2018

[OBE DESIGN- COMMERCE DEPARTMENT]

DR. BABASAHEB AMBEDKAR MARATHWADA UNIVERSITY AURANGABAD-431 001

PREFACE

Outcome Based Education (OBE) is the educational approach which focuses on student centric education in the context of development of personal, social, professional and knowledge (KSA) requirements in one's career and life. It is the decade ago curriculum development methodology. The educational triangle of *LEARNING-ASSESSMENT-TEACHING* is the unique nature of the OBE approach. The curriculum practices such as Competency Based Curriculum, Taylor's Model of Curriculum Development, Spadys' Curriculum principles, Blooms taxonomy and further use of assessment methodologies like, Norm-reference testing and Criterion reference testing, etc is being practiced since decades. It is also interesting to know that, globally, different countries and universities adopts the curriculum development models/approaches such as, CDIO (Conceive-Design-Implement-Operate), Evidenced Based Education, Systems' Approach, etc as the scientific and systematic approaches in curriculum design.

The authorities of Dr. Babasaheb Ambedkar Marathwada University, Aurangabad (M.S.) in-lieu of accreditation standards of National Assessment and Accreditation Council, decided to opt for Outcomes Based Education (OBE). As the part of the decision, different meetings, workshops and presentations were held at the campus of university.

This document is the outcome of different meetings and workshops held at university level and department level. The detailed document is designed and the existing curriculum of the department is transformed in to the framework of OBE. This is the first step towards the implementation of OBE in the department. The document will serve all stakeholders in the effective implementation of the curriculum. The OBE is continuous process for quality enhancement and it will go a long way in order to enhance the competencies and employability of the graduates/Post-graduates of the university department.

Head of Department

INDEX

Sr. No.	Title of OBE Element	Page No.
1	Preface	1
2	Mission	3
3	Vision	3
4	Program Educational Objectives (PEO)	4
5	Program Outcomes (PO) and Program Specific Outcomes (PSO)	5
6	Program Structure/ Curriculum Structure	
7	Course- PO/PSO Matrix	6
8	Course Outcomes	16
9	Attainment of Course Outcomes	10
10	Attainment of Program outcomes and Program Specific Outcomes	12
11	Corrective Measures for Continuous Improvement	13
	Annexure	
	Syllabus	

OUTCOME BASED EDUCATION

Faculty of Commerce & Management

Department of Commerce

1. Mission:

Mission Statement

- To offer certificate, diploma, post-graduate and research program in the domain of commerce.
- Development of competencies require in business and industry including ethics and values.
- Creating healthy environment for teaching, learning and research activities.
- Generating and providing resources and facilities to the faculty and the students for generating innovative ideas.
- Creating an urge in students to take up entrepreneurship in order to be successful by standing on their feet instead of being dependent on others.

2. Vision:

Vision Statement

- Provide Conducive environment for quality education in Commerce, Entrepreneurship and research through innovative and healthy Practices with commitment.
- Introducing innovative teaching and learning models, with a strong base of scientific research methods at all levels, by organizing Research festivals and strike a healthy and mature balance between modern and traditional values, similarly sensitizing teachers and students towards a more human approach.
- Inculcate ethical and moral values by offering a support system which is friendly and inspiring the future nation builders.

3. Title of the Program (s):

- a. Master of Commerce
- b. Master of Business Administration (IB)
- c. Diploma in Business Management

4. Program Educational Objectives:

The program educational objectives (PEO) are the statement that describes the career and professional achievement after the program of studies (graduation/ postgraduation). The PEO s are driven form question no. (ii) of the Mission statement (What is the purpose of organization). The PEOs can be minimum three and maximum five.

M. COM.

PEO1: Mastery over the domain of specialization in accounting and management.

PEO2: To work as professional in private and public sector through respective competitive examination/interviews.

PEO3: To establish own professional activity in the domain of commerce and accountancy.

PEO4: To opt for higher education, research and to be a life-long learner.

PEO5: To be a values based and ethical leader in the professional and social life.

Master of Business Administration (IB)

PEO1: Mastery over the domain of specialization in the Management Science International business.

PEO2: To work as professional in private and public sector through respective competitive examination/interviews.

