

Changing Consumer Vegetable Preference: Opportunities and Challenges

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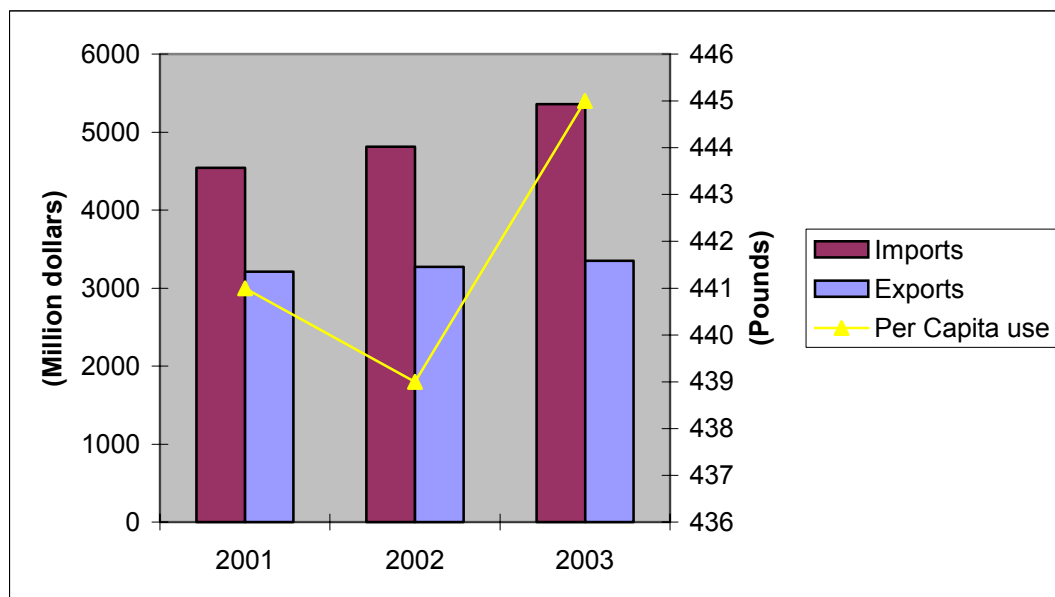
Introduction

The United States is importing more vegetables lately than it's been exporting for the past years (Fonsah, 2003). For the past half a decade, i.e. from 1998 to 2003 the United States imported agricultural products were worth \$36.8 billion, \$37.3 billion, \$38.9 billion, \$39.0 billion, \$41.0 billion, and \$45.0 billion respectively. Projection for year 2004 is estimated at \$47.5 million (Fonsah, 2003; USDA, 2003).

Fig 1 below depicts a continuous import growth for vegetables. In 2002, 5.9 percent growth was reported and 11.4 percent in 2002. On the other hand export demand remains stagnated during the same time period. Although a slight decline in per capita use in 2002, that quickly changed in 2003 with a drastic increase (Fonsah, 2003; USDA, 2003)

However, while the imported vegetables are increasing drastically, there has been a sweep change from the traditional vegetable import and marketing channels respectively. Most of the vegetables imported are of ethnic origin and that has triggered the growth of ethnic marketing channels. This paper is aimed at investigating some of these non-traditional vegetables that find their way into the U.S. markets.

Fig. 1: U.S. Vegetable Industry: Import, Export and Per Capita Use, 2001-2003



Materials and Methods

An empirical non-scientific marketing survey was conducted at Atlanta Farmers and ethnic markets concomitantly. Several farmers and ethnic markets were visited to see first hand and document the kind of vegetables on the shelves, especially the ones that were found in the markets visited. Permission was obtained from the operation managers to take photographs strictly for educational purposes. Some of the questions asked included: (1) Where do you obtain your supplies? (2) What are the non-traditional vegetables you carry? (3) Who are your main customers? (4) What is the sales turnover? (5) Do you have enough supplies etc.?

Results and Discussions

The vegetable in fig 2 is called dong qua. This vegetable/fruit belongs to the same family as watermelon but originates from China. It sells for \$0.59 per pound compared to \$0.13 per pound for watermelon. Watermelon prices dropped from an average of \$0.31 per pound in 2002 to \$0.13 in 2003 (Fonsah, 2004). Most of the supplies of dong qua came directly from China with an insignificant quantity produced locally by small growers.

