LOG	ISTICS AND SUPPLY CHAIN M	IANAGEMENT	
Course Code	20MBAMM402	CIE Marks	40
Teaching Hours/Week (L:T:P)	3:0:0	SEE Marks	60
Credits	03	Exam Hours	03

#### **Course Objectives**

- To understand the basic concepts, processes and key elements of a supply chain.
- To understand the elements and scope of logistics in supply chain management
- To provide insights for establishing efficient, effective, and sustainable supply chains.
- To comprehend the role of warehouse management 4.
- To gain knowledge about Inventory Management 5.
- To provide insights into International Logistics
- To explain the role of technology in supply chain planning, visibility, and execution.

## Module-1 Supply Chain

7 hours

Concept, significance and key challenges. Scope of SCM- historical perspective, essential features, decision phases - process view, supply chain framework, key issues in SCM and benefits.

Definition and scope of Logistics. Elements of Logistics, types, incremental value delivery through Logistics management. Innovations in Supply Chain. Estimating customer demand, forecasting in Supply Chain.

# Case Study.

# Module -2 Warehouse Management System

Warehousing - scope, primary functions. Efficient Warehouse Management. Types of Warehouse. Warehouse Layout Design, criteria. Warehouse Management System,

Distribution Management, Designing the distribution network, role of distribution, factors influencing distribution, design options, distribution networks in practice, network design in the supply chain, factors affecting the network design decisions. HUB & SPOKE vs Distributed Warehouses. Case Study

# Module -3 Inventory Management

7 hours

Concept, various costs associated with inventory, EOQ, buffer stock, lead time reduction, reorder point / re-order level fixation, ABC analysis, SDE/VED Analysis. Goals, need, impact of inventory management on business performance. Types of Inventory, Alternative approach for classification of inventories, components of inventory decisions, inventory cost management, business response to stock out, replenishment of inventory, material requirements planning.

Dealing with demand uncertainty in Supply Chain- managing uncertainty in Supply Chain, (Bullwhip Effect) Impact of uncertainties. Case Study

### Module -4 Transportation

5 hours

Role, functions, mode of transportation and criteria of decision. Transportation Infrastructure. Factors impacting road transport cost, hazards in transportation, State of Ocean Transport, global alliances.

Packaging Issues in Transportation, role of containerisation. Case Study

# Module -5 Logistics Management

7 hours

Logistics of part of SCM, logistics costs, logistics, sub-systems, inbound and out bound logistics bullwhip effects in logistics, distribution and warehousing management. Demand Management and Customer Service: Demand Management, CPFRP, customer service, expected cost of stock outs.

Recent Issues in SCM: Role of computer/ IT in supply chain management, CRM Vs SCM, Benchmarking concept, features and implementation, outsourcing - basic concepts, value addition in SCM.

# Case Study

### **Module - 6 International Logistics**

7 hours

Logistics and Environment, Methods and tools facilitating International Logistics, challenges, Integrated Supply Chain and Logistics Value Chain, Supply Chain Security Initiatives in the USA, Logistics Industry in India. Sourcing Decisions in Global SCM- Logistics, trends, Key issues in Global sourcing, Factors influencing Outsourcing. Performance Management in Supply Chain introduction. Case Study

#### Course outcomes:

The student should be able to:

- Demonstrate knowledge of the functions of logistics and supply chain management.
- To relate concepts and activities of the supply chain to actual organizations.
- Highlight the role of technology in logistics and supply chain management. 3.
- Evaluate cases for effective supply chain management and its implementation.

#### Practical Components:

- Students are expected to choose any four Indian Organizations and study their supply chain in terms of drivers of the Supply chain and submit a report.
- Students should visit different logistics companies and understand the services provided by them and submit
- Students should identify any product/service and study the type of distribution system used and understand the reason for using that particular type and present it in the class.
- Students should identify the various types of IT applications employed by Indian Organizations in their Supply chain

#### CO-PO MAPPING

СО	PO				
	PO1	PO2	PO3	PO4	PO5
CO1	X				
CO2	X		X	X	
CO3	X				X
CO4	X			X	

# Question paper pattern:

The SEE question paper will be set for 100 marks and the marks scored will be proportionately reduced to 60.

- The question paper will have 8 full questions carrying equal marks.
- Each full question is for 20 marks.
- Each full question will have sub question covering all the topics under a Module.
- The students will have to answer five full questions; selecting four full question from question number one to seven and question number eight is compulsory.
- 100 percent theory in SEE

SI No	Title of the book	Name of the Author/s	Publisher Name	Edition and year
1	A Logistic approach to Supply Chain Management	Coyle, Bardi, Longley	Cengage Learning	Latest edition
2	Integrated Supply Chain and Logistics Management	Rajat K. Baisya	Sage	2020
3	Supply Chain Management- Text and Cases	Janat Shah	Pearson	Latest edition
4	Supply Chain Management- Strategy, Planning and Operation	Sunil Chopra, Peter Meindl, D.V.Kalra	Pearson	Latest edition
5	Marketing Channels	Anne Coughlan, Anderson, Stern and El-Ansary		

1	The Box	Marc Levinson		
2	Essentials of Supply Chain Management	Michanel H Hugos		
3	Logistics and Supply Chain	Martin Christopher	FT Publishing	5 <sup>th</sup> Editon
4	Supply chain Logistics Management	Donald J Bowersox,	Mc Graw Hill	4 <sup>th</sup> Edition

