

Staff Report

THE IMPACT OF MEXICAN TOMATO IMPORTS ON THE FLORIDA
TOMATO MARKET: A REVIEW OF RECENT STUDIES

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J. Scott Shonkwiler and John VanSickle

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AGRICULTURAL MARKET RESEARCH CENTER

FOOD AND RESOURCE ECONOMICS DEPARTMENT

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INTRODUCTION

The U.S. winter tomato market has undergone dramatic changes in the last two decades. Florida fresh tomato production has grown from an average of 23.775 million cartons during the 1962-63 through 1964-65 seasons to an average of 34.000 million cartons during the 1977-78 through 1979-80 seasons, an increase of 46.8 percent. Averaged over the same seasons however, Mexican tomato imports increased from 8.255 million cartons to 23.532 million cartons, an increase of 185 percent. Clearly, such growth in tomato imports has had significant impacts on domestic winter tomato growers.

Two recently completed studies, have investigated the winter tomato market. The Hammig-Mittlehammer (H-M) paper examined the effectiveness of the U.S. tariff in protecting Florida tomato producers from Mexican competition. The Shonkwiler-Emerson (S-E) paper examined how Florida tomato producers responded to increased Mexican tomato imports. The following two sections will briefly summarize the findings of both papers and a final section will offer likely conclusions concerning the future of the U.S. winter tomato market.

The Hammig- Mittlehammer Study

These authors considered how Mexican and Florida tomato prices and

quantities are determined using quarterly historical data. They explicitly modeled the effect the U.S. fresh tomato tariff has on Mexico's tomato exports. From this model they tested the effects of alternative tariff structures on the U.S. market. In one case the U.S. tariff was entirely eliminated. Under this scenario it was found that the largest impact would be on the quantity supplied by U.S. producers, which drops considerably. In fact, over the period studied U.S. production would have declined 23.8 percent from that which was observed. Even more importantly, H-M showed that U.S. prices are affected very little by the tariff. Elimination of the tariff would have resulted in only a .6 percent decrease in tomato prices over the period studied. H-M maintain that the protection the tariff provides to the U.S. producers has been rapidly eroding in recent years. They reason

"The tariff has become substantially less effective as a mechanism for protecting the Florida producer from Mexican competition. It should be noted that a principal cause of this decline in effective protection is the fact that the tariff...has not been altered of fixed values of 1.5 ¢/lb. in January and February and 2.1 ¢/lb. in March since 1966."

These conclusions suggest that altering the tariff in the future will have even less impact on consumer prices than anytime previous, since "the tariff has become less important as a cost item in the marketing of Mexican tomatoes."

The Shonkwiler- Emerson Study

In this paper a model of the Florida tomato industry was formulated under the hypothesis that growers make production decisions as rational

economic agents. This assumption implies that anticipated Mexican tomato imports as well as other economic variables are taken into account when the planting decision is made. Further, the model permitted tomato yields to vary in response to the impact of imports on Florida price. This allowed the model to capture the effect of current imports on actual production.

The model showed that tomato acreage planted is influenced by the level of anticipated imports. It was found that a 10 percent increase in expected Mexican imports would decrease Florida acreage planted by nearly 2 percent. The authors state that this relationship "reveals that Mexican imports have contributed to the contraction of the Florida industry in terms of acres planted."

Actual imports were shown to impact Florida quantities and prices different ways. The study determined that a 10 percent increase in imports reduced Florida production by almost 6 percent, but reduced prices by less than 3 percent. In terms of revenues, a 10 percent increase in Mexican tomato imports reduced Florida revenues by a full 8.59 percent. The S-E study came to the conclusion that

"Perhaps a major implication of Mexican tomato imports is the differential impact of imports on Florida prices and quantities sold. The dominant effect of these imports is the reduction of domestic supply, not domestic wholesale price."

Thus, imports have a two-pronged effect on Florida tomato producers because as Mexican imports increase, not only does this reduce current domestic supply, but anticipated increases in imports reduce domestic acreage in following years as well.

CONCLUSIONS

Both the H-M and S-E studies arrive at many of the same conclusions despite the differences in models employed by them. Essentially, they find that the dominant effect of changes in Mexican imports is the impact on domestic quantities and not domestic prices. The H-M study documents the relative ineffectiveness of the current tariff structure due to its per unit rather than ad valorem nature. Because the tariff is employed on a per unit basis, the effect of inflation has been to reduce the real level of the tariff, i.e., the tariff has become a much less significant cost item in the marketing of Mexican tomatoes. The S-E study documents the role of market information which aids producers trying to adjust to changes in Mexican imports. The study surmised that the information collection and dissemination services of the Florida Tomato Committee help producers to better allocate their production resources among alternative activities.

As trade restrictions on tomatoes are re-evaluated, policy makers must make some difficult decisions for the important winter tomato industry. Certainly given the great degree of sensitivity in tomato production to variations in growing conditions, consumers benefit by having more than one producing area supplying tomatoes during the season. This suggests that some protection for Florida producers is needed. Furthermore, the results of the studies considered indicate that increased protection for Florida producers will result in increased domestic production with much smaller proportionate effects on consumer prices.

REFERENCES

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