CARIBBEAN FOOD CROPS SOCIETY

48

Forty-eight Annual Meeting 2012

Playa del Carmen, Mexico
Vol. XLVIII

PROCEEDINGS

OF THE

48th ANNUAL MEETING

Caribbean Food Crops Society
48th Annual Meeting
May 20th – 26th 2012

Hotel Barceló Riviera Maya
Playa del Carmen, Mexico

"Education, Productivity, Rural Development, and Commercialization in the XXI Century"

Edited
by
Wanda I. Lugo and Wilfredo Colón

Published by the Caribbean Food Crops Society

ISSN 95-07-0410

Copies of this publication may be obtained from:

Secretariat, CFCS
P.O. Box 40108
San Juan, Puerto Rico 00940

or from:

CFCS Treasurer
Agricultural Experiment Station
Botanical Garden South
1193 Guayacán Street
San Juan, Puerto Rico 00926-1118

Proceedings of the Caribbean Food Crops Society. 48:13-20. 2012

VALUE CHAIN ANALYSIS: FEASIBILITY OF EXPORTING FRUITS AND VEGETABLES INTO MARTINIQUE FROM ST. LUCIA

Randel Esnard and Govind Seepersad, The University of the West Indies

ABSTRACT: Insufficient market research and intelligence on the fresh tropical agricultural produce markets in the French Caribbean Overseas Regions (FCOR's) limits the ability of producers and exporters in St. Lucia to effectively explore the opportunities and capture the benefits that exist in these neighboring markets. This study examined the market opportunities for the top six fresh tropical agricultural produce in Martinique, as well as issues that affect market access into the European Union FCOD, which is governed by preferences under the EU-CARIORUM Economic Partnership Agreement. A value chain approach was used to assess St. Lucia's competitiveness in the FCOR market. Utilizing the Economic Competitiveness Coefficient framework developed by Singh et al. (2006), the export price competitiveness for the six commodities identified were computed. The competitor analysis of the major suppliers in the market for the identified commodities show that for selected commodities (yam, tomatoes and grapefruit), less than fifty percent of the supply value was accrued to members of the European Union. The study found that the commodities identified, yams, tomatoes, lettuce, cabbages, grapefruit and sweet peppers, could be successfully cultivated in St. Lucia. The results show that all six commodities will be price competitive in the Martinique market.

Keywords: FCOR, EU-CARIORUM, Competitiveness, Economic Partnership Agreement

INTRODUCTION

Background of the Study

Martinique, Guadeloupe and French Guiana are defined and administered as French Caribbean Overseas Departments (FCOD's), on the same basis as departments of metropolitan France. This colonial tie with mainland France binds these departments to all agreements signed by France and by extension the European Union (EU), formally referred to as the European Communities (EC). The latest of these agreements with economic relevance to members of CARIFORUM (*CARICOM + Haiti + Suriname + Dominican Republic*) is the signing of the Economic Partnership Agreement (EPA) between the EU and the African, Caribbean and Pacific group of states (ACP). The EU-ACP EPA was officially signed on October 15th 2008. This agreement in its entirety relates to further trade liberalization between members of the EU and ACP countries (African, Caribbean and Pacific) and replaces the Lomé Conventions and Cotonou Agreement which existed between these international trading blocs. The former agreements provided preferential market access for members of CARICOM in the form of guaranteed quotas and prices above those dominating on the world market. The EPA is based on reciprocity and the granting duty-free and quota free market access to all countries in the EU.

The close proximity of St. Lucia and Martinique as neighboring islands offers an advantage relative to shipping costs and provides a prospective gateway for St. Lucian traders to capitalize on the EU markets in lieu of mainland France. Of particular interest in the EU is the fruit and

vegetable market in Martinique. This market may not be considered large; however, it relies heavily on imports from mainland France, Costa Rica, Dominica, Spain and Guadeloupe to satisfy local demand. The lack of market research hinders the ability of entrepreneurs from St. Lucia to penetrate this nearby market.