PEO3: To establish own professional activity in the domain of Management science for international business such as Human Resources Development, Marketing, etc.

PEO4: To be a researcher and a life-long learner.

PEO5: To be a values based and ethical leader in the professional and social life.

Diploma in Business Management

PEO1: Application of Management Science (HR/marketing/Finance/IB/ OR/etc) in business management.

PEO2: To work as professional in private and public sector through respective competitive examination/interviews.

PEO3: To be a values based and ethical leader in the professional and social life.

5. Program Outcomes:

The program outcomes (PO) are the statement of competencies/ abilities. POs are the statement that describes the knowledge and the abilities the graduate/ post-graduate will have by the end of program studies.

M. Com.

- a. Apply an advanced level of theoretical knowledge in Commerce & business management.
- b. To apply advanced technical skills/software and tools in managing commerce and business activity with professional technical competence standard.
- c. To identify relevant research method and principles applicable in commerce and business domain.
- d. To apply creative and innovative strategies to appraise and synthesize complex problems in a commerce and business domain.
- e. Demonstrate an awareness for the need for corporate social responsibility and ethical behaviour;
- f. Demonstrate effective communication of complex ideas and business challenges.

Master of International Business (IB)

- a. Apply knowledge of management theories and practices to solve business problems.
- b. Foster Analytical and critical thinking abilities for data-based decision making.
- c. Ability to develop Value based Leadership ability.
- d. Ability to understand, analyze and communicate global, economic, legal, and ethical aspects of business.
- e. Ability to lead themselves and others in the achievement of organizational goals, contributing effectively to a team environment.

Diploma in Business Management

- a. Fundamental knowledge of management science.
- b. Apply knowledge of management theories and practices to solve business / business problems.
- c. Foster Analytical and critical thinking abilities for data-based decision making.
- d. To take initiative and be a member and leader of multi-disciplinary team.
- e. Communicate effectively.
- f. Ability to develop Value based Leadership ability.

6. Course- Program outcome Matrix:

The Program Outcomes are developed through the curriculum (curricular/co-curricularextra-curricular activities). The program outcomes are attained through the course implementation. As an educator, one must know, <u>"to which POs his/her course in</u> <u>contributing?"</u>. So that one can design the learning experiences, select teaching method and design the tool for assessment. Hence, establishing the Corse-PO matrix is essential step in the OBE. The course-program outcomes matrix indicates the co-relation between the courses and program outcomes. The CO-PO matrix is the map of list of courses contributing to the development of respective POs.

The CO-PO Matrix is provided in the below table.

Master of Commerce

Course Title	PO1	PO2	PO3	PO4	PO5	PO6	PSO1	PSO2
401	*	*	*					
402	*	*	*					
403	*	*	*					
421	*	*	*					
422			*	*				1
404	*	*	*					
405	*	*	*					1
406	*	*	*					
423	*	*	*					
EBUSINESS	*	*	*					
501			*	*	*	*		
502		*	*	*	*			1
503		*	*	*	*			
521		*	*	*	*			

MASTER OF COMMERCE

30-40-50

522	*	*	*	*		
504		*	*	*	*	
505	*	*	*	*		
523	*	*	*	*		
RESEARCH		*	*	*	*	

MASTER OF BUSINESS ADMINISTARTION (IB)

Course Title	PO1	PO2	PO3	PO4	PO5	PSO1	PSO2	PSO3
401	*			*				
402	*			*				
403	*			*				
421	*			*				
422	*			*				
405	*	*		*				
404	*	*		*				
423	*	*		*				
406	*	*		*				
424	*	*		*				
501	*	*		*	*			
502	*	*		*	*			
503	*	*		*	*			
521			*					
505		*	*		*			

506		*	*		*		
504	*	*	*	*	*		
GERMAN			*				
PROJECT	*	*	*	*	*		

DIPLOMA IN BUSINESS MANAGEMENT

Course Title	PO1	PO2	PO3	PO4	PO5	PO6	PSO1	PSO2
401	*	*	*					
402	*	*	*					
403	*	*	*					
421	*	*	*					
406		*	*	*	*	*		
405		*	*	*	*	*		
422		*	*	*	*	*		
404		*	*	*	*	*		
PROJECT	*	*	*	*	*	*		

DIPLOMA IN BUSINESS MANAGEMENT

7. Course Outcomes (for all courses):

The course outcomes are the statement that describes the knowledge & abilities developed in the student by the end of course (subject) teaching. The focus is on development of abilities rather than mere content. There can be 5 to 7 course outcomes of any course. These are to be written in the specific terms and not in general. The list of Course Outcomes is the part of *Annexure-C* attached herewith.

