs. Project Manager – Project Responsibilities – Demands on the Project Manager – Project Manager Selection – Culture and the Project impact of Institutional Environments – Need for Multicultural Communications.

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXTBOOK
COURSE CODE: 130304
ERP IMPLEMENTATION PROCEDURE

MODULE-I
Introduction to ERP – Benefits of the ERP system – Challenges for SMES – Manufacturing strategies – MRPI & MRP-II – Conceptual framework of ERP

MODULE-II

MODULE-III
ERP implementation approaches – perspectives in implementation – minimizing customization – Characteristics of ERP systems – Critical success factors – ERP implementation strategy – phases in ERP implementation – Benefits realization – Change management issues

MODULE-IV

MODULE-V
CRM introduction – Need – Components – dimensions of CRM – CRM environment – data warehousing and data mining in CRM – dynamic CRM – features of CRM from SAP

MODULE-VI
.NET technology – fusion of .NET on ERP SAP – ORACLE – JD Edwards – Baan – pearel soft – Marshal - QAD – Compiere – Business modeling with the UML – UML class and sequence diagrams

TEXT BOOKS:
COURSE CODE: 130305
ERP ENABLED SERVICES

MODULE – I

MODULE – II
ERP project life cycle – Pre implementation and post implementation stages – Global best business processes and business practices – global IT infrastructure – competitive environment analysis – strategic need analysis – feasibility analysis – GAP analysis

MODULE – III

MODULE – IV

MODULE – V
BPR – Need, characteristics – ERP and BPR – ERP in modeling business processes – work flow management systems – Steps to BPR – five stage model of AS-IS / To-BE Analysis

MODULE – VI

TEXT BOOK
COURSE CODE: 130401
ECOLOGY AND ENVIRONMENT

OBJECTIVE: To understand the environmental problems and to protect the environment from the natural disasters.

MODULE - I

MODULE - II

MODULE - III

MODULE - IV

MODULE - V
Ecosystem Biodiversity – Species Diversity – Genetic Diversity – Global Diversity – The Value of Biodiversity – Biodiversity and Ecosystem function – Biodiversity – Hot Spots – Bio-wealth – Biotic Impoverishment – Biodiversity conservation – Biotechnology and Biodiversity – Milestones of Convention of Biodiversity (CBD) – Main Players in CBD.

MODULE - VI

OBJECTIVE: To expose the students the need for understanding the implication of ecological devastation and its impact on Human Race.

MODULE I

MODULE II
Land management – Land use and Degradation – Management problem – Strategies for sustainable Land Management

MODULE III
Soil Pollution – Agricultural chemicals as soil pollution – wetland conservation programme – Ramson convention

MODULE IV

MODULE V
Drinking water supply and sanitation – water pollution – Management issues – Integrated water resource development and management – National water policy – River pollution

MODULE VI
Marine Environment – Core issues – Management issues – Oil spills – India’s marine Environment.

TEXTBOOKS:
COURSE CODE: 130403
ENVIRONMENTAL INSTITUTIONS

OBJECTIVE: To scrutinize the effectiveness of the existing machinery.

MODULE I

MODULE II
Industrial Pollution: Causes and Consequences – Magnitude of the Problem: A Retrospect – Hazardous Industries and Environmental Pollution – Industrial Pollution and Health Hazards – hazardous substances – water pollution – air pollution

MODULE III

MODULE IV
Public liability insurance act: A measure to redeem hardship of pollution victims –Liability of the owner: No faculty liability basis- Settlement of claims-Environment relief fund-Limitation and scale of relief- Regulatory and penal provisions-Advisory committee.

MODULE V
Administrative efforts to combat Hazards – Central Pollution control board – State Pollution control board - Supreme Court decisions and Directions.

MODULE VI
Pollution Control in highly polluting industries – Coordination activities of control boards – Penal provisions and effectiveness of enforcement machinery – National Environment Tribunal.

TEXT BOOK:
COURSE CODE: 130404
ENVIRONMENTAL LAW

OBJECTIVE: To suggest measures to make the system of regulatory environmental management more effective and proactive.

MODULE – I

MODULE – II
Law Relating to Water Pollution – Water Pollution – Menacing Proportions – Civil Law Actions – Legislative Measures – The Water (prevention and Control of Pollution)

MODULE – III
Industrial Air Pollution and Law – Industrialization and Air Pollution – Civil Law Actions – Statutory Provisions – Orient Gas Company Act 1857 – Indian Penal code – Enforcement Machinery-Administrative efforts to combat the hazards

MODULE – IV
Central pollution control board- State pollution control boards- Supreme court decision and the directors- Pollution control in highly polluting industries-coordination activities of pollution control boards- Penal provisions and effectiveness of enforcement-Financial constraints and assistance- The national environment

MODULE – V
Environmental issues and judicial trend- Public nuisance as environmental hazards- Right to wholesome environment and ecological balance- Right to carry on trade-Right to information about hazardous installation.

MODULE – VI
Doctrine of mass justice emergence of public interest litigation- Public interest litigation and access to environmental justice- Environmental concerns of the Indian high courts- Public interest pollution-Public interest Petitions.

TEXT BOOK:
OBJECTIVE: To synergies both Management and Communication in order to excel.

MODULE I

MODULE II

MODULE III

MODULE IV
Objectives of Communication - Communication process - Media of Communication - Principles of Communication - Types of Communication - Interpersonal Communication - Gateway to effective interpersonal Communication.

MODULE V

MODULE VI

TEXT BOOK:

REFERENCE
OBJECTIVE: To understand the theories, concepts and techniques of financial management for prudent decision making.

MODULE I

MODULE II

MODULE III

MODULE IV
Sources of Finance: Sources of Long Term & Short Term finance-Financing decisions: Cost of capital – Hybrid Financing Instruments – Lease financing - and hire purchase – Venture Capital

MODULE V

MODULE VI
Management of Profits: Dividend policy - Determinants of dividend policy, bonus shares and stock splits - Corporate Restructuring.

TEXT BOOK

REFERENCE BOOKS
OBJECTIVE: To provide comprehensive information about investing in securities.

MODULE I
Valuation of securities – bond and fixed income instruments valuation – bond pricing
theorems, durations of bond and immunization of interest risk, term structure of interest
rate, determination of yield curves, valuation of equity and preference shares (Dividend
capitalization & CAPM).

MODULE II
Analysis of risk & return, concept of total risk, factors contributing to total risk, systematic
and unsystematic risk, default risk, interest rate risk, market risk, management risk,
purchasing power risk. Risk & risk aversion. Capital allocation between risky & risk free
assets – Utility analysis.

MODULE III
Fundamental & Technical Analysis of equity stock. Concept of intrinsic value. Objectives
and beliefs of fundamental analysis. Economy-Industry-Company framework, points and
figures chart, bar chart, contrary opinions theory, confidence index RSA,RSI, Moving
average analysis, Japanese Candlesticks.

MODULE IV
Behaviour of stock market prices – The market mechanism, testable hypothesis about
market efficiency, implications of efficiency market hypothesis for security analysis and
portfolio management. Asset pricing theories, CAPM & Arbitrage pricing theories.

MODULE V
Modern portfolio theory – Asset allocation decision. Dominant & Efficient portfolio –
Simple diversification, Markowitz diversification model, selecting an optimal portfolio –
Single index model, Treynor – Black model. Determination of corner portfolio. Process of
Portfolio Management – International Diversification.

MODULE VI
Portfolio performance evaluation – Sharp & Treynor & Jemsen’s measure. Portfolio
revision – Active and passive strategies & formula plans in portfolio revision. Mutual funds
– types, performance evaluation of mutual funds, functions of Asset Management
Companies

TEXT BOOK: Donald E.Fischer and Roanal J.Jordan – Security Analysis and
OBJECTIVE: To inculcate Knowledge on Capital Markets and Financial Services.

Module – I

Module – II

Module – III

MODULE-IV

MODULE-V
NSE-Objective of NSE- Operational Highlights-Bombay Stock Exchange (BSE)- A Dynamic Body-Book Building Transactions –BOLT Transactions –Trade Guarantee Fund (TGF) - Securities Trading Corporation of India(STCI)- Stock Holding Cooperation of India (SHCIL) - Over the Counter Exchange of India (OTCEI)-Promoters.

