

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE****NAME OF Department/Centre/School:** Department of Management Studies**Subject Code:** BMC-503**Course Title:** Financial Accounting**L-T-P:** 3-1-0**Credits:** 2.0**Subject Area:** PCC

**Course Outlines:** Introduction to accounting, Principles of accounting, Concepts and conventions, Types of accounts, Rules associated to accounts. Accounting process- Journal, Ledger, Trial Balance, Rectification of errors. Preparation of financial statements - Trading and profit and loss account, Profit and loss appropriation account, Balance sheet. Financial statements analysis- Ratio analysis, Cash flow statement, comparative and common size statements.

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF Department/Centre/School:** Department of Management Studies

**Subject Code:** BMC-504

**Course Title:** Marketing Management I

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Introduction to marketing concept for the new realities, understanding marketing management, Developing Marketing Strategies and Plans: Marketing and customer value, corporate, division and business unit strategic planning, Creating Long-Term Loyalty Relationship: Building customer value, satisfaction, and loyalty, Capturing Customer Insights: Scanning the environment, conducting marketing research and forecasting demand, Connecting with customers: Analysing consumer markets, Analysing, business markets, Building Strong Brands: Identifying market segments and targets, crafting brand positioning, Creating Brand equity, Addressing competition and driving growth.

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF Department/Centre/School:** Department of Management Studies

**Subject Code:** BMC-505

**Course Title:** Business Statistics

**L-T-P:** 2-0-2

**Credits:** 2.0

**Subject Area:** PCC

**Course Outlines:** Grouping and Displaying Data to Convey Meaning: Tables and Graphs, Measures of Central Tendency and Dispersion in Frequency Distributions, Probability Distributions, Sampling and Sampling Distributions, Estimation, Testing Hypotheses: One-sample Tests, Two-sample Tests, Simple Regression and Correlation, Multiple Regression and Modelling, Nonparametric Methods.

## INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF Department/Centre/School:** Department of Management Studies

**Subject Code:** BMC-506

**Course Title:** IT and Organisation

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Information Technology and Modern Organizations; Software Concepts for Managers; Shifts in the Software Industry: from Open Source, Cloud, Virtualized to Apps; Strategy and Technology Concepts; Disruptive Innovation and its Impact on Established Markets; and Information Security Challenges for Organizations.

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF Department/Centre/School:** Department of Management Studies

**Subject Code:** BMC-507

**Course Title:** Managerial communication

**L-T-P:** 0-0-3

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Forms of communication, Roles of a Manager in Communication; Barriers in managerial communication, Effectiveness in Managerial Communication, Role of Verbal & Non-verbal communication: Forms of Nonverbal Communication, Interpreting Non-verbal messages, Tips for effective use of non-verbal Communication, Managerial writing, Adaptation and selection of words, Construction of clear sentences, and paragraphs, Writing for effect, Writing process, Introduction to business messages, Types of messages, Direct and indirect message strategy, Business letters, Routine letters, Bad news and persuasive letters, Sales letters, Fundamentals of Report Writing: Basics of report writing, Short reports and proposals, Long formal reports, Short Reports, Internal communication through Memos, Minutes of meeting, Notices, Oral communication, Public speaking and oral reporting; Business Etiquette, Creating and Delivering Good Presentation.

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF Department/Centre/School:** Department of Management Studies

**Subject Code:** BMC-508

**Course Title:** Marketing Management 2

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outline:** Setting product strategy, Designing and managing services, Managing Brands, Product Life Cycle, Developing Pricing strategies and programs; Designing and managing integrated marketing communication, Advertising, Sales Promotions, Events and Experiences, Public Relations, Managing digital Communications across Online, social media, and mobile; Designing and managing integrated marketing channels, managing retailing, wholesaling and logistics; Trends in marketing, internal marketing, Competitor analysis and Competitive strategies, Sustainable Marketing Practices.

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF Department/Centre/School:** Department of Management Studies

**Subject Code:** BMC-511

**Course Title:** Production and Operations Management I

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Introduction to System concept and OM systems, role of OM in the enterprise management, Operations Strategy: Concept of product life cycle, manufacturing strategy and competitive advantage, Types of Manufacturing systems, Types of Services System, Forecasting Techniques: Approaches, accuracy and control of forecast, computers in forecast, Inventory Models: Static and probabilistic models, inventory control methods, Aggregate Production Planning: Aggregate demand, dimensions of production capacity, mathematical models for aggregate planning; Master production scheduling.

## INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF Department/Centre/School:** Department of Management Studies

**Subject Code:** BMC-512

**Course Title:** Business Environment

**L-T-P:** 2-1-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Introduction to business environment, Macro and micro business environment; Environmental Screening; Political and Government Environment, Business and government relations; Legal and Labour Environment - laws relating to weaker sections, specific industries, trade unions and industrial relations; Economic Environment and Economic Development; Socio-cultural Environment; The Financial System - An overview of Indian financial system, financial institutions and financial markets; Industrial Policies and Regulations - Industrial policy resolutions, public-private partnership, privatization and disinvestment, Indian Company Law, Competition Act; Consumer Rights, Consumerism and Business; Global Environment - Global environment, impact of global integration, GATT/WTO, MNCs.



**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-501

**Course Title:** Principles and Practice of Management

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Managerial Processes, Functions, Skills and Roles, Planning and Management by Objectives; Types of plans, Steps in planning, Strategic Planning Process, Verifiable Objectives, Systems approach to MBO; Decision Making; Planning Processes; Rational Model of Decision Making, Individual Decision Making and Problem Solving; Organizational Design and Structure, Departmentation, Line/Staff Authority, Delegation and Decentralization, Controlling: Process and Techniques of Control; Leading; Theories, Models, types of Leadership, success stories; Coordination; Types, Techniques and principles of coordination, Problems in Coordination; Controlling; Basic Control process, Critical Control Points, Strategic Control, Feedback and Feedforward System, Beaucroatic and Clan control

## INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-502

**Course Title:** Managerial Economics

**L-T-P:** 4-0-0

**Credits:** 2

**Subject Area:** PCC

**Course Outlines:** Introduction, Fundamental Economic Concepts for Managers, Theory of Demand and Supply: Market Equilibrium and Price Discrimination, Elasticities and its Types, Production: Function and Inputs, Economies of Scale and Production Efficiency, Cost Analysis and Break Even Analysis; Different Market Structure; National Income Accounting and Aggregate Demand; Business Cycle: Meaning and Features, Phases and its Dating; Money and Inflation: Quantity Theory of Money, Meaning and Types of Inflation, Fisher Effect; Unemployment and Economic Growth: Meaning and Types; Economic Growth: Capital Accumulation and Population Growth, Technology; IS-LM Model: Building of IS-LM Model, Open Economy IS-LM Model, Mundell-Fleming Model.

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-509

**Course Title:** Organizational Behaviour

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** OB Model: Dynamics in organization, Personality Theories, Personality; Traits, Attributes, Holland's Model, MBTI Scale, Leadership theories, types of Leadership, Motivation theories, Organizational Change Models; Models, GE 7 step change acceleration process, Force field analysis model, Stress Management; Cognitive Appraisal, P-E Fit, Psychoanalytic, Stress Life cycle, Theories of stress, Conflict Management; Emotional Intelligence; Emotional Intelligence and Leadership, Spiritual Intelligence, Team Building; Types of teams, Five stage Model, Group Behavior Model, Organisation Culture, Power and Politics; Organisation Culture, Culture as Liability, Stages in Socialization Process, Spiritual Organization, Bases of Power, Dynamics of Power, Causes and Consequences of Political Behavior

## INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-510

**Course Title:** Management Accounting

**L-T-P:** 3-1-0

**Credits:** 2

**Subject Area:** PCC

**Course Outlines:** Nature and scope, management accounting vs financial accounting and cost accounting, Meaning, scope and classification of costs, absorption costing, cost sheet and cost analysis. Preparation of Budgets and Budgetary Control; Budgeted income statement and balance sheet, sales forecasting and their use in the budgetary process. Standard Costing and Variance Analysis: Establishment of cost centers, types of standards, setting the standards; Material variances, labor variances, overhead variances, sales & profit variances, standard costing and budgetary control-a comparison. Marginal Costing and Cost-Volume-Profit Analysis; Activity Based Costing; Responsibility Accounting; Controllability and measurement of financial performance. Management Control System, measures of performance, balance scorecard, key performance indicators and quality control.

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMS-501

**Course Title:** Human Resource Management

**L-T-P:** 2-0-0

**Credits:** 2

**Subject Area:** SSC

**Course Outlines:** Human Resource Management, Job Analysis, Job Description, Job Specification, Role Analysis, HR Planning; Markov Analysis. Recruitment; Interview Techniques; Training & Development; Performance and Potential Appraisal; Compensation Management Planning, Wages & Salary Administration, Wage Policy, HRA-Introduction, Personal Records and Reports. Introduction to IR-Health and Safety, Employee Welfare, Employee Grievances and Discipline, Collective Bargaining. Participation and Empowerment, Trade unions and employers' associations, Industrial Relations and Industrial Disputes, Career and Succession Planning; Current business trends and its impact on HR: Emerging HR issues and contemporary HR concepts and practices.

