Case Study Series

University of St.Gallen

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CROSSROADS Inc. (Part B): In Need of a Strong Supply Chain in India

Teaching Note

Reference no …

This case was written by Saransh Tyagi and Sandeep Singh (PGP at the Indian Institute of Management Bangalore) and Gopalakrishnan Narayanamurthy (Fellow Program in Management at Indian Institute of Management Kozhikode) with the support of Assistant Professor Dr. Roger Moser (University of St. Gallen). The authors are grateful to the numerous experts that have provided input to this case. It is exclusively intended as the basis for class discussion rather than to illustrate either the effective or ineffective handling of a management situation. The case was compiled from interviews with retail experts in India and publicly available sources. The case was developed without external funding.

St. Gallen, Version 2.2, February 2013

Case Synopsis

For the last few years, India had been one of the most attractive retail destinations worldwide because of its enormous untapped potential. Organized retail was projected to grow by over 40% in the next few years and still to reach just 7% market share of the entire retail industry. CROSSROADS Inc. had entered the Indian retail space with an Indian joint venture partner and Jeff Mitchell, CEO of CROSSROADS Inc., had to develop company's supply chain strategy for India. The initial results had been quite promising and Jeff considered this an ideal opportunity to further invest into the company's Indian supply chain infrastructure in a big way. He wanted to build a robust and agile supply chain to help make the business profitable in the long run.

Target Audience

The target audiences for the case are BSc and MSc students and management trainees who are interested in learning the fresh food supply chain management practices in India and also interested to know how the existing players in market are functioning and competitive advantage in this segment. Students need to have some basic understanding of the supply chain concepts with special reference to fresh (perishable) products, challenges of doing business in emerging markets and country specific FDI regulations with special reference to India.

Case Objectives

To offer students a better understanding of:

- The Indian retail Industry: current landscape, regulations and future opportunities
- The Indian supply chain infrastructure: current state, evolution over the years, areas of concern and potential investment opportunities
- Possible supply chain strategies to meet the requirement of the fresh food retail industry in India

Teaching Plan

The faculty might first introduce/repeat the key concepts of supply chain management and issues associated with fresh food (perishable products) supply chain in India. This can happen prior to the case study session.

In a second step, the faculty might discuss the actual case with the class depending on the way the class is used to prepare/discuss a case study. The faculty might highlight the following characteristics:

- Retail formats in India
- Major food retailers in India
- Influence of Indian government regulations on business operations

- Logistics and supply chain issues in India with special reference to food supply chain
- Existing procurement and supply models in India
- Status of cold storage facilities in India

Three assignment questions and two discussion questions listed below can help in having a defined flow of presentations by different groups of students or discussions in the plenum. Each assignment question can be presented (approx. 10 min) and discussed (approx. 20 min) along with the discussion questions thereby allowing the class to complete the case analysis and discussion in approximately 90-120 min.

Question/Assignment 1: What is the format chosen by CROSSROADS Inc. to enter the Indian retail market?

Question/Assignment 2: What are the key areas of concern and potential investment opportunities for CROSSROADS Inc. to enter as a supply chain (back end) partner in India?

Question/Assignment 3: What is a possible supply chain strategy for CROSSROADS Inc. focusing on the fresh food retail industry in India?

Case Analysis Notes

Question/Assignment 1: What is the format chosen by CROSSROADS Inc. to enter the Indian retail market?

This question/assignment could build the bridge to the first part of the case study "Crossroads Inc.: Entering the Indian Retail Market" (A) where Jeff Mitchell had to decide whether and how to enter the Indian retail market for fresh foods. The idea is that the students understand why CROSSROADS Inc. had chosen the joint venture alternative.

CROSSROADS Inc. could either incorporate the Cash & Carry format or enter into a joint venture with an Indian retailer. However, the Cash & Carry is a risky proposition as it has no previous experience of the Indian market. The dynamics of the Indian market is very different from the dynamics of the European retail industry. Infrastructure, competition from unorganized sectors, consumer acceptance, real estate cost and lack of trained manpower posed great challenges.