In this regard, this study sought to examine the opportunities that exist in the FCOD's for St. Lucian entrepreneurs. The specific objective of the study are to:

1. Determine the relevant regulation for entry into the EU markets
2. Determine which are the fresh tropical agricultural commodities being imported into Martinique with the best potential for St. Lucian farmers / entrepreneurs
3. Identify the major competitors in the market and;
4. Determine the price competitiveness for the commodities identified in (2) above.

METHODOLOGY

Two models were used for the analysis:

Value Chain

This study used the value chain approach in the analysis for exporting fruits and vegetables from St. Lucia into Martinique.

The Economic Competitiveness Coefficient

The Economic Competitiveness Coefficient (ECC) developed by Singh et al (2006) was used to assess the competitiveness of the top six agricultural imports into Martinique that can be successfully cultivated in St. Lucia for export. The ECC was developed to measure whether a country's exported goods would be competitive when landed in an international market. It measures the difference in the prices and represents the answer as a ratio.
The formula is:

$$ECC = \frac{FLP}{TWP}$$

Where,
FLC = Final Landed price at the market in the foreign country
TWP = Total wholesale price of that same country at the terminal market

When computed values of the ECC>1, these products are considered to be uncompetitive and when values of ECC<1, competitive (Felix, Seepersad and Singh 2010).

RESULTS AND DISCUSSION

Market Access into the EU

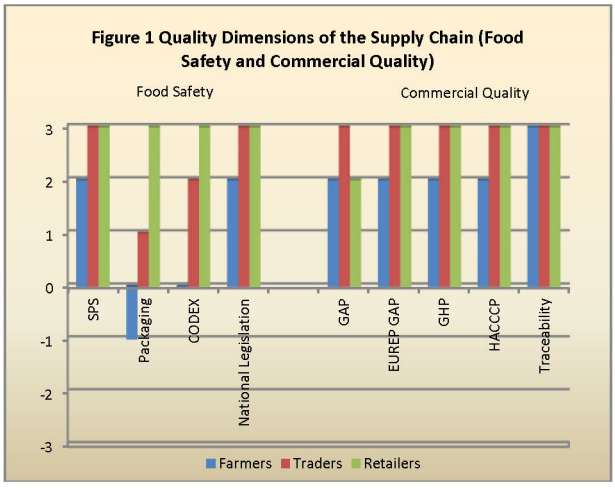
Market access for goods refers to the conditions, tariff and non-tariff measures agreed by trading members for the entry of specific goods into their markets. Aspects of market conditions, tariff schedules and matters pertaining to foreign trade are documented in trading agreements that are WTO compatible. Of relevance to this study is the EU-ACP Economic Partnership Agreement. This new agreement had to be WTO compatible, ensuring reciprocity of trade between the two trading blocs in a reasonable time frame (Bernal, 2008). Under WTO's substantially all trade

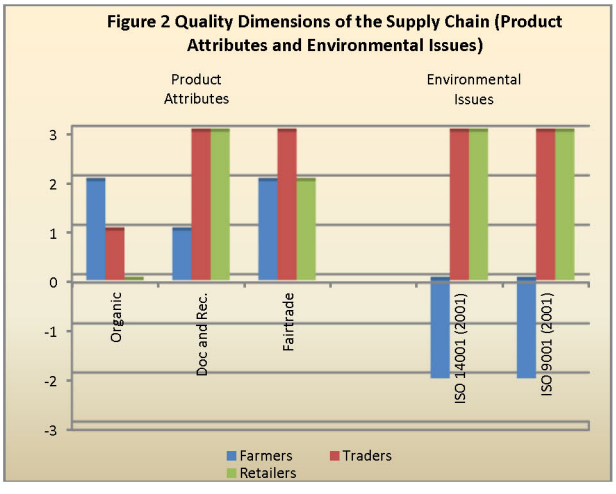
(SAT) standards, this translates into liberalization of close to 90% of all trade between the parties (Economic Commission for Latin America and the Caribbean, 2008). This process is to occur on a phased basis to achieve full reciprocal trade liberalization over a period of 25 years, with the majority within 15 years.