MODULE- VI

TEXT BOOK:
COURSE CODE: 130504
FUTURES, OPTIONS & DERIVATIVES

OBJECTIVES: To understand the concepts of Options, Futures & Derivatives and to familiarize the students about its usage.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK:
COURSE CODE: 130505
BANKING AND INSURANCE

MODULE I
Business of banking – Banker customer relationship – Structure of Indian Banking System – RBI – Commercial Banks – Public Sector and Private sector banks – Local area banks – Indian and foreign banks – Co-Operative Banks

MODULE II

MODULE III

MODULE VI
Importance and concept of risk management – meaning of business risks – nature of risks – causes and types of business risks – methods of handling risk – insurance purpose and need – functions of insurance – Principles of insurance – Types of insurance Contracts – Classification of insurance

MODULE V
Life insurance – essential features – advantages – Fire insurance – marine insurance – motor vehicle insurance – Health insurance – types of health insurance policies – Health insurance schemes in India

MODULE VI

TEXT BOOK
Jyotsna Sethi & Nishwan Bhatia, “Elements of Banking and Insurance”, PHI
COURSE CODE: 130601
INTERNATIONAL BUSINESS

MODULE I

MODULE II
International business Competitive strategies: Porter’s model; Prahalad and Doz’s strategy model, Foreign Direct investment, Joint Ventures, Foreign Institutional Investment.

MODULE III
International organisation and control: Organisational structures; Control procedures; Location of decision-making, Role of Subsidiaries, Organisational Control, Bartlett & Ghoshal’s Model of TNCs.

MODULE IV

MODULE V

MODULE VI
Foreign exchange; Theories of Foreign Exchange rate determination-Mint Parity Theory, Purchasing Power Parity Theory, Balance of Payment Theory, Interest Rate Parity Theory, Role of world bodies like World Bank, IMF, IBRD and WTO in International Trade, Critical issues in trade.

TEXT BOOK

REFERENCES
OBJECTIVE: To highlight the significance and necessity of International Marketing Research besides providing a comprehensive in depth view on it.

MODULE I

MODULE II

MODULE III
Secondary data: Need, uses, advantages and disadvantages – Syndicated data sources- IMR and internet – agents and research engines – Types of Primary Research – Sources – Problems in data collection.

MODULE IV
Qualitative Research – Types – Observational Methods – Cultural Influences – Survey research – Type of Surveys – advantages and disadvantages – measurement and scaling – Types of Scales – attitude measurement.

MODULE V
Questionnaire design and development – Sampling design, frame, process, types – determining sample size – data analysis – hypothesis testing – analysis of variance – regression and correlation analysis – multivariate data analysis.

MODULE VI

TEXT BOOK
Kumar. V International Marketing Research PHI
COURSE CODE: 130604
INTERNATIONAL LOGISTICS MANAGEMENT

MODULE – I

MODULE – II

MODULE – III

MODULE – VI

MODULE – V

MODULE – VI

TEXT BOOK:
MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

OBJECTIVE: To understand and appreciate the significant influence of Brand and their reach in ensuing customer retention and continued loyalty.

MODULE I
Brand definition, nature, scope and significance economics – competition – differentiation – customer loyalty – Brand and trust – Different Brand perspectives – Anatomy of a Brand

MODULE II
Brand knowledge pyramid – Benefits and promises – norms and values – identity and self expression – emotion and love – Evolution of a brand – Brand levels – Value hierarchy – Brand evolution – Poor, Hollow and power brands

MODULE III
Brand positioning – USP – Brand image and personality – 3 C’s of positioning – Competitive positioning and strategy – Brand success – Core Benefits

MODULE IV
Buying decision – Consumer perspectives – Consumer decision making – Post purchase behavior – Brand selection – building superior brands – Key drives of buying

MODULE V
Brand equity – definition and dimensions – brand awareness and customer loyalty – Brand report card – Brand identity levels and perspectives – Brand image – Brand check – Brand association – Brand extensions: reason and Types

MODULE VI

TEXT BOOK
Harsh V Verma “Brand Management” Excel Books
OBJECTIVE: To provide greater insight into the role of Human Resource Management in Hospital administration in the era of technologically driven hospitals

MODULE I
Definition of Hospital – History of Indian Hospitals – Classification – Hospital Organisation – Health services through five year plans – national health policy – Hospital administration – Principles of HRM – Human Resource utilization – functions, Significance, Importance of human resources

MODULE II
Use of Hi-tech machines, HR manager’s role – HR accounting, auditing and research – perspective of HR – evolution of HRM in India – Perspectives of HRM – HRM as a profession in Hospitals – HR plan, Philosophy and objectives – HR inventory

MODULE III

MODULE IV
Working Conditions, Safety, welfare and health services – Counseling nature and scope – Types of counseling – effective listening – techniques and functions of counseling – collective bargaining in hospitals

MODULE V
HR audit – nature and scope – Goals of organisation development – characteristics and phases of OD – Limitations of OD – MBO in Hospitals – Practice of MBO – Transactional analysis – TA as a tool

MODULE VI

TEXT BOOK
R.C. Goyal “Hospital Administration and Human Resource Management” PHI.
COURSE CODE- 130702
FACILITIES PLANNING IN HOSPITALS

MODULE-I

MODULE-II

MODULE-III
Building Contract and Contract Documents- Furnishing and Equipping the Hospital-Purchase of Capital Equipment-Role of Engineering Department- Guidelines for Purchasing Hospital Equipments- Suppliers Check List- ready to operate stage –before operating the Hospital –Commissioning and Inagurating.

MODULE-IV
Planning and Designing a Hospital – Business Plan – Facility Master Planning – Infrastructure and Functioning of Hospital –Successful Architecture Process.

MODULE-V
Hospital Organization Structure- Governance- Duties and Responsibilities of the Governing Board- Conflict of Interest- Committee Organization , Duties, Responsibilities and Functions of CEO-CEO and his Management Team - Organizational Charts.

MODULE-VI
Facilities Planning and Management of Sars – Symptoms and Signs of Sars-Reading of Sars-Strategies for Sars Treatment-Facilities-Sars only- Emergency Room ORE- Isolated Sane Site Facilities-Hospitals Internal and Staff Setting-General Public Settings-Design of future Hospitals.

TEXT BOOK
Gd Kunders-“Hospitals”Tata Mcgraw Hill
COURSE CODE - 130701
HOSPITAL MANAGEMENT

MODULE – I
Introduction – two lines of authority in Hospital – conflict between systems – propensity to break rules – conflict at top management level – professional management of the Hospital – recruitment and selection – orientation training and development

MODULE – II
Planning and designing administrative services – executive suite – Functions – Location – design – Professional service unit – functions – financial management unit – nursing service administration unit – Public relations department

MODULE – III

MODULE – IV
General nursing unit – paediatric nursing unit – Obstetrical nursing – psychiatric nursing isolation rooms – ICU\(^{\text{\textregistered}}\) and CCUs – newborn nurseries

MODULE – V
Admitting department – medical records department – Central sterilization and supply department – pharmacy – materials management – food service department – laundry and linen service – House Keeping – volunteer department

MODULE – VI
Public areas of Hospital – Staff facilities – maintenance management – clinical engineering – electrical system – air conditioning system – water supply and sanitary system – centralized medical gas system – communications systems – environmental control – solid waste management – safety and security in the Hospital

TEXT BOOK
GD Kunders, “Hospitals”  Tata McGraw Hill
OBJECTIVE: To Develop Financial skills and learn to manage money in Health Care
Industry Efficiency and Effectively.

MODULE I:
Financing Mix and Provision of Service – Financial and Management Accounting – Budget
Cycle.

MODULE II:
Factor – Approaches to Pricing – Break even Analysis.

MODULE III:
Pricing Process – Contract Pricing – Budgeting – Role of Budgeting – Approaches –
Budgeting and Control – Variance Analysis – Balanced Analysis.

MODULE IV:
Balance Sheet – Link between Balance Sheet and Income Statement.

MODULE V:

MODULE VI:
Financial and Management Reporting Systems – Strategic Reporting – Cash Mix

TEXTBOOK:
Reinhold Gruen and Anne Howarth,” Financial Management in Health Science”, Tata
COURSE CODE: 130703
HOSPITAL INFORMATION SYSTEM

MODULE I
Information – System-MIS definition – Concept of subsystems- Trends in information system- MIS as a communication process – MIS planning – Components of MIS- Open systems Vs closed systems-Role and importance of MIS – MIS Organization.

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK
COURSE CODE: 130801
PRINCIPLES OF HUMAN RESOURCE MANAGEMENT

OBJECTIVE: To equip budding managers with a complete, comprehensive review of essential human resource management concepts and techniques.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V
Employer and Employee relations– Collective bargaining- process –Unions - Ethics – Dominants of Ethical Behavior - Discipline – Protecting Safety &Health

MODULE VI
HRIS - HR Records – HR Accounting – HR Audit — Maintaining International Employees.

TEXT BOOK

REFERENCE BOOKS
OBJECTIVE: To acquire knowledge and skills in HR planning for meeting the legal and Organizational requirements.

MODULE I
Meaning – Importance – Long Range and Short Range HR planning – Job Analysis – Techniques – Competency Based Approaches – HR Management Systems

MODULE II
HR Forecasting Process – Benefits – Factors – Types of Forecasting – Qualitative and Quantitative Forecasting – HR Budgets.

MODULE III

MODULE IV

MODULE V
Environmental Scanning Sources and Methods – Sources of Information – Techniques and Challenges – Environmental factors.

