

Discipline: Business

Degree Credit [X]
Non Credit []
Nondegree Credit []
Comm Service []

Riverside Community College District Integrated Course Outline of Record

Business 80

College: R_X_ M_X_ N_X_

Lecture Hours: 54

BUS-80: Principles of Logistics

Lab Hours: 0

Units:3.00

COURSE DESCRIPTION

Prerequisite: None.

An introduction to the management of business logistics functions including purchasing, inventory management, transportation, warehousing and their related technologies. Focus is on integration of logistics functions to improve overall supply chain customer service and cost performance. 54 hours lecture.

SHORT DESCRIPTION FOR CLASS SCHEDULE

An introduction to the management of business logistics with a focus on integration of functions (transportation, warehousing, purchasing, etc.) to improve overall supply chain performance.

ENTRY SKILLS

None.

STUDENT LEARNING OUTCOMES

Upon successful completion of the course, students should be able to:

Compare key roles and objectives of the logistics disciplines (warehousing, transportation, service contracting, purchasing, global logistics, etc).

- Breadth of Knowledge - Understand the basic content and modes of inquiry of the major knowledge fields
- Critical Thinking - Integrate knowledge across a range of contexts

- Application of Knowledge - Maintain and transfer academic and technical skills to workplace

Explain the reasons for logistics' recent growth in importance.

- Critical Thinking - Construct sound arguments and evaluate arguments of others
- Application of Knowledge - Maintain and transfer academic and technical skills to workplace
- Critical Thinking - Integrate knowledge across a range of contexts
- Breadth of Knowledge - Understand the basic content and modes of inquiry of the major knowledge fields

Analyze points of interaction between logistics and other departments within a business organization.

- Breadth of Knowledge - Understand the basic content and modes of inquiry of the major knowledge fields
- Application of Knowledge - Maintain and transfer academic and technical skills to workplace
- Critical Thinking - Analyze and solve complex problems across a range of academic and everyday contexts

Relate the impact on profitability of effective logistics planning.

- Critical Thinking - Construct sound arguments and evaluate arguments of others
- Breadth of Knowledge - Understand the basic content and modes of inquiry of the major knowledge fields
- Application of Knowledge - Maintain and transfer academic and technical skills to workplace

Recognize and demonstrate aspects of product distribution that are critical to customer satisfaction.

- Breadth of Knowledge - Understand the basic content and modes of inquiry of the major knowledge fields
- Communication Skills - Write with precision and clarity to express complex thought
- Information Skills - Locate, evaluate and use information effectively
- Application of Knowledge - Maintain and transfer academic and technical skills to workplace

Describe mathematical techniques used to model and analyze (simulate, optimize, etc.) supply chain business problems such as network design and facility location.

- Breadth of Knowledge - Analyze experimental results and draw reasonable conclusions from them
- Breadth of Knowledge - Use the symbols and vocabulary of mathematics to solve problems and communicate the results
- Breadth of Knowledge - Understand the basic content and modes of inquiry of the major knowledge fields

Know the types of forecasts that might be needed (e.g. time series trend or seasonal), and how these projections are applied.

- Breadth of Knowledge - Understand the basic content and modes of inquiry of the major knowledge fields
- Breadth of Knowledge - Use the symbols and vocabulary of mathematics to solve problems and communicate the results
- Breadth of Knowledge - Analyze experimental results and draw reasonable conclusions from them

COURSE CONTENT

1. Supply Chain and Logistics Management Overview
 - a. Forces Driving the Rate of Change
 - b. The Supply Chain Concept
 - c. Inventory Deployment
 - d. Cost/Value
 - e. Organizational Relationships
 - f. Performance Measurement
 - g. Supply-Chain Security
2. Role of Logistics in Supply-Chain
 - a. Logistics Activities and Scope
 - b. Logistics in the Firm and Economy
 - c. Logistics Interfaces with Other Areas
 - d. Materials Management vs. Physical Distribution
 - e. Logistics Channels
 - f. Cost Perspective
 - g. Levels of Optimality
3. Global Dimensions of Supply-Chains
 - a. Operating in Low-Cost Regions
 - b. Scope and Magnitude of Global Business
 - c. Global Markets and Strategy
 - d. Managing Risk in Global Outsourcing
 - e. Ports
 - f. NAFTA
 - g. Global Transportation Options
 - h. Strategic Channel Intermediaries
4. Supply-Chain/Logistics Relationships
 - a. Types of Relationships
 - b. Need for Collaborative Relationships
 - c. Third-Party Logistics
 - d. Logistics Outsourcing Activities
 - e. Strategic Role of Information Technology
5. Supply-Chain Performance Measurement and Financial Analysis
 - a. Developing Supply-Chain Performance Metrics
 - b. Performance Categories

