

Course Code	Course Title	L	T	P	C
OLMBA508	Operations Management	3	1	0	4
Pre-requisite	NIL	Syllabus version			
		1.0			
Course Objectives:					
1. Imparting the important decision-making areas in Operation Management. 2. Use different tools and techniques to solve general operational problems. 3. Providing an introductory concept of sustainability in operations management. 4. Assess the importance of preventive measures and formulate maintenance strategy to reduce loss and improve quality.					
Course Outcomes:					
1. Understand the key concept of the strategic role of operations management 2. Design the product and process. 3. Use different tools and techniques to manage and control the operations. 4. Understand sustainability in operations management.					
Module:1	Introduction				
Definition, Goods and services, Objectives, Interrelationship with other functional areas of business, Achieving Competitive Advantage through operations, Role of operations strategy.					
Module:2	Demand Forecasting				
Types of forecasts, needs of demand forecasting, Types of demand forecasting techniques, Time-series forecasting - Naive Approach, Moving Averages, Exponential Smoothing, Exponential Smoothing with Trend Adjustment, trend-projection. Associative Forecasting Methods - Regression and Correlation Analysis.					
Module:3	Product Design, Process Analysis and Job Design				
Product life cycle, Product development process, Quality Function Deployment, Make or buy decisions. Types of production processes, Process analysis, Job Design, Work Study, Method Study, Time Study.					
Module:4	Facility Location and Layout				
Importance of location, Factors affecting facility location, Methods for facility locationselection. Types of Layouts – office layout, retail layout, warehouse layout, process layout, product layout, fixed position layout, cellular layout. Assembly Line Balancing.					
Module:5	Capacity and Operations Planning				
Design and Effective Capacity, Demand and Capacity Management, Bottleneck Analysisand the Theory of Constraints, Break-Even Analysis. Sales and Operations Planning, Lot Size, Economic Order Quantity, Master Production Schedule, Material Requirement Planning.					
Module:6	Quality and Lean Operations				
Quality concept, Total Quality Management (TQM), TQM tools, Statistical Process Control,Lean Operations, Just in Time (JIT).					
Module:7	Maintenance and Sustainable Operations				
Operations Maintenance, Importance, Different types of maintenance, Total productivemaintenance. Sustainability, Triple bottom line (TBL).					
		Total Hours		120 Hrs.	

Text Book(s)			
1.	Jay Heizer, Barry Render (2017), Operations Management, 12th Edition, Pearson Education.		
2.	Robert S.Russell, Bernard W.Taylor, (2013), Operations Management, 8th edition, Wiley.		
3.	Collier, Evans, Ganguly(2016), OM-Operations Management , Cengage Learning.		
Reference Books			
1.	R. Dan Reid, Nada R. Sanders (2020), Operations Management: An Integrated Approach, 7th Edition, Wiley		
2.	R. Dan Reid, Nada R. Sanders (2020), Operations Management: An Integrated Approach, 7th Edition, Wiley		
3.	Richard B. Chase, Ravi Shankar, F. Robert Jacobs (2018), Operations and Supply Chain Management, 15th Edition, McGraw Hill		
Mode of Evaluation: Quiz/ Assignment/CAT/FAT			
Recommended by Board of Studies		02-11-2023	
Approved by Academic Council		No. 72	Date: 13-12-2023