8. Set Target levels for Attainment of Course Outcomes:

The course outcome attainment is assessed in order to track the graduates' performance w.r.t target level of performance. The CO-PO attainment is the tool used for continuous improvement in the graduates' abilities through appropriate learning & teaching strategies. In order to assess students' performance with respect to abilities (at the end of course teaching/by the end of program) the course outcome attainment are measured/calculated. In order to calculate the program outcome attainment, the course outcome attainment is calculated. Prior to that, the course-program outcome mapping is done.

9. Set Target level for Attainment of Program Outcomes:

The program outcome attainment is assessed in order to track the graduates' performance w.r.t target level of performance. The CO-PO attainment is the tool used for continuous improvement in the graduates' abilities through appropriate learning & teaching strategies. In order to assess students' performance with respect to abilities (at the end of course teaching/by the end of program) the course outcome attainment and program outcome attainment is measured/calculated. The program outcome attainment is governed by curricular, co-curricular and extra-curricular activities including the stakeholders' participation. The direct method and indirect method is adopted to calculate the PO attainment. The direct method implies the attainment by course outcomes contributing to respective program outcomes. And indirect method is the satisfaction/feed-back survey of stakeholders. In order to calculate the program outcome attainment, the course outcome attainment is calculated. Prior to that, the course-program outcome mapping is done. The set target level is the set benchmark to ensure the continuous improvements in the learners/ graduates' performance.

10. Course Attainment Levels:

- a. CO attainment is defined/set at three levels;
- b. The CO attainment is based on end term examination assessment and internal assessment;
- c. The Co attainment is defined at three levels in ascending order-The following are the defined CO attainment level for Master of International Business and Diploma in Business Management.
 - i. e.g. For end term and internal examination;
 - ii. Level-1: 40% students scored more than class average
 - iii. Level-2: 50% students score more than class average;
 - iv. Level-3: 60% students score more than class average.

For Master of Commerce, the level-1, 2 and 3 are 30%, 40% and 50 % respectively.

d. The target level is set (e.g. Level-2). It indicates that, the current target is level-2; 50% students score more than class average. The CO attainment is measured and the results

are obtained. Based on the results of attainment, the corrective measures/remedial action are taken.

- **e.** CO Attainment= 80% (Attainment level in end term examination) + 20% (Attainment level in internal examination).
- f. <u>One example on calculation of CO attainment for Master of Commerce is provided</u> <u>under point No. 12 in the below paragraph.</u>

11.Program attainment Level:

- a. PO attainment is defined at five levels in ascending order;
- b. The PO attainment is based on the average attainment level of corresponding courses (Direct Method) and feed-back survey (Indirect method);
- c. The PO attainment levels are defined / set as stated below;
 - i. Level-1: Greater than 0.5 and less than 1.0 (0.5>1)- Poor
 - ii. Level-2: 1.0>1.5-Average
 - iii. Level-3: 1.5>2.0-Good
 - iv. Level-4: 2.0>2.5-Very Good
 - v. Level-5: 2.5>3.0 -Excellent
- d. The PO attainment target level is set/defined (say, Level-4). It implies that, the department is aiming at minimum level-4 (very good) in the performance of abilities by the graduates. Based upon the results of attainment, the remedial measures are taken;
- e. PO Attainment= 80% (Average attainment level by direct method) + 20% (Average attainment level by indirect method).
- f. <u>One example on calculation of PO attainment for Master of Commerce is provided</u> under point No. 13 in the below paragraph.