Opening stores through franchisee is also not a viable option. CROSSROADS Inc., though being a big brand in Europe, is not a well-known brand in India. Going through this route would also mean that the company would have little control over its market as it would not be directly attached to its consumers. It would also have to share its profits with the franchisee owners.

Therefore, a better strategy might be to enter the Indian market in partnership with an Indian player. There are two options available for CROSSROADS Inc. in such a scenario:

1. **A strategic license agreement with an Indian player**: SPAR, the Dutch retailer has entered India through this route. CROSSROADS Inc. would enter into a licensing agreement with a domestic retailer or partner with an Indian promoter owned company. This shall also allow the company to use its brand name and would help in marketing its retail chains. In such an agreement the investment will be done by the Indian player which will invest in the CROSSROADS Inc. branded retail outlets. The terms of the licensing agreement would include the profit sharing model.

Although, this model would help CROSSROADS Inc. gain an entry into the Indian Retail industry, the operations would still be controlled by the Indian company both at the front and backend. CROSSROADS Inc. would just be using its brand name in the industry.

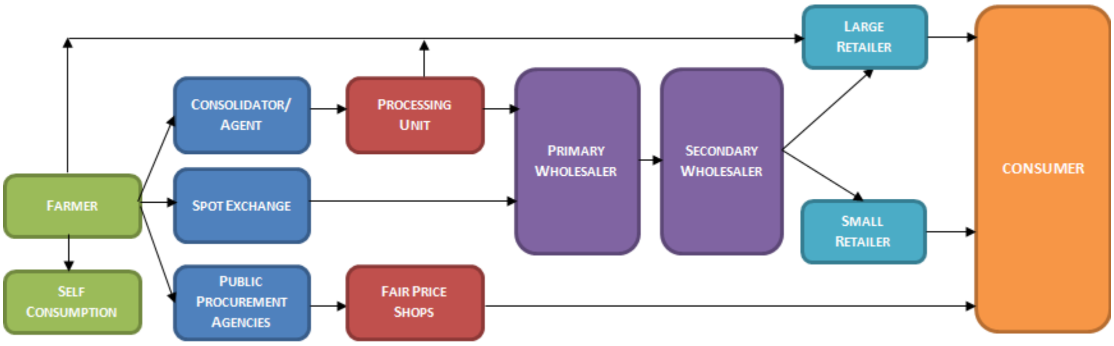
2. **A joint venture**: Wal-Mart, world's biggest retailer has entered India through this route by partnering with India's leading telecom provider *Bharti*. CROSSROADS Inc. would enter into an agreement with an Indian player to setup the retail network. FDI of 100% is allowed in the backend with the total investment restricted to 49% of the total in the venture.

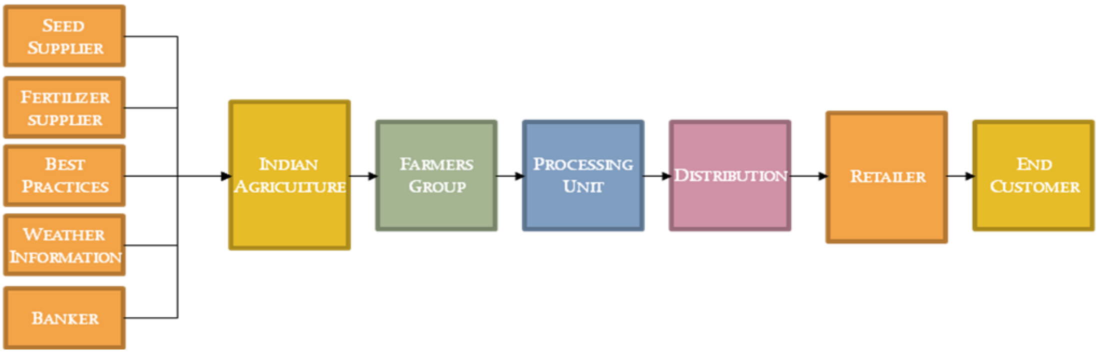
This might be a better route for CROSSROADS Inc. to enter India as such a venture would help it get a better understanding of the Indian market and its consumers. CROSSROADS Inc. can use its vast experience in the industry to establish the backend supply chain network for the retail outlets. There are large business houses in India who might be interested in joining hands with one of the most successful retailer in Europe, enter the lucrative Indian retail market and take care of the front end leaving the backend issues for the more experienced player to handle.