As part of the EPA's National Treatment principle, the EU has committed itself to reduce or eliminate existing Non-Tariff Barriers (NTBs) and to effectively remove all quantitative restrictions on imports. This is expected to minimize the level of discrimination against imports into the EU from the Caribbean Region. This will allow for goods exported from CARIFORUM to be subjected to similar treatment with regards to taxes, fees, and internal charges as those goods that are domestically produced within the EU (Barbados Investment and Development Corporation, 2010).

Market Entry into the EU: Quality and Safety Standards

Being granted market access under the EU-ACP EPA does not automatically translate into market entry or participation in the EU markets. Health, safety and quality standards for products entering the EU markets are now increasingly becoming preconditions for market entry and participation initiatives for exporting countries (dell'Aquilla and Caccamisi, 2007, 267). Reality is that firms willing to engage in international trade with the EU will have to deal with these opportunities for improvement and constraints rising from these standards. These standards apply to every player in the agro-food supply chain, including farmers, cooperatives, manufacturers, processors, food handlers and consumers. An evaluation of the quality dimensions of the key players in the supply chain for exporting into the EU is presented in Figures 1 and 2. Low or negative ratings indicate a need for improvement in upgrading to meet the EU standards.





Tariff Schedules

As an affiliated member of the EU, Martinique's import policy is similar to that of the EU. All imports from non EU countries are subjected to a Community Integrated Tariff (TARIC). The Tariff schedule used in the FCOR's is based on the Harmonized System codes (HS) also referred to as the Customs Cooperation Council Nomenclature (CCCN). This system was introduced by the WTO to provide a standard tariff classification regime for global trade (Barbados Investment and Development Corporation, 2010).

The taxes applied in Martinique include the EU's Common External Tariff (CXT), the Octori de Mer (Local tax), Octroi de MerRégional (National Tax fixed at 2.5%) and the value added tax. The Octroi de Mer and the Octroi de MerRégional are enforced by the Customs Service on imported goods based on their value. Under the COTONOU agreement, between the EU and ACP countries, goods originating from ACP member states are exempted from the CXT (gaining duty free access) provided that a EUR1 certificate is presented with the goods upon entry into Martinique. Import duties are calculated as a percentage of the values of imported goods. The dutiable value of goods entering Martinique is calculated based on the CIF value (Cost, Insurance, and Freight).

Value Chain

The typical costs incurred from the St. Lucia farm gate to the Martinique Terminal was computed to determine the additional value at every point in the supply chain for the commodities identified. Data was obtained from interviews held with farmers, management of the Belle Vue Farmers' Cooperative, shipping agent (CGM/CMA), customs broker, importers and retailers. The cost of production (COP) for the top six (6) fresh tropical agricultural commodities identified in Martinique was obtained from the Ministry of Agriculture in St. Lucia. Actual expenses and industry mark-ups were used for the farmer, exporter, freight, custom brokers, port charges, importer and other services involved in the supply chain to Martinique. A summary of the value chain for yams, tomatoes, cabbage, ssweet pepper, grapefruit and lettuce from St. Lucia to the Martinique market is presented in Table 1. For the commodities identified the cost of production accounts for the highest percentage of the value chain. Exporters, importers and farmers margin represent 17%, 16%, and 15%, respectively, of the final price of the commodity in the terminal market.

Table 1: Summary of Value Chain for various commodities produced in St. Lucia

	Commodities					
Chain Members (Value Added)	**Yams**	**Tomato**	**Cabbage**	**Sweet Pepper**	**Grapefruit**	**Lettuce**
Cost of Production	38%	39%	37%	40%	34%	38%
Farmers mark-up	15%	15%	15%	15%	15%	15%
Exporter Margin	17%	17%	17%	17%	17%	17%
Importer Margin	16%	16%	16%	16%	16%	16%
ECC	0.43	0.64	0.97	0.46	0.95	0.32