12. The Results of CO Attainment:

The Results of CO attainment are provided in Annexure-B

FOR EXAMPLE:

COURSE CODE/TITLE: MPOB/ COM-401

- e.g. For end term and internal examination;
- i. Level-1: 30% students scored more than class average
- ii. Level-2: 40% students score more than class average;
- iii. Level-3: 50% students score more than class average

Average Marks in External examination: 38.25 = i.e. 38.00

% Students score more than 38 is 44/88 i.e. 50% i.e. Levl-3

Average Marks in Internal examination= 16.69= i.e. 17.00

% Students score more than 17 is 32/88= 36.36%, i.e. Level-1

A (CO) COM-401= 80% (3) +20(1)

=2.4+0.2

=2.6

Hence, the attainment level is Level-2 and the set target level is Level-2 and therefore the CO is fully attained.

Table No. 1.0: CO Attainment Level

M. COM.

		MASTE	R OF COMMERCE	
Course Code	CO Attainment	Attainment Target	Fully Attained/ Not Attained	Remedial Measures
couc	Value	Level	/ teamea	
401	2.6	2	Fully Attained	
402	3	2	Fully Attained	
403	1	2	Not Attained	Assignments, tutorials,
421	1.6	2	Not Attained	exercises and remedial
422	1.8	2	Not Attained	coaching shall be planned.
404	2.2	2	Fully Attained	
405	2.2	2	Fully Attained	
406	0.6	2	Fully Attained	
423	0.6	2	Fully Attained	
EBUSINESS	1.2	2	Not Attained	Assignments, tutorials, exercises and remedial coaching shall be planned.
501	3	2	Fully Attained	3
502	3	2	Fully Attained	3
503	3	2	Fully Attained	3
521	3	2	Fully Attained	3
522	2.8	2	Fully Attained	2.8
504	2	2	Fully Attained	2
505	2.2	2	Fully Attained	2.2
523	2	2	Fully Attained	2
RESEARCH	2.4	2	Fully Attained	2.4

Course	CO	Attainment	Fully Attained/	Remedial Measures
Code	Attainment	Target	Not Attained	
	Value	Level		
401	2.2	2	Fully Attained	
402	3	2	Fully Attained	
403	1.4	2	Not Attained	Assignments, tutorials, exercises
				and remedial coaching.
421	3	2	Fully Attained	
422	3	2	Fully Attained	
405	3	2	Fully Attained	
404	1.4	2	Not Attained	Assignments, tutorials, exercises
				and remedial coaching.
423	3	2	Fully Attained	
406	3	2	Fully Attained	
424	3	2	Fully Attained	
501	2.2	2	Fully Attained	
502	1.2	2	Not Attained	Assignments, tutorials, exercises
				and remedial coaching.
503	3	2	Fully Attained	
521	0.6	2	Fully Attained	
505	3	2	Fully Attained	
506	3	2	Fully Attained	
504	3	2	Fully Attained	
GERMAN	2.2	2	Fully Attained	
PROJECT	3	2	Fully Attained	

Master of Business Administration (IB)

D.B.M.

Course Code	CO Attainment	Attainment Target	Fully Attained/ Not Attained	Remedial Measures
	Value	Level		
401	2.2	2	Fully Attained	Not Applicable
402	2.2	2	Fully Attained	
403	3	2	Fully Attained	
421	2.2	2	Fully Attained	
406	3	2	Fully Attained	
405	2.2	2	Fully Attained	
422	3	2	Fully Attained	
404	3	2	Fully Attained	
PROJECT	3	2	Fully Attained	

13.The Results of PO Attainment:

The Results of PO attainment are provided in Annexure-B FOR EXAMPLE:

PO NO.: 3/c

(Note: Refer point No. 11 above which describes the attainment level and set target attainment level)

PO Attainment= 80% (Average attainment level by direct method) + 20% (Average attainment level by indirect method).

A (PO) 3/c = 80% (2.6 +3+1+1.6+1.8+2.2+2.2+0.6+0.6+1.2+3+3+3+3+3+2.8+2+2.2+2+2.4)/19 +20% (2.58)

=80% (2.115) + 20% (2.1)

= 1.692 + 0.42

= 2.11 i.e. Level-4

Hence PO is attained.