MODULE VI

TEXT BOOKS:

REFERENCE BOOK:
COURSE CODE: 130804
TRAINING AND DEVELOPMENT

OBJECTIVE: To make the student to understand the role of Training and Development in enriching the Capabilities.

MODULE I
Definition – Scope – Objectives and, Benefits of training – The role of Training in Organizations – Place of Training in Organizational structure – A training process Model – Difference between training and development.

MODULE II

MODULE III

MODULE IV

MODULE V
Approaches to Management Development – Overview of the Managerial Job - Management Development implications - Sources of knowledge and skills - Special needs of Technical Manager – Training for Executive Level Management.

MODULE VI

TEXT BOOK:
Dr.B.Janakiraman – Training and Development – Biztantra/Wiley Dreamtech - 2005
COURSE CODE: 130803
COMPENSATION MANAGEMENT

MODULE – I

MODULE – II

MODULE – III

MODULE – IV

MODULE – V

MODULE – VI

TEXT BOOK:
Richard I. Derson, “Compensation Management”, Pearson Education
OBJECTIVE: To inculcate the changes in the Industrial relation policies and economic policies.

MODULE - I
Impact of Industrial Revolution – Industrial Relations: Concept – Importance of Industrial Relations – Scope and Aspects of Industrial Relations –Factors Affecting Industrial Relations – Perspectives/Approaches to Industrial Relations – Organisation of Industrial Relations – Dimensions of Industrial Relations Work – Prerequisite Successful Industrial Relations Programme.

MODULE - II

MODULE - III

MODULE - IV

MODULE - V

MODULE - VI
The Industrial Disputes Act, 1947 - Wage Legislations - The Payment of Bonus Act, 1965 - The Factories Act, 1948

TEXT BOOK
MODULE I


MODULE II


MODULE III


MODULE IV

Calculation of accident indices – Frequency rate – Severity rate – Frequency severity incidence – Incident rate – Accident rate – safety “t” score – Problems.

MODULE V

Importance of training-identification of training needs-training methods - Seminars – Conferences – Competitions – Motivation – Communication - Role of Government agencies and private consulting agencies in safety training – Awards and celebrations.

MODULE VI


TEXT BOOKS

MODULE I

MODULE II
Concept and spectrum of health-functional units and activities of occupational health services-occupational and work related disease-Levels of prevention of diseases – notifiable occupational diseases, their effects and prevention –Industrial toxicology – local and systemic and chronic effects temporary and cumulative effects – carcinogens entry into human system.

MODULE III
Man as a system component-allocation of functions-efficiency-occupational work capacity-aerobic and anaerobic work-steady state- work organization – stress-strain-fatigue-rest pauses-shift work-audiometric test-eye test-vital function test-pre employment and periodic employment medical examinations.

MODULE IV

MODULE V

MODULE VI
TEXT BOOKS


REFERENCES

2. Clayton & Clayton, Patty’s “Industrial Hygiene and Toxicology”, Vol.I, II and III, Wiley Inter science, 1986
MODULE I

Factories Act 1948 - Objectives – inspecting staff - Health, safety, provisions relating to hazardous processes - working hours and employment of young persons – special provisions – penalties and procedures.

MODULE II


MODULE III

Air Act 1981 and Water Act 1974 - Central and state boards for the prevention and control of air pollution-powers and functions of boards – prevention and control of air pollution and water pollution – fund – accounts and audit, penalties and procedures.

MODULE IV


MODULE V


MODULE VI


TEXT BOOKS

COURSE CODE: 130904
FIRE PREVENTION AND CONTROL

MODULE I


MODULE II


MODULE III


MODULE IV

Fire safety in buildings - Fire load, fire resistant material and fire testing – structural fire protection – structural integrity – exists and egress –fire certificates – fire safety requirements for high rise buildings – snookers.

MODULE V

Principles of explosion - detonation and blast waves-explosion parameters - explosion venting-inert gases-plant for generation of inert gas-rupture disc in process vessels and lines explosion, suppression system based on carbon dioxide (CO2) and halons-hazards in LPG.

MODULE IV

Indian explosive act and rules-static and mobile pressure vessel (SMPV) rules-Indian gas cylinders rules-petroleum act.

TEXT BOOK:
MODULE I
Air pollutants – Pollution sources - automobile pollution-hazards of air pollution-concept of clean coal combustion technology, fly ash-control of combustion in combustion chambers- ultra violet radiation, infrared radiation, radiation from sun-hazards due to depletion of ozone - deforestation-ozone holes-automobile exhausts-chemical factory stack emissions - CFC.

MODULE II

MODULE III

MODULE IV

MODULE V
Gravitational settling chambers-cyclone separators-scrubbers-electrostatic precipitator - bag filter – maintenance - control of gaseous emission by adsorption, absorption and combustion methods- Pollution Control Board-laws.

MODULE VI

1. NOISE LEVEL MEASUREMENT AND ANALYSIS
2. FRICTION TEST
3. IMPACT TEST
4. EXHAUST GAS MEASUREMENT AND ANALYSIS
5. ENVIRONMENTAL PARAMETER MEASUREMENT
6. STUDY OF THE FOLLOWING:
7. PERSONAL PROTECTIVE EQUIPMENT:
8. FIRE EXTINGUISHERS
MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXTBOOK:
COURSE CODE: 131002
MANAGING IPR

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V
MODULE VI

TEXT BOOK:
COURSE CODE: 130405
MANAGEMENT AND COMMUNICATION

OBJECTIVE: To synergies both Management and Communication in order to excel.

MODULE I

MODULE II

MODULE III

MODULE IV
Objectives of Communication - Communication process - Media of Communication - Principles of Communication - Types of Communication - Interpersonal Communication - Gateway to effective interpersonal Communication.

MODULE V

MODULE VI

TEXT BOOK:

REFERENCE
COUSRE CODE: 131003
INNOVATION MANAGEMENT

MODULE – I

MODULE – II

MODULE – III

MODULE – IV

MODULE – V

MODULE – VI

TEXT BOOK: Dr. C.S.G Krishnamachergalu & Dr. R. Lalita, “Innovation Management”, Himalaya Publishing Houses
MODULE-I
External influences on organization- Workforce composition- Evolving work roles and responsibilities- Teamwork- Relationship building- Communication- Leadership- Decision making- Change management- Worker motivation- Types of organization- Creating strategic focus- Strategic values and corporate culture- Systems and policies- Employee capabilities- Knowledge as asset – organizational knowledge- Leadership and knowledge management.

MODULE-II
Learning organization- Knowledge systems- Knowledge workers- Phases of knowledge development- Knowledge management infrastructure- Harassing organizational knowledge – Five P’s of knowledge management- Knowledge sharing as a core competency- Developing strategic knowledge community.

MODULE-III
Contribution of disciplines to knowledge- Leadership – Librarianship- HRM- Strategic visionary – Motivator- Communicator- Change agent- Learning facilitator- Strategic knowledge leader- Self managed team- Virtual knowledge team- Leading a knowledge network- Recruiting and selecting knowledge leaders.

MODULE-IV
Organization culture- Knowledge culture principles- Knowledge culture enablers- Knowledge culture during change- Existing knowledge culture – Enhancement planning- Implementing enhancement programs- Pilot testing- Planned culture interventions- Maintaining the knowledge culture.

MODULE-V
Structured support for knowledge management – Organizational structure and staffing- Performance management- Rewards- Learning and development – Knowledge management systems- Subsystems- Phases of managing core knowledge- Developing core knowledge structure- Content authorship.
MODULE-VI

COUSE CODE: 130805
INDUSTRIAL RELATIONS

OBJECTIVE: To inculcate the changes in the Industrial relation policies and economic policies.

Module - I
Impact of Industrial Revolution – Industrial Relations: Concept – Importance of Industrial Relations – Scope and Aspects of Industrial Relations –Factors Affecting Industrial Relations – Perspectives/Approaches to Industrial Relations – Organisation of Industrial Relations – Dimensions of Industrial Relations Work – Prerequisite Successful Industrial Relations Programme.

Module - II

Module - III

Module - IV

Module - V

Module - VI
The Industrial Disputes Act, 1947 - Wage Legislations - The Payment of Bonus Act, 1965 - The Factories Act, 1948

CONFLICT MANAGEMENT AND NEGOCIATION

OBJECTIVE: To improve Negotiation Expertise both Personal and Organizational Context.

MODULE - I
Conflict- Approach to Negotiation and Conflict- Sociological Schools of thought on Conflict- Constructive and Destructive Conflict- Conflict Chaos and Complexity Theories-a System Approach to Conflict Diagnosis- Conflict Diagnosis Managing and Resolving Conflict through Negotiation.