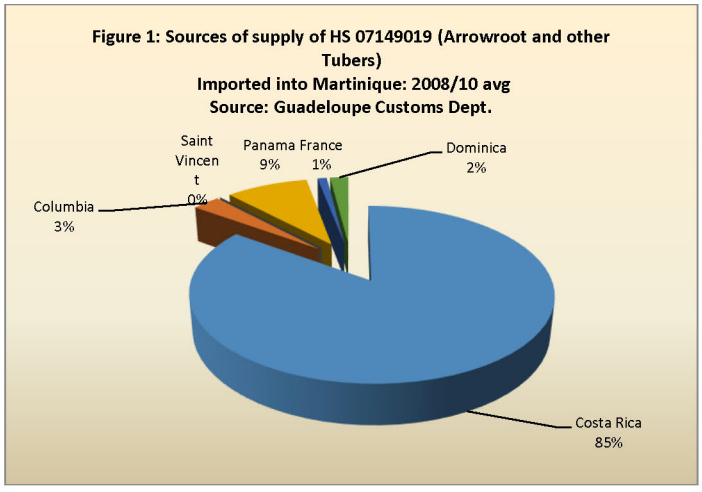
Competitor Analysis

To be able to compete successfully in a market, it is critical to know who the competitors are. The analysis which follows is based on the average import value of the top six (6) fresh tropical agricultural commodities imported into Martinique from 2008 to 2010.

HS 07149019 Roots of Arrowroot, Salep and similar roots and tubers

Non-EU member states account for 99% of the import value of HS 7149019 in Martinique. Costa Rica is the largest supplier of this commodity (85%) into Martinique. Second to China, Costa Rica

is the largest producer of HS 7419019 and the largest exporter into France and is therefore expected to be a highly competitive producer (International Trade Centre, 2011). Dominica and St. Vincent are the only two CARICOM countries who have participated in this market over the past three years, with yams and arrowroot, respectively. Dominica, export into the market over the past three years represent 2% of the market, whereas St. Vincent accounted for only 0.24% in 2008. The suppliers of HS 7149019 into Martinique are shown in Figure 1.



HS 07020000 Tomatoes fresh or chilled

Tomato imports into Martinique for the period 2008-2010 totaled € 1,544,900, of which only 17.02% was originated from EU member states while 64% came from the Dominican Republic. With the exception of Barbados, which accounts for 0.03% of total tomato imports into Martinique during 2008-2010, no other CARICOM country participated in this market. Figure 2 shows the main suppliers of tomatoes into Martinique from 2008 to 2010.

HS 07051900 Lettuce fresh or chilled

Lettuce imports into Martinique from 2008 to 2010 summed up to € 939,900 avg. Majority of the imports being from metropolitan France € 937,752 (99.76%). The other participants in the lettuce import market are Barbados and The Netherlands; together they represent 0.23% of the market.

HS 07049010 White and Red Cabbages

White cabbages can be considered as one of the most successful, highly cultivated crops produced by farmers in St. Lucia. Favorable soil conditions, weather patterns and low risk relative to other products, allow farmers to cultivate the crop successfully. From 2008-2010, data shows that 100% of the cabbages imported into Martinique originated from members of the EU. The sources of supply for HS 7049010 in Martinique are presented in Figure 3.