Table No. 2.0 PO Attainment Level

Master of Commerce

PO/PSO No.	PO Attainment Value	Target Attainment Level	Fully Attained/ Not Attained	Remedial Measures
a	1.69	4	Not Attained	Assignments, tutorials, exercises and remedial coaching shall be planned for the corresponding courses.
b	2.08	4	Fully Attained	
с	2.11	4	Fully Attained	
d	2.52	4	Fully Attained	
е	2.64	4	Fully Attained	
F	2.60	4	Fully attained	

PO/PSO No.	PO Attainment Value	Target Attainment Level	Fully Attained/ Not Attained	Remedial Measures
а	2.56	4	Fully Attained	Not Applicable
b	2.65	4	Fully Attained	
С	2.47	4	Fully Attained	
d	2.56	4	Fully Attained	
е	2.63	4	Fully Attained	

Master of Business administration (IB)

D.B.M.

PO/PSO No.	PO Attainment Value	Target Attainment Level	Fully Attained/ Not Attained	Remedial Measures
а	2.52	4	Fully Attained	Not Applicable
b	2.64	4	Fully Attained	
С	2.64	4	Fully Attained	
d	2.84	4	Fully Attained	
е	2.84	4	Fully Attained	
f	2.84	4	Fully Attained	

14. Planned Actions for Course Attainment:

The Courses having attainment level Level-2, shall be addressed by planning the remedial measures such as assignments, tutorials and remedial coaching.

15.Planned Actions for Program Outcome Attainment:

The PO having attainment level lesser than Level-4, will be addresses by planning the remedial measures for the corresponding courses with respect to PO.

ANNEXURE-B

RESULTS OF CO-PO ATTAINMENT

M.COM.

		MASTER OF COMMERCE				30-40- 50		
Course Title	PO1	PO2	PO3	PO4	PO5	PO6	PSO1	PSO2
401	2.6	2.6	2.6					
402	3	3	3					
403	1	1	1					
421	1.6	1.6	1.6					
422			1.8	1.8				
404	2.2	2.2	2.2					
405	2.2	2.2	2.2					
406	0.6	0.6	0.6					
423	0.6	0.6	0.6					
EBUSINESS	1.2	1.2	1.2					
501			3	3	3	3		
502		3	3	3	3			
503		3	3	3	3			
521		3	3	3	3			
522		2.8	2.8	2.8	2.8			
504			2	2	2	2		
505		2.2	2.2	2.2	2.2			
523		2	2	2	2			
RESEARCH			2.4	2.4	2.8	2.8		
	1.688889	2.08	2.13	2.52	2.64	2.6		

M.B.A. (IB)

MASTER OF BUSINESS ADMINISTRATION (IB)

Course Title	PO1	PO2	PO3	PO4	PO5	PSO1	PSO2	PSO3
401	2.2			2.2				
402	3			3				
403	1.4			1.4				
421	3			3				
422	3			3				
405	3	3		3				
404	1.4	1.4		1.4				
423	3	3		3				
406	3	3		3				
424	3	3		3				
501	2.2	2.2		2.2	2.2			
502	1.2	1.2		1.2	1.2			
503	3	3		3	3			
521			0.6					
505		3	3		3			
506		3	3		3			
504	3	3	3	3	3			
GERMAN			2.2					
PROJECT	3	3	3	3	3			
	2.56	2.65	2.47	2.56	2.63			

D.B.M.

405

422

404

PROJECT

3 2.52

Course Title	PO1	PO2	РОЗ	PO4	PO5	PO6	PSO1
401	2.2	2.2	2.2				
402	2.2	2.2	2.2				
403	3	3	3				
421	2.2	2.2	2.2				
406		3	3	3	3	3	

2.2

3

3

3

2.84

2.2

3

3

3

2.64

2.2

3

3

3

2.64

2.2

3

3

3

2.84

2.2

3

3

3

2.84

DIPLOMA IN BUSINESS MANAGEMENT

PSO2

ANNEXURE-C COURSE OUTCOMES

MASTER OF COMMERCE

International Marketing

- Apply basic international marketing theories and concepts to understand the environment;
- Undertake strategic business analysis in order to develop appropriate international marketing objectives and strategies;
- Identify, analyse, and evaluate data, information, and evidence related to international business opportunities and threats relevant in the current world;
- Communicate, clarify, and present to peer audiences in a professional setting and work in a team reflected in assessment activities; and
- Produce a report considering the marketing of a business to consumers or business customers in different cultural contexts with consideration of ethical conduct.

