Course Code: 11BB22CD Course Title: PRODUCTION AND SERVICE OPERATIONS MANAGEMENT

Objective:

- 1. To gain an understanding of the Production and Operations function for manufacturing and service organizations.
- **2.** To understand the importance of materials functions in the overall manufacturing environment and learn to use the tools and techniques for materials planning & control

Detailed Curriculum:

Unit I: Introduction to Production management, nature and scope of production management, production function, forecasting.

Unit II: Product design, process design, production planning and control-aggregate planning, shop floor planning.

Unit III: Plant location-factors influencing facility location, location models; plant layout-types of plant layouts, factors influencing Layout decisions, materials handling-materials handling equipment.

Unit IV: Quality control-SQC, control charts, acceptance sampling; methods engineering; plant maintenance-types of plant maintenance.

Unit V: Materials management: materials planning, purchasing, purchasing policies, storage, internal organization, Inventory management: Costs associated with inventory, EOQ models.

Recommended Text Book(s):

1. Norman Gaither and Greg Frazier, (2008) Operations Management: Ninth International Student Edition, South-Western, Thomson Learning Inc.

Recommended Reference Books:

- 1. EVERETT E. ADAM Jr. and RONALD J. EBERT, Production and Operations Management: Concepts, Models and Behaviour, 5th Edition 2009
- 2. S N Chary, Production and Operation Management, Tata McGraw-Hill Company, New Delhi.