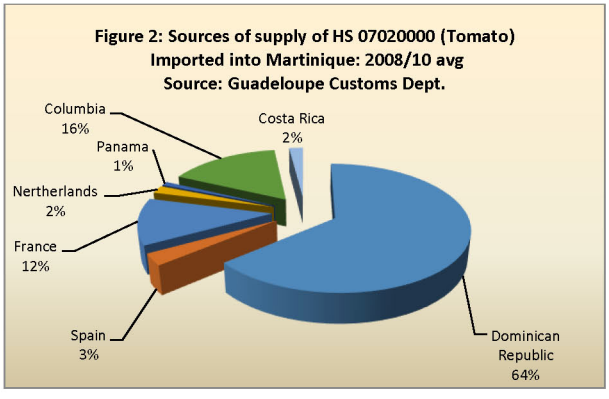
HS 0805400 Grapefruit

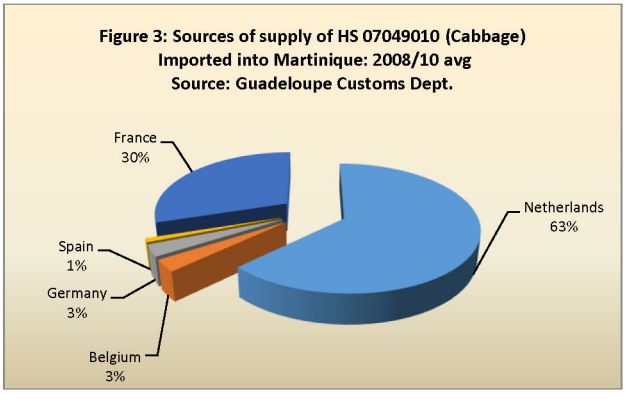
Currently, grapefruit is not cultivated on a large scale by farmers in St. Lucia. The cocoa and coconut estates in St. Lucia account for the majority of the grapefruits produced and sold. Insufficient demand for the commodity in the domestic market results in spoilage of the majority of the grapefruits produced. In this regard, identifying and establishing potential markets for grapefruits can be beneficial to farmers in St. Lucia. The value of grapefruit imports into

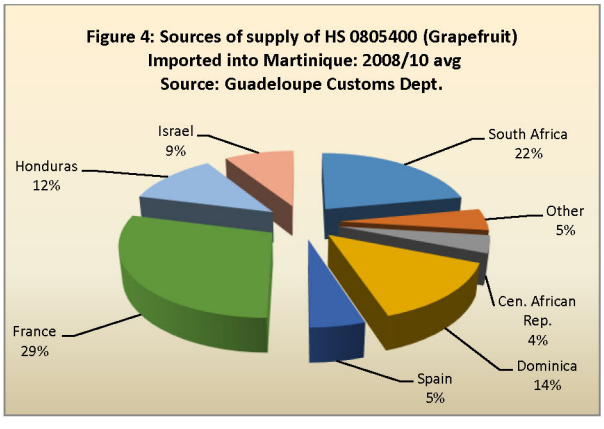
Martinique for the period 2008-2010 summed up to €312,380. Of this total, EU member states account for 34.16%. The major suppliers of grapefruit into Martinique are shown in Figure 4.

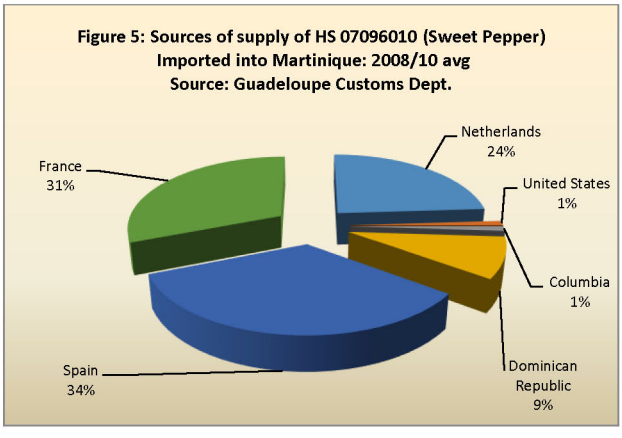
HS 07096010 Sweet Pepper

Sweet pepper production in St. Lucia has been on the increase as a result of advancements in the use of greenhouse technology. Farmer cooperatives in St. Lucia are currently encouraging their members to invest in greenhouse technology and sweet pepper production for the domestic market. Further encouragement in this regard can result in an increase in production of sweet peppers that can be exported. From 2008 to 2010, the total value of sweet peppers imported into Martinique summed up to € 253,500, of which EU member states accounted for 89%. Figure 5 shows the sources of supply of HS 7096010 into Martinique from 2008 to 2010.









Price Competitiveness Analysis

The results for the Economic Competitiveness Coefficient for the fresh agricultural commodities identified were presented using three scenarios.

1. The actual price competitiveness coefficient for the commodities identified;
2. The highest cost of production that will be competitive in the market; and
3. The highest profit mark-up per commodity that will be competitive in the market.

Commodities with an ECC value <1 are considered to be price competitive in the market; the lower the ECC the greater the level of competitiveness. Scenario one shows the actual competitiveness

of each commodity in the market. Scenario two is based on the assumption that all other cost and mark-up margins are held constant while altering the cost of production to the point where the ECC is equal to one. Scenario three is based on the assumption that the cost of production and all other costs involved are held constant while increasing the farmer's mark-up margin to the highest point where the ECC is equal to one. The three scenarios are summarized in Table 2.