MODULE - II

MODULE - III
Key Negotiation Temperaments- Four Main Alternative Preferences- - Four Key Negotiating Temperaments- Other Indicative and Related Facets of Personality- Assessing Your Primary Negotiating Temperament- Communicating in Negotiation- the Communication Process- Rules for Effective Listening in Negotiation- Rules for Effective Speaking in Negotiation- Body Language- Electronic Communication- Reflection and Practice.

MODULE - IV

MODULE - V
Alternative Styles, Strategics and Techniques of Negotiation- Negotiation- The Stages of Negotiation- Different Styles and Ethics- Team Negotiation – Additional Complexities of Teams- Group Dynamics- Negotiation in Leadership and Public Relation- Meaning - Skills are Necessary to Lead- personality Character Tics affect Leadership Behavior- Key Concept of Mass Communication for Leading Public Relations.
**MODULE - VI**


OBJECTIVE: To evaluate the understanding importance of any organization to adopt itself to an ever changing environment.

MODULE – I
Change definition – Significance – Imperative of charge – force of change – models of change – Lewin’s force field, internal and external – Planned and unplanned change and Transition management.

MODULE – II
Change and its Impact – reasons for people resisting change – overcoming resistance change and the Person – Change and the Manager – Corporate Culture – Key factors in Change Management – Culture Change – designing change.

MODULE – III

MODULE – IV
Power politics issues in organization – Concept and dimensions – Types of Power ethics in OD – OD intervention techniques – interpersonal, Team development and group intervention strategies.

MODULE – V
Knowledge management (KM) definition – Need for KM – road blocks – History of KM what is KM – dynamics of Knowledge creation – types of knowledge various approaches to KM.

MODULE – VI

TEXT BOOK
Kavita Singh “Organisation Change and development” Excel Books.
COURSE CODE: 131102  
TEAM DEVELOPMENT AND LEADERSHIP

MODULE I  
Team work – Introduction- Meaning– Differences between team and group –Scope and Significances– Synergy and Diversity – Classifications– Advantages and Disadvantages– Team work as a OD Intervention – Content and Processes– Team work as a learning experiences – Character tics of effective teams- Team performances curve.

MODULE II  
Team development stages –Group norms – Facilitation scheme– Feedback– Team decision making approaches – Conflict resolution and collaboration in teams – Role of organization culture in team work – Selection and development of team members.

MODULE III  
Self Managed Work Teams (SMWT) – Meaning and scope of SMWT - Advantages and disadvantages of SMWTs – Virtual teams – Meaning and scope and objectives – Advantages and disadvantages – Barriers of communication and the challenge of supervision in virtual teams.

MODULE IV  
Leadership – Meaning – Definition – Role and significance of leadership in organization – Theories of leadership – Types of leaders – Transactional and transformational leadership.

MODULE V  
The challenges of globalization and technology to leadership development – Change management and leadership – Leadership function – Development of People – Processes and results.

MODULE VI  
Strategic Leadership – Leadership succession – Political power and strategic leadership.

Text book  
Lussier, “Effective Leadership”, Cengage
COUSRE CODE: 130803
COMPENSATION MANAGEMENT

MODULE – I

MODULE – II

MODULE – III

MODULE – IV

MODULE – V

MODULE – VI

TEXT BOOK:
OBJECTIVES: To gain knowledge in the concepts of marketing and to acquire capability in strategies formulations and tactics development.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI


REFERENCE
OBJECTIVE: To address all the issues concerned with understanding of marketing research and consumer behavior.

MODULE –I

MODULE-II
Sources of Secondary Data – qualitative research techniques – Questionnaire design – Structured and unstructured Types of questions – Sample size- Sampling technique – sampling errors –field work design –Selection of respondent and organizing –Data compilation and preparation.

MODULE –III

MODULE – IV

MODULE – V

MODULE – VI
Participants in organizational buying process – influences – buying process – e procurement.

TEXT BOOK:
Suja Nair, Marketing Research and Consumer Behaviour, Himalaya Publishing House.
OBJECTIVE: To acquire knowledge in sales management and Distribution domain.

MODULE – I

MODULE – II

MODULE – III
Sales force expenses – Marketing Audit – Sales force Audit- evaluation of effectiveness of Sales organization –Distribution management – need for distribution channel – channel levels.

MODULE –IV

MODULE –V
Channel design factor – ideal structure –Selecting channel partners – Training up, Motivating and evaluating channel members – Channel design implementations – Channel power – Channel design – Channel conflict.

MODULE –IV
Principles of Channel management – policies – Distribution of services – elements of channel information systems – logistics –Definition – origin – Key activities focus areas of SCM – IT as enabler of SCM – selling in international markets

TEXTBOOK: Krishna K Havaldar and Savant M Cavale, “Sales and Distribution Management, TMH
OBJECTIVE: To understand the role and nature of advertising concepts, agencies, markets and to create cutting edge global communications strategies.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI
Reasons to measure Effectiveness – conducting research – the testing process – program for measuring – importance of international markets – international adverting and promotion- global versus local advertising – role of other promotional mix international marketing – self regulation by advertisers and agencies – advertising council of India – deceptive advertising – advertising and promotion ethics – economic effects of advertising.

TEXTBOOK:
OBJECTIVE: To provide exposure in global marketing strategies and build strategic marketing capabilities.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK: Walker Mullins and Boyd Larreche, “Marketing Strategy “, TMH
COURSE CODE: 130101  
PRINCIPLES OF MANAGEMENT  

OBJECTIVE: To expose with the challenges of New Millennium and to increase the confidence level.

MODULE I  

MODULE II  

MODULE III  

MODULE IV  

MODULE V  

MODULE VI  
Challenges in Management: Change Management -Timing of Change-Reaction to change-Planning organisational Change-Technological Change-Effective use of Communication Devices and IT.

TEXT BOOK  

REFERENCE  
2 Management: Tasks, Responsibilities, Practices – Peter F. Drucker- Harper Collins Publishers  
COURSE CODE: 131301
PURCHASING MANAGEMENT

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK:
COURSE CODE: 131302
INVENTORY MANAGEMENT

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

COURSE CODE: 131303
LOGISTICS AND SCM

OBJECTIVE: To present the vision of the future of business logistics and supply chain management and their role in enterprise competitiveness.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

OBJECTIVE: To familiarize the concept of Storekeeping and warehousing.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V
Spare Parts Management - Salient Features of Spares – Inventory Control of Spares – Categorization of Spares – Provisioning of Spares – Pricing of Spares – Relevance of Maintenance – Maintenance Costs

MODULE VI

TEXT BOOK:
OBJECTIVE: To present the vision of the future of business logistics and supply chain management and their role in enterprise competitiveness.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK:
COURSE CODE: 130205
CUSTOMER RELATIONSHIP MANAGEMENT

MODULE I

MODULE II

MODULE III
Precursors To CRM – Customer Value – Enhancing Value Of Products And Services – Customer Satisfaction – CRM And Customer Satisfaction – Delighting The Customer – Measuring Relationship At Risk Effects On Customer Loyalty – Role Of CRM On Various Stages Of The Studies – The Customer Lifecycle – Role Of CRM In Pre-Purchase Stage – Role Of CRM In Purchase Stage – Role Of CRM In Usage Stage – Role Of CRM In Re-Purchase Stage – Role Of CRM In Winning Back Lost Customers

MODULE IV
MODULE V

MODULE VI

COURSE CODE: 131402
RETAIL MARKETING AND COMMUNICATION

MODULE – I

MODULE – II

MODULE – III

MODULE – IV

MODULE – V

MODULE – VI

Text Book
COURSE CODE: 131401
RETAIL OPERATIONS AND STRATEGIES

MODULE – I

MODULE – II
Retail strategy – Strategy planning process – corporate strategy and objectives – environmental analysis – resource audit analysis – strategic choice – location strategy

MODULE – III
Retail marketing – environment – marketing strategy and objectives – market segmentation – retail branding – service marketing mix – role of the retail buyer – principal buying activities – buying function

MODULE – IV
Retail logistics – retail supply chain – efficient consumer response – logistics culture in international markets – customer service definition – characteristics – improving quality of customer service

MODULE – V

MODULE – VI

TEXT BOOK
COURSE CODE: 131403
MERCHANDISING MANAGEMENT

MODULE – I

MODULE – II

MODULE – III

MODULE – VI
Retail pricing – concept and elements of retail price – Break even units – markup pricing – maintained markup – market skimming and penetration strategies – price bundling – leader pricing – multunit pricing – every day low pricing – single and multiple pricing

MODULE – V

MODULE – VI
Merchandising mix decision – on shelf and visual merchandising – shop displays Benefits types – online retailing – features – suitability of the electronic channel – online retailing and pricing – non store retailing – web based marketing

TEXT BOOK
2. Meenal Dhotre, “Channel Management and Retail Marketing” Himalaya Publishing
COURSE CODE: 130604
INTERNATIONAL LOGISTICS MANAGEMENT

MODULE – I

MODULE – II

MODULE – III

MODULE – VI

MODULE – V

MODULE – VI

TEXT BOOK:
COURSE CODE: 131501
SUPPLY CHAIN MANAGEMENT

OBJECTIVE: To assess and understand the strategic importance of SCM along with quantitative models.

