

EASTERN UNIVERSITY, SRI LANKA

FACULTY OF COMMERCE AND MANAGEMENT

Third Year Second Semester Examination in Bachelor of Business Administration

Specialization in Marketing Management – 2015/2016

(July/August 2018) Proper

MKT 3063 Supply Chain Management

Answer All Questions

Time:03 Hours

1. Read the following case study and answer the questions given below.

Strategic issues in Supply Chain Management - Leola Milling

Timothy Roberts, distribution manager for Leola Milling, has become increasingly aware that the company has a major problem as it continues to try to reduce inventories while maintaining the levels of service its customer have come to expect.

Company and Product

The company was founded in 1887, Leola Milling has provided high-quality bakery flours to commercial bakeries as well as to the consumer market. While commercial customers tend to have consistent buying patterns as well as brand loyalty, Leola has found that consumers have minimal loyalty but also generally prefer known names over the store brands. Demand is highly seasonal, with the annual peak occurring just before thanksgiving and slacking off dramatically during January and February. To offset this, both Leola and its major supermarket chain accounts run special deals and sales promotions.

Production planning located at the Leola, Pennsylvania, headquarters has responsibility for controlling inventory levels at the plant warehouse at the location Buffalo as well as at the three distribution centers located at Washington, Pennsylvania; Columbus, Ohio; and Pittsfield, Massachusetts. Planning has routinely been based on past history. No forecasting is performed, at least not in a formal sense. Distribution centers are replenished by rail from Buffalo; and lead times are typically seven days, with forty-eight to fifty-four pallets per car depending upon the type used. Should emergencies occur, eighteen pallets can be shipped by truck with a one-day transit time.

Recently Leola has experienced two major stock outs for its consumer-size five-pound sacks of bleached white flour. One of these was due to problems in milling operations; the other occurred when marketing initiated a "buy one, get one free" coupon promotion. Since these events, inventory planning has become overly cautious and errors on the side of having excess inventories at the Distribution centers. Additionally, two other events have affected distribution center throughput:

1. Implementation of direct factory shipments for replenishing the five largest supermarket chains, and
2. A price increase making Leola flour more expensive than its national brand competitors such as Pillsbury or Gold Medal.

Current Situation

Of the 1,500 pallets in the Pittsfield distribution center, Leola shows only 396 pallets for open orders. This has led the company to use outside overflow storage, where there are another 480 pallets. Flour is easily damaged; hence, Leola prefers to minimize handling. Overstocking at the distribution center alone costs \$1.85 per pallet for outside storage, to which must be added \$4.25 per pallet for extra handling \$2.25 per truckload for transportation. Similar scenarios are being played out at the other distribution centers as well.

Possible Solutions

Jennifer Roberts has been contemplating various approaches to solving the inventory issue. Clearly, product needs to be in place at the time a consumer is making a buying decision, but Leola cannot tolerate the overstocking situation and the stress that it is putting on facilities and cash flow.

Jennifer's first thought is that a better information system is needed, one that not only provides timely and accurate information but also extensively shares that information throughout the organization. Several questions immediately come to her mind; however, she needs additional information prior to coming to any solutions.

Questions:

1. Explain the major problems/issues faced by Jennifer Roberts in her company's supply chain management. **(06 Marks)**
 2. Evaluate the alternative solution being considered by Jennifer Roberts to solving the issue in Leola Milling. **(08 Marks)**
 3. What additional solutions do you propose to Jennifer Roberts? And explain why? **(08 Marks)**
- (Total 22 Marks)**

1. Explain the two major scopes of Supply Chain for most firms. **(04 Marks)**
 2. Select a brand based on your choice. Suggest how the physical distribution might be handled at each stage of its life cycle (Product life cycle). **(06 Marks)**
 3. Many of the principles and concepts that guide logistics planning are derived from the unique nature of logistic activities. Briefly explain the six concepts, which are used for logistics strategy formulation. **(09 Marks)**
- (Total 19 Marks)**

1. Define the "KANBAN" system in supply chain management. **(03 Marks)**
 2. What is Virtual warehousing? What is required for it to work well? **(04 Marks)**
 3. "The entire process of filling the customers' orders define as logistic customer service". Briefly explain the three elements of Logistics Customer Service. **(06 Marks)**
 4. "A logistics information system can be described in terms of its functionality and its internal operation". Illustrate the logistics information system with a suitable diagram. **(06 Marks)**
- (Total 19 Marks)**

Q4.

1. Explain the role, the product package plays in Supply Chain Management. (06 Marks)
2. Suggest the possible green initiatives for the following logistics functions of organization.
a) Procurement
b) Distribution
c) Transportation (06 Marks)
3. State different types of international water carriers, which are used by the companies for the international logistic purpose and explain the characteristic of each carriers. (08 Marks)

(Total 20 Marks)

Q5.

1. As a supply chain manager, you would like to compare your company's logistic performance with that of similar companies. Where would you find such benchmark information? (04 Marks)
2. Compare and contrast the Open-Loop control system and Closed-Loop control system in supply chain management along with the usage of suitable diagram. (08 Marks)
3. "The emergence of supply chain management has broadened the scope across which companies make decisions". Graphically illustrate the Framework of Supply Chain Information Technology (SCIT) for an individual firm. (08 Marks)

(Total 20 Marks)