Table 2:Summary of Price Competitiveness for commodities produced in St. Lucia for potential exports to the Martinque Market

Commodities	Scenario 1 *ECC at cost of production and 40% margin*	Scenario 2 *Highest cost of production ($/lb) ECC=1*	Scenario 3 Highest *Profit Mark-up (%) ECC=1*	Competitive		Rank
				Yes	No	
Lettuce	0.32	3.04	380	√		1
Orange peppers	0.42	3.8	255	√		2
Yams	0.43	2.53	252	√		3
Yellow Peppers	0.46	3.4	220	√		4
Green Peppers	0.46	3.34	223	√		4
Tomato	0.64	1.84	128	√		5
Cabbage	0.97	0.90	45	√		7

CONCLUSION

The results of this study provided an overview of the fruit and vegetable market in Martinique with a focus on the commodities that can be successfully cultivated in St. Lucia. Furthermore, the analysis shows that the current cost of production for the identified commodities is price competitive in the market and confirms the view that it can be a profitable venture to participate in the EU market which is approximately twenty four miles away from city to city between St. Lucia and Martinique. Given the opportunities identified in the Martinique market it is recommended that the Ministry of Agriculture and farmer cooperatives work in strengthening the link between production agriculture and marketing, and provide adequate training to farmers to help them meet the quality standards set by the EU. Further market intelligence and research is needed to examine competitors in the market so as to develop effective and efficient export strategies to supply the Martinique market.

REFERENCES

Barbados Investment and Development Corporation. 2010. *Market Research Report- Martinique.* Research, Information and Design Services Division, Bridgetown Barbados.

Bernal, Richard. 2008. "CARIFORUM-EU Economic Partneership Agreement negotiations: Why and How." *Journal of Eastern Caribbean Studies* 1-23.

dell"Aquilla, Crescenzo, and Caccamisi.2007"Accessing market Opportunities: quality and safety standards." *In: Agriculture Trade Policy and Food Security in the Caribbean*, edited by J.R Deep Ford, Crescenzo dell'Aquila and Piero Conforti, 263-288. Rome: FAO.

Economic Comission for Latin America and the Caribbean. 2008. "The CARIFORUM-EU EPA: Assessment of issues relating to market access, safeguards and the implication for Regional Integration." Port -of-Spain Trinidad and Tobago, November 26, 2008.

Europa. 2010. Accessed September 30, 2011. http://europa.eu/about-eu/basic-information/index_en.htm

Felix, Nkosi, Seepersad G, and Singh. 2010."Competitiveness Assessment of the USA – Miami Market for Trinidad & Tobago Habaneros." Working Paper, The Caricom Regional Transformation Market Intelligence Report, University of the West Indies St. Augustine Campus, Trinidad and Tobago.

Ford, D. J.R., and Jaque. 2007 "Competitivness, Investment and Caribbean Agriculture." In *Agriculture trade policy and food secuity in the Caribbean*, edited by J.R Deep Ford, Crescenzo dell'Aquila and Piero Conforti, 243-262. Rome: FAO.

International Trade Centre. 2011."*International Trade Centre TRADE MAP."* Accessed November 22, 2011. http://www.trademap.org/Country_SelProduct_TS.aspx

Monke, Eric A., and Scott R. Pearson. 1989. *Policy Analysis Matrix for Agricultural Development.* Accessed September 12, 2011. http://www.stanford.edu/group/FRI/indonesia/documents/pambook/pambook.pdf

Tsakok, Isabelle. 1990. *Agricultural price policy: a practitioner's guide to partial-equilibrium.* New York: Cornell University Press.

Unnevehr, L, and D Robberts. 2003. "Food safety and quality: regulations, trade and the WTO." *Agriculture policy reform and the WTO: Where are we heading?* Capri: FAO. 1-27.

ACKNOWLEDGMENTS

The authors express their appreciation to the Department of Agricultural Economics and Extension of the University of the West Indies St. Augustine for providing funding to attend this conference.