MODULE I

MODULE II
Strategic Sourcing – Source evaluation – collaborative perspective – Buyer-Supplier Relationship – Partner Selection – develop of Partnership – importance of inventory – imbalances – uncertainties – inventory costs – inventory turnover ration

MODULE III

MODULE IV

MODULE V
Reverse Vs forward supply chain – types of reverse flows – collaborative SCM’s and CPFR – agile systems – sources of variability – characteristics – supplier interface – internal processes

MODULE – VI

TEXT BOOK
R.P Mohanty, S.G Deshmuki “Supply Chain Management” Biztantra, New Delhi
COURSE CODE: 131503
TOTAL QUALITY MANAGEMENT

OBJECTIVE: To understand the Total Quality Management perspective this is mission critical.

MODULE I

MODULE II
Definition of TQM – Elements – Deming’s 14 points – TQM tools and techniques – Planning phase of TQM – Barriers to TQM implementations.

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK:
MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V

MODULE VI

TEXT BOOK:
OBJECTIVE: To familiarize the concept of Storekeeping and warehousing.

MODULE I

MODULE II

MODULE III

MODULE IV

MODULE V
Spare Parts Management - Salient Features of Spares – Inventory Control of Spares – Categorization of Spares – Provisioning of Spares – Pricing of Spares – Relevance of Maintenance – Maintenance Costs

MODULE VI

TEXT BOOK:
OBJECTIVE: To make the students to understand the principles and practices of transport policy and planning, traffic surveys and management, and road design.

MODULE 1:

MODULE 2:
Transport planning- normal, generated and induced traffic- integrated transport study-economic assessment-environmental assessment –transport policy- formalities objectives-qualifies objectives and targets- indicators for different transport policy- infrastructure measures –management measures –pricing

MODULE 3:

MODULE 4:
Time series model- averaging and smoothing- regression analysis-matrix estimation models- elasticity models- simulation models –current trends in modeling- traffic planning strategic-do-minimum approach-land use planning approach

MODULE 5:
Public transport oriented approach- demand management approach- transport packaging –parking policy –town centre parking- park and ride- planning for pedestrian, cyclists and disabled people-characteristics and requirements-ramp gradient- role of passenger transport systems in urban and non-urban areas- inter urban travel.

MODULE 6:

Text Books:
MODULE 1:

History, methods and mode of Transportation – model competition – economic importance
– Transport as a factor of production – international transportation – Importance of international
transportation – Logistics – Freight distribution

MODULE 2:

Concepts and types of aviation – History of civil aviation industry – aviation technology
transportation – aviation economics or management – Aircraft manufactures – Airbus industrie –
Boeing – New generation aircraft Airbus 380 – Boeing Technology

MODULE 3:

Air transport and the economy – world air transport overview – benefits of air transport –
size of the industry – air transport and travel in dues by international tourism – Air transport and
FDI

MODULE 4:

Aviation management structure – operational management – Air freedom rights – Air
alliance and mergers – price competition – open sky policy – airline operating costs – Airline
pricing – Domestic airline industry – Low cost carrier

MODULE 5:

Infrastructure management – Airport management – airport functions – airport terminals –
airport planning management – runways – taxiway – airport capacity management – Terminal
management and Apron management – civil aviation policy

MODULE 6:

Air space management – air traffic control facilities – airports and airspace congestion
issues – international civil aviation organization – objectives – IA7A – UFTAA – federal aviation
administration – DGCA India – Strategic alliance in airline industry airport privatization India

Text Books:

P S Senguttuvan- “Fundamentals of Air Transport Management” – Excel Books
OBJECTIVE: To provide a complete knowledge on design concepts and construction practices about road and rail transport.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To understand the implication of Environment damage and resource depletion and to upgrade the Environment

MODULE 1:
Meaning – Importance – Selected concepts of ecology – Ecological services – International efforts for environmental protection.

MODULE 2:
Global warming – Effects – Measures to control – Ozone depletion – Ozone depletion and Business – Green freeze Refrigerator

MODULE 3:
Environmental management system – Installation – Certification – Standards – Actual conduct of Audit – Indian Scene – Green Rating Project

MODULE 4:
Key function of the Government Agencies – Environmental impact assessment – Environmental compliance status in India – Constraint – Small scale industries

MODULE 5:

MODULE 6:

Text Books:
131605 - OPERATIONS RESEARCH

MODULE 1:
Decision-making environments: Decision-making under certainty, uncertainty and risk situations; Uses of Decision tree, Uses, scope and applications of Operation Research in managerial decision-making

MODULE 2:
Linear programming: Mathematical formulations of LP Models for product-mix problems; graphical and simplex method of solving LP problems; sensitivity analysis; duality Transportation problem: Various method of finding Initial basic feasible solution and optimal cost Assignment model: Algorithm and its applications

MODULE 3:
Game Theory: Concept of game; Two-person zero-sum game; Pure and Mixed Strategy Games; Saddle Point; Odds Method; Dominance Method and Graphical Method for solving Mixed Strategy Game Sequencing Problem: Johnsons Algorithm for n Jobs and Two machines, n Jobs and Three Machines, Two jobs and m Machines Problems.

MODULE 4:
Queuing Theory: Characteristics of M/M/I Queue model; Application of Poisson and Exponential distribution in estimating Arrival Rate and Service Rate; Applications of Queue model for better service to the customers

MODULE 5:
Replacement Problem: Replacement of assets that deteriorate with time, replacement of assets which fail suddenly.

MODULE 6:
Project Management: Rules for drawing the network diagram, Application of CPM and PERT techniques in project planning and control; Crashing and resource leveling of operations Simulation and its uses in Queuing theory & Materials Management

Text Books:

References:
1. Peter C Bell- Management Science/ Operations Research (Vikas)
OBJECTIVE: To provide a strong foundation on the various approaches to the study of Genomics, Proteomics and the drug discovery process.

MODULE 1
Introduction to Bioinformatics – Information Search and Data Retrieval – Genome Analysis and Gene Mapping – Alignment of Pairs of Sequences – Alignment of Multiple Sequences and Phylogenetic Analysis

MODULE 2
Tools for Similarity Search and Sequence Alignment – Profiles and Hidden Markov Models – Gene Identification and Prediction – Gene Expression and Microarrays

MODULE 3
Protein Classification and Structure Visualization – Protein Structure Prediction – Proteomics – Computational methods for Pathways and Systems Biology

MODULE 4
Introduction to Drug Discovery – Drug Discovery: Technology and Strategies – Cell Cycle: Key to Drug Discovery

MODULE 5
Structural Biology and Virtual Screening for Drug Discovery – Emerging Role of Biomarkers in Drug Development

MODULE 6
G-Protein Coupled Receptors as Drug Targets – Ion Channels and Aquaporins as Potential Drug Targets – Computer Aided Drug Design

Text Book: -
OBJECTIVE: To get a broader view of the uses and their ethical aspects of the different technological developments made in the biotechnology field and to provide the clear idea about the Bioethics and Biosafety protocols and their implementation.

MODULE 1

Introduction to Bioethics and Biosafety – Human Genome Project and its Ethical Issues – Molecular Detection of Pre-Symptomatic Genetic Diseases and its Importance in Healthcare – Prenatal Diagnosis, Genetic Manipulations and their Ethical Issues – Ethical, Legal and Social Implications of Human Genome Project

MODULE 2


MODULE 3


MODULE 4


MODULE 5


MODULE 6

Testing of Drugs on Human Volunteers – Organ Transplantation and Ethical Issues – Public and Non Governmental Organizations Participation in Biosafety and Protection of Biodiversity – Indian Biodiversity Act

Text Book: -
OBJECTIVE: To understand the methods used to store, retrieve and analyze data using various tools and to give idea on database clusters and relevant software tools.

MODULE 1

MODULE 2

MODULE 3

MODULE 4

MODULE 5

MODULE 6

Text Book: -
COURSE CODE: 131704
BIOINFORMATICS COMPUTING

OBJECTIVE: To provide a roadmap to the diverse field of Bioinformatics computing.

MODULE 1

MODULE 2

MODULE 3

MODULE 4

MODULE 5

MODULE 6

Text Book: -
OBJECTIVE: To provide introductory concepts about PERL Scripting language for implementing real world problems faced by Bioinformatics and Biologists.

MODULE 1

MODULE 2
Arrays – Array Manipulation – Hashes – Maintaining a Hash – Control Structures – Choices – Loops – Intermediate Loops – Loop Exists

MODULE 3
Subroutines – Creating a Subroutine – Arguments – Return – Scope – Passing Arguments with References – Sort Subroutines – String Manipulation – Array-Based Character Manipulation – Regular Expressions – Patterns

MODULE 4

MODULE 5
References – Creating References – ref () – Anonymous References – Object Oriented Programming – Introduction to Objects – PERL Objects

MODULE 6

Text Book: -
OBJECTIVE: To present the concept of Object Oriented Programming and discuss the important elements and features of C++ and JAVA.