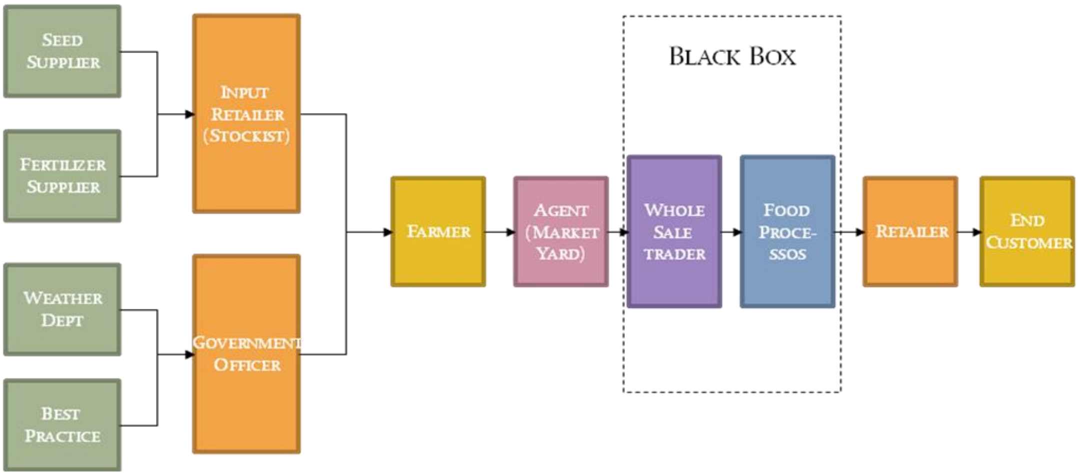
In **PART A** (*CROSSROADS Inc.: Entering the Indian Retail Market*) Jeff had decided to enter the Indian retail market with an Indian joint venture partner called *Sigma Retail.*

Question/Assignment 2: What are the key areas of concern and potential investment opportunities for CROSSROADS Inc. to enter as a supply chain (back end) partner in India?

The diagrams below show various supply chain structures existing in the Indian retail market in 2009.







Areas of Concern

While the face of retail was sparkling, the backbone of retail was less than attractive. There was simply not enough space to store everything that the Indian consumers wanted to buy and the warehousing space that existed was often not of sufficient quality. Products to be sold in gleaming, temperature controlled hypermarkets and megamalls had to be stored first in cramped and leaky sheds. This was particularly disturbing as 60% of India's retail market comprised of food and grocery. Clearly, the greatest challenge to the long-term vitality of India's fresh food retail industry was the creation of a robust distribution infrastructure. Supported by pro-business state governments and improving transportation infrastructure (access to roads, ports, airports and rail), demand for warehousing was strong, particularly in major cities such as Mumbai, Delhi, Chennai, Kolkata, Bangalore and Pune. Moreover, the supply of modern warehouse space was tight and the market growth rate was outpacing the retailers' ability to build their own warehouse so that the demand for warehouse space to lease was particularly acute.

Potential investment opportunities

The key area of concern for all the process partners including retailers had been the inefficiencies being faced by them in handling the supply chain and logistics. The retailing business was very difficult to imagine without an efficient supply chain. In fact, success would be miles away as inefficient supply chains would never allow the retailers to operate with sufficient margins. Normally, the margins in the retailing business are so thin that one cannot afford to have high operational cost for a longer period of time. Thus, the growth of a retailing business can get restricted by inefficient supply chains. Basically every step in the retail supply chain offered room for investments and improvements in India.