International accounting

- Explain how international accounting differs from domestic accounting
- Identify several internal and external reporting issues that arise when business operations navigate national borders.
- Explain the difference between 'fair presentation' and 'legal compliance' under the discipline of accounting and relate said concepts to corresponding countries.
- Compare and contrast financial accounting systems for five of the highly developed economies of the world.
- Relate International Reporting Standards (IFRS) to Indian standards
- Discriminate global accounting and auditing standards with that of domestic standards

Corporate Tax Planning

- To identify the difference between tax evasion and tax planning.
- To describe the provisions in the corporate tax laws that can be used for tax planning.
- To explain different types of incomes and their taxability and expenses and their deductibility
- To outline the corporate tax laws
- To state the use of deductions of expenses to reduce the taxable income.

Financial Institutions

- Explain the structure and regulation of the financial services industry.
- Demonstrate knowledge of a broad spectrum of financial products and competence in measuring risk exposures of financial institutions.
- Demonstrate critical thinking, analytical and problem solving skills in the context of methods of measuring and managing risks faced by financial intermediaries.
- Identify the off-balance-sheet activities of financial institutions.
- Function as a finance team member to address operational risk.

Advertising

- Demonstrate an understanding of the overall role advertising plays in the business world.
- Describe advertising strategies and budgets.
- Identify and compare the various advertising media.
- Describe the operation procedure of an advertising agency.

E- Business

- Characterizes basic business models on the web (b2b, b2c, c2b, c2c) with examples of their implementation
- Characterize basic marketing techniques and strategies on the internet, including analysis of their effectiveness
- Characterize basic personalization mechanisms for websites (cookies, logs) and their roles in gathering marketing information
- Analyze data on the activity of users in order to make informed decisions as to marketing and business management in the organization and development of the product / service.
- Apply the basic techniques of positioning on the Internet (SEO) in creating the marketing image of the organization as well as the product brand (branding)

Working capital management

- Identify and summarize the essential theories and concepts of modern working capital Management.
- Constitute a comprehensive introduction to basic concepts of working capital management.
- Apply the theories learned to the real world and use them in short-term financial decision making.

Strategic Management

- Identify the forces impacting on corporate and business strategies.
- Be critically aware of factors involved in strategy making.
- Assess the resources and constraints for strategy making in a business context
- Explain the importance of social, economic and political forces; and technological
- Investigate the impact of internationalization on strategy making.

Management Practice and Organization Behaviour

- Analyze individual and group behaviour, and understand the implications of organizational behaviour on the process of management.
- Identify different motivational theories and evaluate motivational strategies used in a variety of organizational settings.
- Evaluate the appropriateness of various leadership styles and conflict management strategies used in organizations.
- Describe and assess the basic design elements of organizational structure and evaluate their impact on employees.
- Explain how organizational change and culture affect working relationships within organizations.

Managerial Economics

- Apply economic principles to management decisions.
- Explain the basic forces governing the operation of competitive markets.

- Analyze the implications of various elasticities of consumer demand for pricing and location decisions.
- Characterize consumer and worker preferences and constraints. Analyze implications for employee compensation packages.
- Quantify the determinants of consumer demand.
- Distinguish relevant from irrelevant costs for economic decision-making.
- Determine how a firm with pricing power should exercise it.
- Determine if and how a firm can engage in price discrimination or implement two-part pricing.
- Analyze the factors that determine the supply and demand for productive inputs.

Accounting for Managers

- Describe and develop the nature and role of the four principal financial statements (i.e., the Income Statement, the Statement of Financial Position, the Statement of Cash Flows, and the Statement of Changes in fundamental accounting principles)
- Ability to read, interpret and analyse financial statements; combine financial analysis with other information to assess the financial performance and position of a company;
- Apply course concepts to analyse common business management Equity);
- Develop the accounting process and decisions such as pricing and outsourcing decisions from a financial perspective;
- Describe the role of budgets in organisations, their limitations and the behavioural issues to consider when developing and using budgets for planning and control;

Environment Management

- To analyze environmental management in relation to the major principles of sustainable development, defined broadly as: Biodiversity conservation; The Precautionary Principle; Economic sustainability; Intergenerational equity; and Intergenerational equity.
- To translate generic concepts and methods into critical reviews of contemporary, realworld environmental management practices.
- To critically assess theoretical and conceptual issues relating to environmental management.

