The Juice Trade in the Americas

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Cargill owns two orange processing plants in Brazil, one in Florida, and one in Pakistan. For apple, we have a processing plant in Chile. As well as the processing plants, we have port facilities in Japan, New Jersey, and Amsterdam; and multiple fruit juice blending facilities in Florida and Amsterdam. We sell juice and juice based products into Eastern, Central, and Western Europe; the Middle East; Asia; Australia; and North and South America.

Orange is the single largest flavor for juices and drinks worldwide. The U.S. is the single largest consumer worldwide, followed by Europe (Germany). Unlike apple juice, a majority of the orange juice produced worldwide originates from only two locations, Florida and Brazil. Together Florida and Brazil account for over 85% of worldwide production.

Florida is the predominant supplier of orange juice to North America. Europe, being the second largest consumer, has very little domestic supply of orange juice and is heavily dependent upon imports to fulfill demand. Brazil, having a relatively small domestic market for FCOJ, is the major worldwide supplier of FCOJ (excluding the U.S.). In the U.S. Brazil would be considered a residual supplier, consisting of the margin between Florida production and total U.S. demand.

In the early 1980's Brazil surpassed Florida as the largest producer of oranges in the world. Currently, the orange crop in Brazil is 60-70% larger than Florida. Annually, Brazil processes around 250 million boxes of fruit, of which over 80% is processed by the largest four processors. Compared to Florida, Brazil processes more fruit by a fewer number of companies. Thus, the largest processors in the world are processors in Brazil, and benefit from an economy of size.

Fruit production costs in Brazil are lower than they are in Florida. Most of the costs savings are due to lower land and labor costs and a per pound solid basis.

Comparing the costs of production, Brazil’s average delivered-in cost for fruit is approximately half of the cost in Florida. However, the U.S. imposes a duty on imports of range juice. Currently the duty, is about $0.32 per pound solid ($0.0878/SSL). The duty effectively causes Brazil to be only a residual supplier to the U.S.

Exports

Because Brazil exports virtually all of its production, it has a very efficient transportation system. Almost all of the shipments from Brazil to Europe are in bulk. With shipments to other destinations in drums. There are two companies in Brazil which can ship in bulk to Japan, as well. This transportation system, also, allows the transportation costs from Brazil to the Northeast and Canada to be basically equivalent to the trucking costs from Florida to same locations.

Brazil dominates the world export market for orange juice. The market in Brazil is more concentrated than in Florida. The four largest concentrate processors in Brazil represent approximately 75% of the industry, whereas the 4 largest concentrate processors in Florida represent approximately 40% of the industry. The greater concentration in Brazil provides for the critical mass necessary to support a bulk delivery system.

Because Brazil has a counter cyclical production cycle to the U.S., it adds stability to world prices of orange juice. This price stability helps drive demand in growing and developing markets.

The domestic market, for fruit, in Brazil is larger than in Florida. The domestic market forms a strong secondary market for fruit. This secondary market for fruit acts similar to a buffer for the processing industry. The domestic market will consume any fruit which the processing industry does not need. In Florida, over 95% of the crop is processed. Most of the fresh fruit demand in the U.S. is supplied by Californian fruit. Therefore, if the crop in Florida increases 10 million boxes, one could assume that the increase will be processed. Whereas, in Brazil, because of the strong

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secondary market, if the crop size is increased the processors to not want to process the additional boxes, the fruit can easily be diverted into the domestic (fresh) market.

In recent years, the domestic demand for fruit has been driven by improvements to the Brazilian economy resulting from the “Real” plan. Inflation has decreased from highs 5-6 years ago over 50% per month, to current levels around 2% per month. Domestic consumption has also benefited from the formation of the MERCOSUL. MERCOSUL is a trading agreement between Brazil, Argentina, Uruguay, and Paraguay.

First, Brazil has played a very critical role to the orange juice industry in North America. Because Brazil is located in the Southern Hemisphere, its production cycle is almost countercyclical to ours. Thus, oranges are being processed almost everyday somewhere in the world. This helps maintain a year-round supply of orange juice at reduced inventory levels.

Second, because of the geographic separation, Brazil reduces the risk associated with a major crop failure due to freezes, floods, pests, or diseases in Florida. This benefit is evident during the 1980’s, when Florida suffered several freezes.

Third, because of differences in citrus varieties and horticultural practices, orange juice from Brazil can have slightly different characteristics. These differences can affect the product’s color, flavor, ratio, etc. The U.S. orange juice market is more developed than any other market in the world. The U.S. market desires the highest quality orange juice; both in color and flavor. However, currently, Florida production is deficient in color. This is the result of growers planting more early mid season fruit than late (Valencia) season fruit. The early mid season fruit is lighter in color than the Valencia. As a result, the U.S. market needs to import higher color product from Brazil. The imports aid in providing a consistent product to the U.S. consumer on a year-round basis.

This ability to have a consistent product improves stability and predictability for the consumer. Brazil, also, helps provide price stability to a market which historically fluctuated greatly when Florida experienced shortages due to freezes. Price stability is important for maintain-

ing market share with the consumer, and reducing substitution effects.

Strategic Positioning

When Brazil’s orange juice industry began supplying a significant portion of juice to the North American market, because of losses in Florida resulting from freezes, companies in the U.S. formed alliances with processors located in Brazil.

Recent trends have shown the world evolving from regional to global markets. This shift has been driven by a need for markets to become more efficient. For a firm to reach a true status as a global orange juice supplier it would need to have sales around the world. The U.S. represents around half of the world demand for orange juice. Because of Brazil’s residual supplier status to the U.S., it is important for a company wishing to participate in the U.S. market to be located in the U.S. and by having facilities in both Florida and Brazil, a processor has more flexibility in sourcing and supplying its customers.

The globalization of the orange juice industry should increase its efficiency. This will assist the industry in fully developing markets around the world. As any economist will tell you, economics is the allocation of scarce resources. The globalization will improve the industries long-term viability and profitability. Therefore, one must recognize this as an excellent opportunity for the orange juice industry.

One other trend observed locally in the Florida orange juice industry is the formation of relationships between processor. It is well known that the processing plants in Florida have ample capacity to process more fruit than the industry can supply. As a result, as the needs of individual plants have increased, rather than drastically increasing the plants capacity, the processors have formed agreements with processors with under-utilized capacity to process fruit for them. These “toll pack” agreements provide for a more efficient utilization of existing capacity. Processors, also, work together in the bulk storage and packaging of product.