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMS-502

**Course Title:** Essentials of Marketing Management

**L-T-P:** 2-0-0

**Credits:** 2

**Subject Area:** SSC

**Course Outlines:** Defining marketing in the modern dynamics, Developing marketing strategies and plans, Creating customer value, Understanding consumer and business markets, Interpreting the difference between products and services, Understanding segmentation and targeting, crafting the brand positioning, Key elements in the marketing mix: product, price, place, and promotion, Decoding challenges in the modern marketing dynamics, Creating successful long-term growth via marketing.

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-513

**Course Title:** Production and Operations Management-2

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Layout designs, Product, process, cellular layouts, layout in service systems, line balancing, Location Strategies, methods of evaluating location alternatives, service location strategy, JIT and Lean Operations, Quality Management, cost of quality, Total quality management, Quality tools, Contribution of quality Gurus, Statistical Quality Management, Six Sigma, Acceptance Sampling, Project Management, Maintenance Management, Reliability, TPM, Overall Equipment Effectiveness, Sustainable operations Management, sustainable manufacturing, New Challenges in Operations Management, Use of IT in operations Management.

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-514

**Course Title:** Financial Management

**L-T-P:** 3-1-0

**Credits:** 2.0

**Subject Area:** PCC

**Course Outlines:** Financial management: an overview, Financial Planning and forecasting, The Time Value of Money, Techniques of Capital Budgeting, Importance, Capital Budgeting Process, Estimation of project cash flows, Risk analysis in capital budgeting, Capital Structure, Cost of capital, Valuation of bonds and stocks, Dividend decision, Working capital management.



# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-515

**Course Title:** Operations Research

**L-T-P:** 2-1-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Introduction to Optimization Modelling, Linear Programming Models, Nonlinear Optimization Models and optimization with integer variables, Evolutionary Solver: An Alternative Optimization Procedure, Multi objective Decision, Queueing Models, Decision Making Under Uncertainty.

## **INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-516

**Course Title:** Digital Transformation

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Fast, Cheap Computing and its Business Implications; Internet and its Managerial Implications; Digital Economy Platforms and Competition; Data-Driven Decision-Making: Analytics, AI, and Machine Learning; Social Media Services and Business; and Sharing Economy and Tech-Fueled Businesses.

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-517

**Course Title:** Strategic Management-1

**L-T-P:** 4-0-0

**Credits:** 2.0

**Subject Area:** PCC

**Course Outlines:** Conceptual foundation of strategic management, strategy-making process, Vision, Mission, goals, objectives, policies, and business models; Environmental scanning; Value Chains analysis; Organizational Life Cycle stages; Strategy Formulation includes Business Level, low-cost, and differentiation strategies; Competitive strategies, Cooperative strategies like alliances and mergers, Strategic Globalization and Localization, Strategic Implementation (staffing, resource development, structure alignment), and Strategic Monitoring (evaluation criteria and methods).

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-518

**Course Title:** Strategic Management-2

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Business Policy and Corporate Governance, corporate culture, leadership's role, and ethical standards in strategy formulation and execution, Universalism, Relativism, and Social contracts; Corporate social responsibility, sustainability, and stakeholder analysis; Blue ocean strategy; Fortune at the Bottom of the Pyramid approach and innovation-driven co-created value; Design thinking's role in strategic decision-making, Adapting strategies in changing environments; Strategic leadership.

# INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-519

**Course Title:** Human Resource Management

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** HRM, Job Analysis; Job Description, Job Specification, Role Analysis, HR Planning; Markov Analysis. Recruitment; Interview Techniques; Training & Development; Performance and Potential Appraisal; Compensation Management Planning, Wages & Salary Administration, Wage Policy, HRA-Introduction, Personal Records and Reports. Introduction to IR-Health and Safety, Employee Welfare, Employee Grievances and Discipline, Collective Bargaining. Participation and Empowerment, Trade unions and employers' associations, Industrial Relations and Industrial Disputes, Career and Succession Planning; Current business trends and its impact on HR: Emerging HR issues and contemporary HR concepts and practices.

## INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-520

**Course Title:** Business Research Methods

**L-T-P:** 2-1-0

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Introduction to Business Research and Research Design, Research in consumer and Industrial markets, online research. Research Design: Exploratory Research, Descriptive & Causal Research Experimental designs. Scale development and sampling, Questionnaire development, Data Collection: Primary and secondary data. Qualitative Research: Ethnography and observation, Projective techniques, Focus group, Delphi, scenario building, Interviewing techniques, Case study, Content analysis. Quantitative Research: Univariate, bivariate and multivariate analysis. Mixed method research, Report writing, ethics in research.

## INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMC-521

**Course Title:** Data Science for Managers

**L-T-P:** 0-0-3

**Credits:** 1.5

**Subject Area:** PCC

**Course Outlines:** Chi-square test of independence, Chi-square test of goodness of fit, Analysis of variance, simple regression, estimation using regression line, correlation analysis, limitations, errors, and caveats, multiple regression and correlation analysis, modelling techniques, logistic regression, time series, trend analysis, cyclical variation, seasonal variation, irregular variation, time series analysis in forecasting, decision theory, utility as a decision criterion, decision tree analysis.

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT/CENTRE/SCHOOL:** Department of Management Studies

**Subject Code:** BMN-698E

**Course Title:** Financial Statements Analysis and Reporting

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PEC

**Course Outlines:** Introduction to financial analysis, Ratio analysis: ROI ratios, Solvency ratios, Turnover ratios, Profitability Ratios, Liquidity ratios, Du Pont Analysis, Valuation/ Capital Market ratios and their interpretation. Case based ratio analysis, Cash flow analysis: Preparation of cash flow statement under AS 3 (Operating, investing and financing activities), Comparative statement/Horizontal analysis, Common size statement/vertical analysis, Earnings management analysis, Working capital analysis, liquidity analysis. Reporting of financial statements under ICA 1956 and 2013.



## INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT:** Department of Management Studies

**Subject Code:** BML-580

**Course Title:** Behavioral Finance

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PEC

**Course Outlines:** Introduction- Psychology and market people; Decision-making process and behavioural biases; Foundations of rational finance – Expected utility theory, MPT, CAPM, EMH, AT; Heuristics and Biases – Working of human mind, Familiarity, Representativeness, Anchoring, Self-Deception. Prospect theory and mental accounting, Neuroscientific and evolutionary perspective. Emotional factors and social forces, Investor behavior, value investing.

## INDIAN INSTITUTE OF TECHNOLOGY ROORKEE

**NAME OF DEPARTMENT:** Department of Management Studies

**Subject Code:** BML-584

**Course Title:** Fintech

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PEC

**Course Outlines:** Core Technologies Powering FinTech: Artificial Intelligence, Machine Learning, and Big Data Analytics in Financial Services; Blockchain Technology and Cryptocurrencies. Innovations in Payment Infrastructure; Credit and Lending-Peer-to-Peer (P2P) Lending and Crowdfunding; Democratising Access to Finance; Trading and Capital Markets; Innovations in Insurance Products and Services; WealthTech; Regulatory Landscape and Compliance Challenges in FinTech; Future Trends and Opportunities in FinTech.

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT:** Department of Management Studies

**Subject Code:**BML-590

**Course Title:** Financial Perspective on Mergers and Acquisitions

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PEC

**Course Outlines:** Introduction to mergers and acquisitions and types of M&A, Acquisition valuation using intrinsic valuation models- Free cash flow and company cash flow based models, acquisition valuation using relative valuation, real life case analysis of acquisition valuation and introduction to deal pitch book components, valuation of a leverage buyout, cross border acquisitions-relevant cost of capital and translation of foreign currency flows, country risk premium, interest and inflation rate differentials.

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT:** Department of Management Studies

**Subject Code:** BML-591

**Course Title:** Text Analytics

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PEC

**Course Outlines:** Applications in business decisions, text preprocessing, text representation and vectorization, text visualization, text clustering, topic modelling, sentiment analysis, rule based versus machine learning approaches, BERT based sentiment analysis, text classification, supervised learning models and deep learning models for text data analysis, Part of speech tagging, text summarization, social media text data analysis, chatbots and virtual assistants, Introduction to LLMs and Generative AI, Language Models and RNNs, Case Studies.

**INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

**NAME OF DEPARTMENT:** Department of Management Studies

**Subject Code:** BML-592      **Course Title:** HOPE: Happiness, Optimism, Purpose, and Empowerment

**L-T-P:** 3-0-0

**Credits:** 1.5

**Subject Area:** PEC

**Course Outlines:** Overview of the science of happiness and well-being, Myths and misconceptions around happiness, Mindfulness and neurosciences outlook on happiness, Role of optimism and emotional intelligence in well-being, Emotional regulation, stress and reactivity, Practising happiness through positive interventions, Authentic living and empowerment, Trust, Forgiveness and Happiness, Understanding the science of resilience, Career, life and happiness, Happiness at work, Leadership and happiness, Consumer Happiness