Computer Applications

- Applying the fundamentals of information systems used in business,
- Demonstrates appropriate use of computers (hardware) and software applications (e.g. Microsoft Office Suite, Word processing, Cloud services, etc.) in a professional business environment.
- To organizes and communicates computer technology and technical concepts, processes, thoughts, ideas, and information effectively.

- The student is able to identify, repair, and upgrade computer technology systems.
- Apply problem solving skills using experience gained from research assignments, individual and group projects, and troubleshooting processes and practices.

Optimization Techniques

- Describe clearly a problem, identify its parts and analyze the individual functions.
- Feasibility study for solving an optimization problem
- Apply mathematical translation of the verbal formulation of an optimization problem.
- Design algorithms, the repetitive use of which will lead reliably to finding an approximate solution
- Evaluate and measure the performance of an algorithm.
- Discovery, study and solve optimization problems.

Human Resource Management

- Explain the importance of human resources and their effective management in organizations
- Demonstrate a basic understanding of different tools used in forecasting and planning human resource needs
- Describe the meanings of terminology and tools used in managing employees effectively
- Describe rules and regulations affecting employees and employers
- Analyze the key issues related to administering the human elements such as motivation, compensation, appraisal, career planning, diversity, ethics, and training

Financial Management

- Apply the theoretical and practical role of financial management in business corporations.
- Analyse the finances of individual corporations both in terms of their performance and capital requirements
- Evaluate the role and importance of shareholders within modern corporations
- Explain the importance of risk within the context of financial decision making
- Access financial information from a wide variety of sources and use this information to research and assess corporations

Marketing Management

- State the role and functions of marketing within a range of organisations.
- Describe key marketing concepts, theories and techniques for analysing a variety of marketing situations.
- Identify and demonstrate the dynamic nature of the environment in which marketing decisions are taken and appreciate the implications for marketing strategy determination and implementation.
- Analyse the relevance of marketing concepts and theories in evaluating the impacts of environmental changes on marketing planning, strategies and practices.
- Demonstrate the ability to justify marketing strategies and advocate a strategically informed position when considering marketing plan implementation.

Production and Operation Management

- Explain the importance of quality control.
- Apply techniques to measure quality control.
- Demonstrate a basic understanding of the problems of waiting lines.
- Apply the quality tools such as the principles of just-in-time systems.
- Explain the importance of forecasting.
- Demonstrate the ability to apply some mathematical forecasting techniques.
- Solve the problems involved in inventory management.
- Apply the principles underlying materials requirements planning.
- Develop basic materials requirement schedules.
- Develop the concepts of operations scheduling.

Business Legislation

- Describe the national and international legal system and the legal environment of business.
- Describe the relationship of ethics and law in business.
- Define relevant legal terms in business.
- Explain basic principles of law that apply to business and business transactions.
- Describe business law in the global context.
- Describe current law, rules, and regulations related to settling business disputes

Corporate Governance

- Compare and analyse the corporate governance issues involved in business and the workplace.
- Compare and analyse the role of stakeholders and corporate managers' moral obligations in business decision making
- Apply regulatory requirements to develop appropriate board and committee functions and structures

• Analyse and explain economic, social and environmental sustainability issues relating to business practice

International Business Management

- Identify and evaluate the complexities of international business and globalization from home versus host-country, and regional, cultural perspectives.
- Analyze the relationships between international business and the political, economic, legal and social policies of countries, regions and international institutions.
- Analyze current conditions in developing emerging markets, and evaluate present and future opportunities and risks for international business activities.
- Develop a framework to support successful decision-making in all relevant functions and activities of any international business or international operations of a domestic business within the competitively international environment.

Ethics in Management

- Use contemporary and classical frameworks to analyze and suggest resolutions to ethical dilemmas.
- Identify and address common ethical issues that arise for individuals, managers, and organizations.
- Recognize individual differences and cognitive barriers that influence ethical judgment.
- Identify key organizational tools, policies, systems, and laws that apply to managing ethical conduct specifically in the business environment.
- Identify and prioritize personal values and apply those to making ethical decisions.
- Explain organizational and cultural variables that influence ethical conduct.