In short, areas of concern in managing the supply chain in the Indian retail industry were as follows.

The lack of transportation infrastructure was a big challenge in India. India's government was investing billions of dollars into its highway system but due to the growing middle class and booming car sales, the roads were getting highly congested. Eventually, many companies thought that trucks fitted with radio or satellite transmitters that would allow a central control room to track locations and cargo which would be a strong improvement over traditional methods like bullock carts and tractors. However, permanent traffic congestions and missing acceptance of new technologies among truck drivers made transportation a real challenge in India.

Power imbalances along the supply chain: Margins were not efficiently distributed and a lot of oversupply of some type of goods and undersupply of other goods existed. Still today, middle men were the most powerful in the retail supply chain.

There was also a huge ***unorganized sector*** with little monitoring and low tax collections. The unorganized sector in the perishable good market was large than 90% in India. As a result, the supply chains were decentralized and inefficient. Goods did not move quickly and got accumulated at various points in the supply chain thus often resulting in a deterioration of the goods, loss of quality to consumers and profits to companies.

Cold chain and refrigerated transport shortage was one of the major challenges in India and only 10% of the agricultural goods had access to cold storage facilities. Private markets dominated this industry though state owned players were also present. Cold chain storage in India could be described as unorganized and fragmented resulting ininefficient capacity utilization, lack of logistical support and high operating and capital cost.

Question/Assignment 3: What is a possible supply chain strategy for CROSSROADS Inc. focusing on the fresh food retail industry in India?

How can a company like CROSSROADS Inc. develop and implement an efficient and effective supply chain in India? – With partners!

Example: Shopper's Stop:

The pioneer into the Department Store format, Shoppers' Stop has developed the following strategies:

- Real time inventory optimization and demand tracking through technology integration
- Leverage the elasticity of demand at point of sale by dynamic pricing models
- Reduced distribution time and enhanced control through backward integration
- Summary of the Problems and the Strategic Steps taken

Problem Area	Strategic Step Taken	Impact on Operations
Delivery from the suppliers to the DCs – High distribution cost, irregular supply of the merchandise.	Delivery Authorization System Intake Consolidation.	Smooth and less costly process of delivery Fasten the process of inventory handling No pile up of stocks at DC
Right availability of merchandise at the front end	Auto Replenishment System (ARS) Warehouse Management System (WMS)	Minimized the replenishment order time Minimized the replenishment process Reduction in turnover time
High turnaround time in SCM	Source Tagging Direct Store Delivery	Reduced the turnover time by at least 36 hrs Savings in distribution expenses
High Inventory handling and monitoring cost and complicated process	Perpetual Inventory Control System (PICS) Direct Store Delivery	Entire stock taking process for one department (brand) done in a quarter instead of one year Saving of executive time and expenses done earlier for manual scan of the department Ease in monitoring and handling of inventories
Lack of visibility and velocity of information throughout the supply-chain.	B2B module Source Tagging	Increased vendors and suppliers efficiency in responding to the changing demand Saving of executive time Increased visibility and velocity of merchandise information e.g. stock, sales, payment etc.

Example: Amul's way:

Amul followed a simple three step strategy to improve the supply chain and distribution which can be summarized as follows.

- Information and benefit sharing across the supply chain
- Focus on core competencies of each players in the chain and develop them
- Use of technology for effectiveness

Following are the key cold chain practices being followed by Amul:

- To ensure availability of cold storages closer to the major markets, organization creates their own cold stores across the country.
- Ensures temperature controlled distribution and storage system right from the point of procuring milk to distributing final products to the distributors and retailers for end users' consumption.
- Uses professional 3PL service providers for procurement of milk from village co-operatives and distributing the final product as well. Provides sufficient and regular training and information for better enabling them to fulfill the needs and expectations of the organization.
- In total there are nine manufacturing plants across the country for Ice-cream, for the same the milk is procured various village level cooperatives and stored in bulk chillers. From here the milk is transported to the manufacturing units where it is converted in to ice-cream.
- Once ice-cream is ready, it is sent to more than 40 depots across the nation through refrigerated vehicles, with temperature constantly maintained at 20 degree Celsius. From here ice-cream is sent to the distributors who have their own cold storage facilities in their warehouse. And then ultimately it is sent to the retailers including exclusive retail outlets.
- In order to avoid the risk of temperature abuse and thermal shock[1], instead of using electronic thermometer for recording temperature during dispatch and receipt of ice-creams at transfer points, it has introduced data loggers which are fitted in the vehicles and depots and are set to record the temperature at regular intervals. Based on the recorded information a chart is prepared later on so that variations in temperature can be monitored.
- To tackle the temperature maintenance at retailer level, organization decided to go against the flow of providing deep freezers to the retailers as it has a large number of retailers across the country. It introduced 'Hamara Apna Freezer'[2] Scheme under which it persuaded the retailers to buy the refrigeration units form selected vendors at

[1] Thermal shock is the name given to melting of ice-cream as a result of rapid temperature change occurred during transfer and shifting at various nods in supply chain.
[2] A Hindi word which means: our own freezer.

a negotiated price. It also helped in ensuring that the retailers are using standardized equipment's for maintaining the desired temperature level and let the ice-cream intact.

Example: Baskin Robbins (Packaging)

For products like ice-cream, packaging too plays a greater role in assuring the intactness at the time of consumption. It should have such barrier properties that protect the ice-cream from heat, air and moisture. Following are few practices followed by Baskin Robbins in packaging of Ice-cream.

- For primary unit packs where the packaging material is in direct contact with the ice-cream, food grade materials such as BOPP (Bi-axially Oriented Polypropylene) films and sheets, poly-laminated material and papers etc. are used.
- At manufacturing point, ice-cream is dispatched from freezers to cup filling machines. Once the cups are filled, they are semi-automatically put in four liter mini cartons made of duplex board and then they are stored in cold rooms.
- Then from that point, in one master carton made of craft paper, 12 such mini cartons are placed manually in to air locked vehicles. At this level minimum temperature level of one to four degrees Celsius is maintained.

Thus, ice-cream being a product requiring high level of hygiene and care, requires to be given sufficient attention towards packaging as at retail points or at any other nods in a distribution chain, in case the cold chain gets interrupted, the ice-cream remains set only.

Example: Nirula's Way of Handling Inventories in a Cold Chain

In products like ice-creams, where both raw material and the final product are of highly perishable nature, there should be almost no or low pile up of inventories at any level in a cold chain. The industry standard for the average time between procuring milk and initiating the process of making ice-cream should be less than 6 to 8 hours.

- Milk cannot be stored for a longer period of time, but other items which are used in making ice-cream and have conserved properties like cream and milk powder; and during high demand period the stored ingredients are used. This is how fluctuations in demand can be met.
- Sales based forecasting is done for the procurement of items like skimmed milk powder etc. and the same is purchased for a full year. This also helps in meeting market demand and maintaining product consistency.
- Proper match between market demand and production is done on a daily basis to avoid stock pile up.
- Other ingredients like chocolates, nuts, dry fruits, syrups, colors etc. are also bought in advance and stored for the peak demand period.

This is how inventory management, which is a key issue in maintaining cold chain in an industry where perishable nature of raw material and final goods makes it pretty expensive to have the inventories piled up, should be handled.

Example: Mavalli Tiffin Rooms or MTR (as it is popularly known) Foods Ltd

The distribution network of MTR is fairly simple. It uses professional 3PL services providers for the transfer of the raw materials and the finished products, which in turn reduce a lot of pressure and burden, form the company's head.

The supply chain tree at MTR is fairly simple. The customers pull the entire supply chain by raising the demand for the products which in turn is satisfied by the shop owners who receive the goods from the vendors. Vendors (Distributors) do receive it from the manufacturers through the Carrying and Forwarding agents. The order is placed by the shop owners for sale in the local markets based on the previous sales data.