MODULE 1

MODULE 2

MODULE 3

MODULE 4

MODULE 5

MODULE 6

Text Book: -
Samanta D, “Object Oriented Programming with C++ and JAVA”- Prentice Hall India
OBJECTIVE: To provide a strong foundation in database technology and an introduction to the current trends in this field.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:

COURSE CODE: 131803
INFORMATION SECURITY

OBJECTIVE: To provide a Comprehensive Introduction to the Fundamental aspects of Information Security

MODULE 1
Overview of Information Security and Cryptography – Classical Encryption Methods

MODULE 2

MODULE 3

MODULE 4
MODULE 5


MODULE 6


Text Book:

OBJECTIVE: To impart the fundamental concepts of Computer Graphics and Multimedia.

MODULE 1


MODULE 2


MODULE 3


MODULE 4


MODULE 5


MODULE 6


Text Book: -

OBJECTIVE: Providing lucid explanation about the Idea of Inputs Output Streams on Both Client and Server side programming and Transaction Filtering.

MODULE I

MODULE II

MODULE III
Java Programming - Classes - Constructors – Objects and Creation - Inherits - Interfacing methods - Abstract - Class - Data Encapsulation – Multiple Threads.

MODULE IV

MODULE V
CGI - Server Browser, Interaction, CGI Script - Server side and Client Side Applets – Servlets - Servlets - API Handling GET and POST Request – Cookies - Session Tracking.

MODULE VI

OBJECTIVE: To inculcate the fundamental practices of good project management needed by software industry.

MODULE I:

MODULE II:

MODULE III:

MODULE IV:

MODULE V:

MODULE VI:

OBJECTIVE: To make people to learn enough about Information Technology and to play an active role in managing IT services.

MODULE I
Using IT to transform organizations - IT in workplace - IT and manager - major trends shaping today’s IT field - the nature of information - interpreting information - information to knowledge - types of decisions - role of IT decision making process - frameworks of IT - processing transactions - interorganisational systems - basics and technologies of information systems.

MODULE II
Modern organizations – flexibility - structure and design - building T - form organization - integrating IT with business environment - impact of IT on value chain - IT initiatives - IT infrastructure - existing global IT investments and practices - managing IT internationally - virtual firms and IT - business models and IT management.

MODULE III

MODULE IV
Building systems-system development lifecycle – pitfalls - spiral model of development - data collection for analysis and design - structured versus object oriented design - costs and benefits of new systems - feasibility study - client server computing – GUI - designing websites - concepts of object oriented analysis and design - computer aided software engineering (CASE) tools-RAD - distributed system architecture and design – data warehousing and datamining - OLAP and OLTP - high level design tools.

MODULE V
Implementing IT based change in organizations - reengineering and the role of IT - knowledge workers - knowledge management - decision support systems - multimedia for business - digital convergence applications - artificial intelligence and neural networks - business applications.

MODULE VI
IT enabled services - definition, scope, growth - Indian IT services business environment - business process outsourcing - knowledge and design outsourcing - call centre management and technology - software packages - medical and legal transcription technology deployment and industry outlook - India as emerging software development vendor-manpower availability - training - social responsibility of IT sector - ethics and IT - Indian IT Act and its impact.

Text Book: 
OBJECTIVE: To provide a Comprehensive Introduction to the Fundamental aspects of Information Security

MODULE 1

MODULE 2

MODULE 3

MODULE 4
MODULE 5


MODULE 6


Text Book: -
OBJECTIVE: To learn the advancements of electronic commerce this has become a compelling necessity in the present day communication based commerce which is happening in the digital space.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

OBJECTIVE: Enhance the traditional information presentation technologies by bringing the data for their creation into a single source.

MODULE 1
Data Warehouse – definition and characteristics – Data Warehouse Architecture – Client / Server computing model – Server Functions – Server Hardware Architecture – RISC Versus CISC – Distributed memory – Cluster Systems – Server OS, Unix, Windows NT, OS/2, NetWare

MODULE 2

MODULE 3
Data Warehouse Database, Sourcing, Acquisition, Cleanup and Transformation Tools – Access Tools - Query and Reporting Tools, OLAP – Data Marts – Information Delivery System

MODULE 4

MODULE 5

MODULE 6
Decision Trees – Neural Networks – Business Score Card and Clustering and Nearest-Neighbor – Prediction and analysis – Genetic Algorithms - Usage and Applications - Data Visualization Principles – Data Warehouse market

Text Book: -
Alex Berson, Stephen J. Smith , “Data Warehousing, Data- Mining and OLAP”, Tata McGraw Hill
OBJECTIVE: The objective of this paper is to throw light on the current state of financial services sector in India.

MODULE 1


MODULE 2


MODULE 3


MODULE 4


MODULE 5


MODULE 6


Text Book: -
Financial Services, M Y Khan, Tata McGraw Hill Publication.
OBJECTIVE: To provide comprehensive information about investing in securities.

MODULE 1
Valuation of securities – bond and fixed income instruments valuation – bond pricing theorems, durations of bond and immunization of interest risk, term structure of interest rate, determination of yield curves, valuation of equity and preference shares (Dividend capitalization & CAPM).

MODULE 2
Analysis of risk & return, concept of total risk, factors contributing to total risk, systematic and unsystematic risk, default risk, interest rate risk, market risk, management risk, purchasing power risk. Risk & risk aversion. Capital allocation between risky & risk free assets – Utility analysis.

MODULE 3

MODULE 4
Behaviour of stock market prices – The market mechanism, testable hypothesis about market efficiency, implications of efficiency market hypothesis for security analysis and portfolio management. Asset pricing theories, CAPM & Arbitrage pricing theories

MODULE 5

MODULE 6
Portfolio performance evaluation – Sharp & Treynor & Jemsen’s measure. Portfolio revision – Active and passive strategies & formula plans in portfolio revision. Mutual funds – types, performance evaluation of mutual funds, functions of Asset Management Companies

OBJECTIVE: To evaluate firm value and equity value and to inculcate the concept of dividend.

MODULE 1

MODULE 2

MODULE 3

MODULE 4
MODULE 5

MODULE 6
Alternative Ways of Returning Cash to Stockholders – Equity Repurchases – Forward Contracts to Buy Equity – Actions that affect Number of Shares Outstanding – Stock Splits – Stock Dividends – Actions that Affect claims on Assets – Diverstitures – Spin-offs, Split offs and Split-ups – Equity Carve-outs(ECSs) – Tracking Stock – Comparing the Alternatives – Comparing the Alternatives – Common Objectives – Key Differences – Choosing Between the Alternatives.

OBJECTIVES: To understand the concepts of Options, Futures & Derivatives and to familiarize the students about its usage.

MODULE 1

MODULE 2

MODULE 3

MODULE 4

MODULE 5

MODULE 6

Text Book: -
OBJECTIVES: The objective of this paper is to familiarize students with the organization, operation and growth of Financial System in India.

MODULE 1


MODULE 2


MODULE 3


MODULE 4


MODULE 5


MODULE 6


Text Book: -

MODULE 1:
Theories related to petroleum origin –Biogenic theory-Abigenic petroleum origin-mechanisms-evidence-Deep biotic petroleum theory-Geogical time scale-Proterozoic era-Paleozoic era-Cenozoic-Petroleum geology-Anticlines-Drilling-Dry hole-Geo phones-Mud-Pinchout-reservoir rock-

MODULE 2:
Seismic lines-Trap-Well logs-Asthemosphere-Delta-Diagenesis-Evaporite-Metamorphic rock-Prograde-Reverse fault-Salt dome-Shale-Sinistral –Syncline-Synthetic fault-Up dip weathering.Main type of rock-Acid, intermediate and basic igneous rocks-Nepheline and lencite-Bearing rocks-Classification of rocks-Rock cycle-Analysis of source rocks

MODULE 3:

MODULE 4:
Sedimentary rocks-Sedimentary rock type-Porosity and permeability in sedimentary rocks-Mud log-Identification of sedimentation rocks-Methodology of sedentology-Kerogens Type I,II, Type II-Sulfer Type III and Type IV.Sedimentary basin-Methods of formation-Littospheric stretching-Compression and shortening-Stike-Slip deformation .

MODULE 5:
Oil and gas in rocks-Anticlinal trap-Fault trap-Stratigraphic trap-Major tectonic plates of the world-Prinicipal types of folds and faults.

MODULE 6:

Text Books:
OBJECTIVE: To provide brief information about the various aspects, principles and techniques of Geographic Information Systems

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

MODULE 1:
Reservoir existence-Definition-Producing reservoir-new infill reservoir-deeper pool reservoir-well testing-oil recovery-secondary recovery-Geological heterogeneity-deeply buried sandstone reservoir-Carbonate reservoir-Carbonate analogs through time(CATT)-reservoir fluids.