Fig. 2: Dong Qua



Source: Atlanta Ethnic Market (2004). Photograph taken by E.G. Fonsah

Nira Flower

Nira flower is a typical example of a vegetable whose production and consumption is triggered by the influx of migrants or foreign U.S. residents. Given the price per pound of \$3.99, this vegetable is definitely a delicacy. Current supplies are strictly from China. If grown locally, profit margin might be positive but an economic feasibility study is imperative to determine the lucrativeness (Fig. 3).

Fig 3: Nira Flower



Source: Atlanta Ethnic Market (2004). Photograph taken by E.G. Fonsah

Opo

Opo vegetable looks more like squash. It sells for \$1.29 per pound. On the other hand, despite the impressive 26.8% increase in the 2003 squash price per $\frac{3}{4}$ bushel, the price per pound was only \$0.52 or \$15.46 per $\frac{3}{4}$ bushel. If opo vegetable is produced locally, the growers will not have to pay ocean freight transportation, customs, and aphid control, C.I.F etc., thus could maximize profit margin (Fig 4).

Fig. 4: Opo Vegetable



Source: Atlanta Ethnic Market (2004). Photograph taken by E.G. Fonsah.

Lemon Grass

Lemon grass *Cymbopogon citratus* is a tropical plant. It is grown in Africa, West Indies, The Caribbean and other tropical countries. It is a source of essential oil and smells like lemon. There is another variety of lemon grass, *Cymbopogon flexuosus*. Both varieties of lemon grass are used medicinally for both infants and adults. Others drink it as tea with lemon flavor. What is important here is that it grows in the wild and has not yet been domesticated in many tropical countries. It sells for \$0.99 each (few heads or leaves). This could be a lucrative source of income for local farmers, as soon as they can master the techniques involved in growing it. The main users are people of Asian, African, Caribbean, Central and South America origin. Given the migration growth rate into the U.S., this will be a huge ethnic market (Fig 5).

Fig. 5: Lemon Grass



Source: Atlanta Ethnic Market (2004). Photograph taken by E.G. Fonsah

Opportunities

The change in consumer preference in the vegetable industry will create new opportunities for local growers. Initially, the change will be attractive to small growers as the niche market is as yet well defined. As the demand for these non-traditional vegetables continue to grow, the market structure will eventually become well structured and defined. Entry by larger producers will become eminent. The new entrants would create competition for the small growers. If production is not controlled, the lucrativeness of this new emerging market will start dwindling. If the demand continues to be strong, larger growers will start replacing smaller ones and limit their profit margin.

Challenges

The change in consumer preference in the vegetable industry will not only creates new opportunities but also new challenges for specialists, researchers, extension personnel, vendors and machinery companies as well. Or if more and more farmers start getting involved in the production of these ethnic vegetables, there will be need to address the following questions:

(1) How much fertilizer should be used per acre? (2) What fertilizer should be used? (3) Which chemical should be used for weed control? (4) Which chemical should be used for pest control? (5) Are these chemicals registered? (6) What is the cost per acre? (7) What is the plants density per acres? (8) Where can we get planting materials? (9) What planting system should be used? (10) Can plasticulture work? (11) Do we need irrigation? (12) When is the best time to plant? (13) What is the planting distance? (14) Is there any budget? (15) What kind of harvesting machine will be needed? (16) What kind of packaging material is suitable etc? In short, there will be numerous questions that require immediate answers. The county agents would have to address these questions and if they cannot, the specialists are sure to receive phone calls on the subject matter.

By and large, several test plots will be put in place and several grants proposals will be submitted to get enough funding to find solutions for these emerging problems.

Conclusion

This study has demonstrated the increasing demand for ethnic non-traditional vegetables. As the immigrant population continuous to grow so will the demand for non-traditional vegetables. The increase demand will trigger a boost in supply and the creation of new opportunities vis-à-vis new niche or ethnic markets. There will be several questions to be addressed in the production side of the equations as specialists, researchers, extension personnel, vendors etc. are not yet prepared for this emerging changes occurring in the vegetable industry. There will also be need to address the structure and market channels created by the change caused by consumer vegetable preferences.

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