- c. The Supply-Chain Finance Connection
 - d. Financial Impact of Supply-Chain Decisions
 - e. Supply-Chain Service Implications
6. Supply-Chain Technologies and Information Flows
- a. The role of information in the Supply-Chain
 - b. Information Requirements
 - c. Information Technology Capabilities
 - d. SCM Software
 - e. ERP Software
 - f. Supply-Chain Technologies Capabilities
 - g. Supply Chain Technology Implementation
7. Demand Management
- a. Balancing Supply and Demand
 - b. Traditional Forecasting
 - c. Factors Affecting Demand
 - d. Forecast Errors
 - e. Sales and Operations Planning
 - f. Collaborative Planning, Forecasting and Replenishment
 - g. Fulfillment Models
 - h. Channels of Distribution
 - i. Direct to Customer Fulfillment
8. Order Management and Customer Service
- a. Customer Relationship Management Process
 - b. Order Management and Order Fulfillment
 - c. Length and Variability of the Order to Cash Cycle
 - d. E-Commerce Order Fulfillment Strategies
 - e. The Logistics/Marketing Interface
 - f. Elements of Customer Service
 - g. Performance Measures for Customer Service
 - h. Post-sale logistics Support
9. Managing Inventory in the Supply-Chain
- a. Inventory in the U.S. Economy and Firm
 - b. The Importance of Inventory
 - c. Inventory Costs
 - d. Approaches to Managing Inventory
 - e. Uncertainty of Demand and Lead Time
 - f. Materials and Distribution Requirements Planning
 - g. ABC Analysis
10. Transportation-Managing Flow of the Supply-Chain
- a. Role of Transportation in Supply-Chain Management
 - b. Modes of Transportation
 - c. Intermodal Transportation
 - d. Transportation Planning, Strategy and Control
 - e. Decision to Outsource Transportation
 - f. Mode and Carrier Selection
 - g. Shipment Preparation
 - h. Freight Documentation
 - i. Transportation Metrics
11. Distribution-Managing Fulfillment Operations
- a. The role of distribution operations in SC

- b. Distribution Facility Functionality
 - c. Distribution Tradeoffs and Challenges
 - d. Distribution Planning and Strategy
 - e. Network and Facility Design
 - f. Distribution Metrics
 - g. Warehouse Management Systems
 - h. Automatic Identification Tools
12. Supply Chain Network Analysis and Design
- a. Long Range Planning
 - b. Changing Requirements
 - c. Steps in Supply Chain Network Design
 - d. Locational Determinates
 - e. Modeling Approaches
13. Sourcing Materials and Services
- a. Types and Importance of Items and Services Purchased
 - b. Strategic Sourcing Methodology
 - c. Supplier Selection
 - d. Supplier/Vendor Evaluation and Relationships
 - e. Certifications and Registrations
 - f. Total Cost of Ownership
 - g. e-Sourcing
14. Operations-Producing Goods and Services
- a. Role of Production Operations in Supply-Chain Management
 - b. Production Process Functionality
 - c. Operations Strategy and Planning
 - d. Production Metrics
15. Managing Reverse Flows in the Supply-Chain
- a. Returns Management
 - b. Customer Returns
 - c. Environmental Challenges
 - d. Economic Value
16. Strategic Challenges and Change for Supply-Chains
- a. Seven Principles of Supply-Chain Management
 - b. Think Beyond Cost
 - c. Leadership Capabilities
 - d. Transplanting SCM from One Company to Another
 - e. Supply Chain Strategies
 - f. Impact of Collaboration

METHODS OF INSTRUCTION

Methods of instruction used to achieve student learning outcomes may include, but are not limited to:

- Present lectures to describe the principles of logistics management concepts and their applications to business.
- Develop and assign exercises to reinforce concepts and encourage students to apply them to current logistics management trends and events.
- Create and have students participate in cooperative learning tasks such as

small group exercises to identify issues that relate to course content and utilize the content to offer opinions, solutions and analysis with respect to those issues.

- Present case studies to provide students with the opportunity to utilize concepts learned in class to analyze real logistics management situations.
- Develop and assign tasks/activities such as presentations in order to assess students understanding of logistics management concepts.
- Facilitate discussions regarding relevant current issues in business to encourage students to make appropriate connections to the course content.

METHODS OF EVALUATION

Students will be evaluated for progress in and/or mastery of learning outcomes by methods of evaluation which may include, but are not limited to:

- Individual, small group, or paired activities designed to allow students to demonstrate understanding of basic logistics management concepts.
- Quizzes and in-class participation demonstrating proficiency in the subject matter.
- Quizzes designed to assess the student learning outcomes.
- Written reports designed to assess the application of logistics management principles.
- Individual web projects designed to assess student proficiency in achieving the student learning outcomes.
- Individual or class projects designed to evaluate the application of logistics management principles to simulations of real business situations.
- Examination designed to provide objective evidence that students have attained the level of understanding expected in the areas detailed in the Student Learning Outcomes.

SAMPLE ASSIGNMENTS

Outside-of-Class Reading Assignments

- Students are expected to read all assigned chapters from the textbook and other course material in advance of the class covering that material.
- Other outside reading requirements may be assigned as appropriate, and may include journal articles that provide analysis of the business elements that comprise the logistics function.

Outside-of-Class Writing Assignments

- Quizzes/examinations designed to assess student ability to relate the impact on profitability of effective logistics planning.
- Written reports designed to examine the reasons for logistics' recent growth in importance.
- Essays presenting detailed material related to the business elements that comprise the logistics function.

Other Outside-of-Class Assignments

- Individual, small group, or paired activities designed to allow students to demonstrate understanding of aspects of product distribution that are critical to customer satisfaction.
- Individual web projects designed to facilitate student examination of the reasons for logistics recent growth in importance.
- Individual or small group projects designed for students to identify and explain points of interaction between logistics and other departments within a business organization.

COURSE MATERIALS

All materials used in this course will be periodically reviewed to ensure that they are appropriate for college level instruction. Possible texts include:

Coyle, Bardi, & Langley. The Management of Business Logistics: A Supply Chain Perspective. 8th ed. Thomson South-Western, 2009.

Johnson & Wood. Contemporary Logistics. 8th ed. Macmillian Publishing Company, 2004.

Lambert, Stock, Ellram. Fundamentals of Logistics Management. McGraw-Hill, 1998.