MODULE 2:

MODULE 3:
Waves-Seismic waves in the earth-Reflection-2D seismic-advances 3D visualization-Paleontology-Biostratigraphy-sequence stratigraphy-Paleoecology-Hydrocarbon generation-Microfossils-Coring-Rock core-Open Hole rotary coring-Core bit-Slabbed core-Sidewall coring-Small sidewall cores-Pressure date of a giant oil field-Next wave in reservoir monitoring.

MODULE 4:
Implications for exploration and development-Reducing the risk of lithology predication-Maturing basin-Evaluation seal potential-Use of dip data to improve the interpretation of fold traps-Carbonate sequence stratigraphy-Coalbed methane-Shale tight sands-Tight sands-Unconventional gas-FMI Fullbore formation-Resistivity imager-Benefits and features.

MODULE 5:

MODULE 6:
Role of visualization in resource-formation resistivity measurement-Saturation measurement-Faster logging reservoir monitoring-logging for primary evaluation-Accuracy and precision Geophysical logging-Hole to hole measurements-Time domain electromagnetic-Ground penetrating radar-high resolution aeromagnetic surveys-Gravity-Magnetic-Resistivity-Seismic sources-Seismic reflection cross section

Text Books:
132104 - OIL WELL DRILLING TECHNOLOGY

MODULE 1:
Plate tectonics- Continental Draft – Seafloor spreading- Location of plate boundaries- type of plate motion- Integrated rock physics modeling- Geochemistry in exploration- Geochemistry and hydrocarbon assets- Distribution of oil quality in basis

MODULE 2:
Identifying missed payzones- Delineating reservoir compartmentalization- Maximizing water flood efficiency - Production lubing failure- Defecting cementing failures- Origin and distribution of heavy high inscosity deposits-Exploration and production tar study-Tracer and traceless studies-Mudges-Wet chemistry-Petrophysical properties-Chemometrics.

MODULE 3:
Elements of a petroleum system-Crucial factors-Petroleum system events chart-Hydrocarbon trap types-Petroleum system processes-Thermal maturation –Quantitative play analysis-Drilling-Rig-Completed oil well-Transporting petroleum-4 D seismic technology-Application and benefits-4 D feasibility study

MODULE 4:

MODULE 5:
Running logs-good porosity-poor porosity- poor resistivity-good resistivity- final string of casing-perforating guns-packer- pipeline design and running-production seperators-gas,water,oil lines

MODULE 6:
Global basins-Mississippi-petroleum play-Anadarko basin- san Joaquin valley gusher-K-T sedimentary basins-Ghawar field-The gulf of Suez,Greece and the North sea-Albacora field-Mexico rocks- hydrocarbons of the South Caspian Basin

Text Books:
OBJECTIVE: To understand the implication of Environment damage and resource depletion and to upgrade the Environment

MODULE 1:
Meaning – Importance – Selected concepts of ecology – Ecological services – International efforts for environmental protection.

MODULE 2:
Global warming – Effects – Measures to control – Ozone depletion – Ozone depletion and Business – Green freeze Refrigerator

MODULE 3:
Environmental management system – Installation – Certification – Standards – Actual conduct of Audit – Indian Scene – Green Rating Project

MODULE 4:
Key function of the Government Agencies – Environmental impact assessment – Environmental compliance status in India – Constraint – Small scale industries

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To provide a broader view about the refinery processes and about the Indian Petroleum Industry.

MODULE 1:
Origin and Formation of Petroleum – Reserves and Deposits of World – Petro Glimpses and Petroleum Industry in India – Composition of Petroleum

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:
Thermal and Catalytical Processes – Cracking – Catalytic Cracking – Catalytic Reforming – Naphtha Cracking – Cocking

MODULE 6:

Text Books:
MODULE 1:
Reservoir existence-Definition-Producing reservoir-new infill reservoir-deeper pool reservoir-Well testing-oil recovery-secondary recovery-Geological heterogeneity-deeply buried sandstone reservoir—Carbonate reservoir-Carbonate analogs through time(CATT)-reservoir fluids.

MODULE 2:

MODULE 3:
Waves- Seismic waves in the earth- Reflection-2D seismic-advances 3D visualization -Paleontology-Biostratigraphy-sequence stratigraphy- Paleocology-Hydrocarbon generation-Microfossils-Coring- Rock core- Open Hole rotary coring- Core bit- Slabbed core- Sidewall coring-Small sidewall cores- Pressure date of a giant oil field- Next wave in reservoir monitoring.

MODULE 4:
Implications for exploration and development- Reducing the risk of lithology predication-Maturing basin- Evaluation seal potential- Use of dip data to improve the interpretation of fold traps- Carbonate sequence stratigraphy- Coalbed methane- Shale tight sands- Tight sands-Unconventional gas-FMI Fullbore formation-Resistivity imager- Benefits and features.

MODULE 5:
Measurement physics- Characterization of rock structure-Net pay in laminated sediments- Visualization of sedimentary features- Fracture-Permeability direction- Structural interpretation- 3-D reservoir modeling- Key input for mechanical earth models- FMI specifications- Formation evaluation tools- Coring- mud logging- electric logs- porosity logs- Lithology logs- Routine core analysis.

MODULE 6:
Role of visualization in resource- formation resistivity measurement- Saturation measurement- Faster logging reservoir monitoring- logging for primary evaluation- Accuracy and precision Geophysical logging- Hole to hole measurements- Time domain electromagnetic- Ground penetrating radar- high resolution aeromagnetic surveys- Gravity- Magnetic- Resistivity-Seismic sources- Seismic reflection cross section

Text Books:
132104 - OIL WELL DRILLING TECHNOLOGY

MODULE 1:
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MODULE 2:
Identifying missed payzones- Delineating reservoir compartmentalization- Maximizing water flood efficiency - Production lubing failure- Defecting cementing failures- Origin and distribution of heavy high inscosity deposits- Exploration and production tar study- Tracer and traceless studies- Mudges- Wet chemistry- Petrophysical properties- Chemometrics.

MODULE 3:
Elements of a petroleum system- Crucial factors- Petroleum system events chart- Hydrocarbon trap types- Petroleum system processes- Thermal maturation- Quantitative play analysis- Drilling- Rig- Completed oil well- Transporting petroleum- 4 D seismic technology- Application and benefits- 4 D feasibility study

MODULE 4:

MODULE 5:
Running logs- good porosity- poor porosity- poor resistivity- good resistivity- final string of casing- perforating guns- packer- pipeline design and running- production separators- gas, water, oil lines

MODULE 6:
Global basins- Mississippian- petroleum play- Anadarko basin- san Joaquin valley gusher- K-T sedimentary basins- Ghawar field- The gulf of Suez, Greece and the North sea- Albacora field- Mexico rocks- hydrocarbons of the South Caspian Basin

Text Books:
OBJECTIVE: To understand the implication of Environment damage and resource depletion and to upgrade the Environment

MODULE 1:
Meaning – Importance – Selected concepts of ecology – Ecological services – International efforts for environmental protection.

MODULE 2:
Global warming – Effects – Measures to control – Ozone depletion – Ozone depletion and Business –Green freeze Refrigerator

MODULE 3:
Environmental management system – Installation – Certification – Standards – Actual conduct of Audit – Indian Scene – Green Rating Project

MODULE 4:
Key function of the Government Agencies – Environmental impact assessment – Environmental compliance status in India – Constraint – Small scale industries

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To identify how business regularly uses Project Management to accomplish unique outcomes with limited resources under critical constraints.

MODULE 1:

MODULE 2:
- Functional Manager vs. Project Manager – Project Responsibilities – Demands on the Project Manager – Project Manager Selection – Culture and the Project impact of Institutional Environments – Need for Multicultural Communications

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To familiarize the students with the basics of the Law of Trademarks and its uses.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:
New Developments in Trademark Law – the Internet – Protecting a Domain Name – Hyperlinking and the First Amendment – Other Cyberspace Trademark Issues – Case Studies.

MODULE 6:
International Trademark Law – Applications in the United States based on Foreign Applications and Registrations – Securing Trademark Protection in Foreign Counties – Effects of New International Agreements (NAFTA and TRIPs) International Associations.

Text Books:
OBJECTIVE: This paper focuses on the Laws pertaining to Copyrights and its uses.

MODULE 1:

MODULE 2:

MODULE 3:
Copyright Ownership, Transfers and Duration – Copyright Ownership Issues – Joint Works – Ownership in Derivative or Collective4 Works – Works Made for Hire – Transfers of Copyright – Termination of Transfers of Copyright – Duration of Copyright.

MODULE 4:
Copyright Registration, Searching Copyright Office Records and Notice of Copyright – Application for Copyright Registration – deposit Materials – Application Process and Registration of Copyright – Searching Copyright Office Records – Obtaining Copyright Office Records and Deposit Materials – Copyright Notice.

MODULE 5:

MODULE 6:

Text Books:

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
**OBJECTIVE:** To understand and appreciate the significant influence of Brand and their reach in ensuing customer retention and continued loyalty.

**MODULE 1:**
Brand definition, nature, and scope and significance economics – competition – differentiation – customer loyalty – Brand and trust Different Brand perspectives – Anatomy of a Brand

**MODULE 2:**
Brand knowledge pyramid – Benefits and promises – norms and values – identity and self expression – emotion and love – Evolution of a brand – Brand levels – Value hierarchy – Brand evolution – Poor, Hollow and power brands

**MODULE 3:**
Brand positioning – USP – Brand image and personality – 3 C’s of positioning – Competitive positioning and strategy – Brand success – Core Benefits

**MODULE 4:**
Buying decision – Consumer perspectives – Consumer decision making – Post purchase behavior – Brand selection – building superior brands – Key drives of buying

**MODULE 5:**
Brand equity – definition and dimensions – brand awareness and customer loyalty – Brand report card – Brand identity levels and perspectives – Brand image – Brand check – Brand association – Brand extensions: reason and Types

**MODULE 6:**

**Text Books:**
OBJECTIVE: To familiarize the students about the trade secrets, unfair competition, geographical indication and other aspects of Intellectual Property Rights.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To impart the fundamental concepts of Computer Graphics and Multimedia.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books: -

References:
OBJECTIVE: To provide all the aspects of various animation tools

MODULE 1:

MODULE 2:

MODULE 3:
Animation in Flash – Working with Timeline Effects – Using the Transform Timeline Effect – Using the Explode Timeline Effect – Using the Frame-by-Frame Animation Technique – Using Motion Tweening to Create Animations – Using Shape Tweening to Create Animations – Animating Filters – Applying the Bevel Filter – Applying the Glow Filter – Animating the Filter using the Motion Tween.

MODULE 4:

MODULE 5:

MODULE 6:
Lights – Standard and Photometric Lights – Key Light, Fill Light and Back Light – Default Lightning – Creating Standard Light Objects – Modifying Parameters of Light Object – Animation in 3dsMax – Understanding Frames, Key Frames and Keys – 3dsMax Animation Tools – Changing the number of Frames – Animating Objects in Auto Key and Set Key Mode – Working with the Motion Panel – Assigning a Path Constraint

OBJECTIVE: To provide clear knowledge about the use, design and implementation of animation software development using Maya 2008

MODULE 1:

MODULE 2:
Polygon Modeling in Maya 2008 – Exploring the Components of a Polygon Mesh – Creating a Polygon Mesh – Modifying a Polygon Mesh

MODULE 3:
NURBS Modeling – NURBS Curves – Creating a NURBS Curve – Editing a NURBS Curve – Creating NURBS Surface – Editing a NURBS Surface

MODULE 4:
Animating Objects in Maya 2008 – Basics – Types of Animation – Using the Animation Controls – Animating an Object Using Key Frame Animation – Adding Sound to an Animation – Previewing an Animation

MODULE 5:
Shading, Texturing and Lighting – Shader Types – Shader Attributes – Hyper shade – Using Hyper shade – Maya Lights – Adding Shadows – Mental Ray Lighting – Lightning Effects

MODULE 6:

Text Books:
OBJECTIVE: To provide all-round exposure on various multimedia and web development tools

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:
Introduction to Dreamweaver MX – Working with Tables, Anchors and Frameset – Layers and Style sheets – Forms and Media Elements

MODULE 6:

Text Books:
132404 – VIRTUAL REALITY TECHNOLOGY

OBJECTIVE: To impart the fundamental aspects, principles and applications of virtual reality technology.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To impart the fundamental concepts, terminologies and technologies used in modern days data communication and computer networking.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To provide comprehensive guidance for building robust, high performance networked systems in any environment.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

OBJECTIVE: To provide comprehensive guidance to deployment and administration of Windows server.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:
**Text Books:**

**132504 – INTERNETWORKING WITH TCP / IP**

**OBJECTIVE:** To understand their fast growing technologies related to networks and internetworking.

**MODULE 1:**

**MODULE 2:**

**MODULE 3:**

**MODULE 4:**

**MODULE 5:**

**MODULE 6:**

**Text Books:**
132505 - NETWORK MANAGEMENT

OBJECTIVE: Enables students to move onto the networking industry to acquire knowledge in the field of network management

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:
Ethernet Management Information Base-Relationship Between Control and Data Tables- Token Ring RMON Management Information Base- Broadband Network Management: ATM Networks-Broadband Network and Services-ATM Technology-Virtual Path - Virtual Circuit.-ATM Packet Size- Role of SNMP and ILMI in ATM Management- ATM Digital Exchange Interface Management

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To introduce an integrated approach to software development incorporating quality management methodologies.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To imbibe the knowledge of managing and maintaining quality issues concerned with the software design, development and maintenance.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
- Jeff Tian, Software Quality Engineering: Testing, Quality Assurance, and Quantifiable Improvement, Wiley-India Edition
132603 - SOFTWARE RELIABILITY ENGINEERING

OBJECTIVE: To understand the fundamental concepts of software reliability process.

MODULE 1:

MODULE 2:

MODULE 3:
Defining Necessary Reliability - Failure Severity Class and Failure Intensity Objective Concepts - Steps in Defining Necessary Reliability – Finding Failure Intensity Objective for Developed Software - Strategies to meet Failure Intensity Objective - Serial and Parallel System Reliability - Reliability Economics

MODULE 4:
Developing Operational Profiles - Defining Function, Operation, Run, Run Type, Operational Mode, Operational Profile - Representation of Operational Profile - Procedure to Define Operational Profile - Create Functions/Operations List - Determine Occurrence Rate of Individual Operations - Determine Occurrence Probabilities

MODULE 5:
Preparing For Test - Direct and Indirect Input Variables - Operation, Load and Regression Test – Definition of Test Case – Managing Test Cases - Test Procedure - Equivalence Classes and Boundary Conditions - Developing Test Cases – Executing Test – Planning and Allocation Test Time – Invoking Test – Identifying Failures

MODULE 6:

Text Books:

References:
OBJECTIVE: To introduce an integrated approach to software development incorporating quality metrics and models.

MODULE 1:


MODULE 2:


MODULE 3:


MODULE 4:


MODULE 5:


MODULE 6:


Text Books:
**OBJECTIVE:** To impart the fundamental concepts with details of the testing process and widely used automated, sophisticated testing tools.

**MODULE 1:**

**MODULE 2:**

**MODULE 3:**

**MODULE 4:**

**MODULE 5:**

**MODULE 6:**

**Text Book:**
OBJECTIVE: To inculcate the fundamental practices of good project management needed by software industry.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
**132601 – SOFTWARE QUALITY MANAGEMENT**

**OBJECTIVE:** To introduce an integrated approach to software development incorporating quality management methodologies.

**MODULE 1:**

**MODULE 2:**

**MODULE 3:**

**MODULE 4:**

**MODULE 5:**

**MODULE 6:**

**Text Books:**
OBJECTIVE: To get a clear, complete understanding of how to estimate software costs, schedules, and quality using the real-world information.

MODULE 1:

MODULE 2:

MODULE 3:
Sizing Software Deliverables – Compensation and Work-Pattern Adjustments – Activity Pattern Adjustment Factors – Software Technology Adjustment Factors

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
132604 - SOFTWARE METRICS

OBJECTIVE: To introduce an integrated approach to software development incorporating quality metrics and models.

MODULE 1:

MODULE 2:

MODULE 3:

MODULE 4:

MODULE 5:

MODULE 6:

Text Books:
OBJECTIVE: To provide the fundamental aspects of practical tools and techniques for managing the software testing process.

MODULE 1:  

MODULE 2:  

MODULE 3:  
Test Tracking Spreadsheet – Making Enhancements – Test Tracking System in Motion – Extracting Metrics from the Test Tracking Spreadsheet – Defining Test Execution Process – Managing Test Hardware and Software Configuration Logistics – Change Management Database – Case Study

MODULE 4:  
Need for Test Lab - Selecting and Planning a Lab Area – The Test Lab Inventory – Security and Tracking Concerns – Managing Equipments and Configurations – Keeping the Test Environment Clean – Human Factors – Qualities of Good Test Engineers – Defining the Test Team – Organizational Modules – Hiring Testers – Motivation of Test Team – Temporary Experts and Implementers – Case Study

MODULE 5:  
Test Group – Functions of Test Group – Directions of Test Management – Documentation – Layoffs and Liquidation – Importance of Accuracy and Audience – Test Partners – Planning a Distributed Test Effort – Managing a Distributed Test Effort – Case Study

MODULE 6:  

Text Books:  