GlobalCommerce

Summer 1995 - Volume 1, No. 1

Editor's Introduction

With exports growing at better than 15% a year - 1994 exports alone topped 7 billion dollars, over 400 foreign owned plants in operation, the increasing reliance of many of the state's largest service sectors on overseas sales, and growing numbers of overseas tourists, Tennessee is today more deeply involved in the international economy than most of us realize. Much of the state's future growth and economic prosperity will depend on foreign markets, trends, and activities. **Global Commerce** aims to meet the need for information about Tennessee's developing links with the global economy.

Global Commerce will offer regular, detailed coverage of Tennessee's trade and foreign investment flows, as well as features on global economic issues which specifically involve Tennessee and its businesses. We believe you will find this newsletter timely and informative, a useful aid to understanding the impact, opportunities, and problems of Tennessee's global interdependence. We welcome your feedback! Let us know what sorts of additional information you would like to see reported, and areas of research that you would find particularly useful.

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Why Did the Peso Collapse? Implications for American Trade

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The Peso Crisis

During the late 1980s numerous countries in Latin America embarked on significant economic policy reforms aimed at making their economies more competitive internationally and raising their standards of living. Mexico was one of the first countries after Chile to undertake significant steps toward restructuring its economy. Under the Salinas administration (1988-94) the federal budget was turned from deficit to surplus, import tariffs were cut dramatically, and inflation was lowered from more than 150% in 1987 to single digits in 1994. And, above all, Mexico joined the U.S. and Canada to form the North American Free Trade Agreement in 1994.

Due to these efforts, Mexico attracted large amounts of private foreign capital. But by late 1993 this inflow ebbed, and toward the end of March, 1994 foreign exchange (dollar) reserves fell rapidly as foreign investors began pulling their funds out of Mexico because of rising political uncertainty, in particular the assassination of presidential candidate Colosio. The Salinas administration responded by devaluing the peso, which had been stabilized at around 3 pesos per dollar, to 3.4 per dollar and by raising interest rates to make the peso attractive again. Consequently foreign exchange reserves were stabilized.

On November 30, the new cabinet of the incoming president Zedillo was announced. The most significant part of this announcement was the absence of finance minister Pedro Aspe, the well-respected economic strategist of the outgoing administration, who was considered a guarantor of a stable peso/dollar exchange rate. To financial markets this change signaled that the new administration might not be as serious about maintaining the value of the peso.

Financial markets responded promptly to the political turmoil and the possibility of a peso devaluation. Foreign exchange reserves fell as investors liquidated their short-term portfolio investments and converted their pesos back into dollars. In contrast to the currency crisis of March 1994, however, the decrease in foreign exchange holdings was fully sterilized by the central bank: domestic government debt was substituted for the declining stock of foreign exchange. The objective was to avoid a decrease in the money supply, higher interest rates, and a recession. In another departure from the March crisis, the Mexican central bank virtually depleted its dollar reserves. There were only $11 billion left to draw on for currency stabilization operations rather than almost $30 billion as in March of 1994. This was much less than the $30 billion in short-term dollar-indexed government bonds (*tesobonos*) in the hands of jittery investors. To investors, it was clear that the central bank would be unable to support the peso at the 3.4 rate if these short-term bonds continued to be sold. Faced with the prospect of a potential peso devaluation and capital losses on their investments, many investors decided to preempt the devaluation by selling their peso assets. The rush to sell forced the Mexican government to react.

On December 20 the peso was allowed to trade without intervention to 4 pesos per dollar, up from 3.47 pesos. However this measure was perceived by financial markets as validating the fear that the new administration was not serious about keeping the value of the peso stable against the dollar. Mexican assets were quickly sold in quantity. In just one day, the Mexican central bank lost half of the remaining foreign exchange reserves (about $5 billion). Since the Mexican government was effectively out of dollar reserves, the government stopped all currency intervention and floated the peso on December 22.

During the next weeks the peso began a free fall against the dollar. The stock and bond markets tumbled; other assets also fell in price. Asset deflation had its counterpart in sharply higher interest rates which in turn increased bankruptcies among corporations and endangered the survival of banks. Faced with increasing loan defaults, deflating asset values, and large increases in dollar-denominated debt, banks effectively ceased to provide new loans. A severe credit crunch developed, forcing real economic activity to decline sharply. In order to avoid a spill-over of the Mexican crisis into the global economy, a U.S.-led rescue package providing Mexico with foreign exchange loans worth $50 billion was put into place in February of 1995. As part of this rescue plan, the Zedillo administration announced a severe austerity plan. This called for (1) a 50% increase in Mexico's value-added tax, (2) sweeping budget cuts, (3) sharp increases in electricity and gasoline prices to decrease demand and reduce government subsidies, and (4) tighter monetary policy (higher interest rates) to prop up the exchange rate. When added to the credit crunch, these measures destine Mexico for a recession.

Repercussions of the Crisis for the U.S.

The peso devaluation, which reached approximately 50%, makes U.S. goods and services more expensive to Mexico and Mexican goods and services cheaper in the U.S. The devaluation will switch Mexican demand from U.S. imports towards home goods. U.S. exports to Mexico will decline and U.S. imports from Mexico will increase. The fact that Mexico is moving into a recession will strengthen these effects.

There is little ambiguity about the direction of change of U.S. trade with Mexico in the aftermath of the peso devaluation, but the extent of U.S. export losses to Mexico may be less than the 50% peso devaluation might suggest. Although the peso did depreciate about 50% in nominal terms by March of 1995, the rate of real depreciation was more on the order of 35%. This is because prices are climbing sharply in Mexico in the wake of the devaluation. In fact, an inflation rate of 30 to 40% is expected for 1995, compared with less than 10% in 1994. If Mexican prices indeed increase by 30 to 40%, compared to a U.S. inflation rate of around four percent, the Mexican peso will depreciate by only 14 to 24% in real terms over the year. Given a medium-term price elasticity of import demand of around 0.5, this translates into a reduction in Mexican imports by only about 7 to 12% on the basis of price alone.

However to get the total response of Mexican import demand, the price effect of the devaluation needs to be added to the decline in imports induced by Mexico's recession. Mexico's gross domestic produce (GDP) is expected to decline by two to three percent in 1995. Assuming an income elasticity of import demand of two, imports from the U.S. will decrease in 1995 by four to six percent compared to 1994. Added to the price effect, U.S. exports to Mexico are likely to be 11 to 18% percent lower in 1995 than in 1994. These overall numbers hide significant variations among products and among regions in the U.S.

And in fact during the first two months of 1995 U.S. exports to Mexico have declined by 1.43 percent. This is a dramatic change when compared to an annual average increase of U.S. exports to Mexico of 16% over the last four years. A larger decline can be expected for the year as a whole. Price changes take time to be fully reflected in new contracts. And the price elasticity of import demand is relatively low in the short run. Alternative sourcing may be difficult, especially if imports from the U.S. dominate total Mexican imports, and domestic production may not be very responsive either.

Figuring the employment effect of a decrease in U.S. exports to Mexico and an increase in U.S. imports from Mexico is no easy task. The Federal Reserve has forecast a $13 to $28 billion loss in U.S. production in 1995 and job losses of 380,000 over the next four years as a direct result of the peso devaluation. Texas, which provides a third of all U.S. exports to Mexico, Arizona, and California will be affected the most, but other states - including Tennessee - will also feel the consequences.

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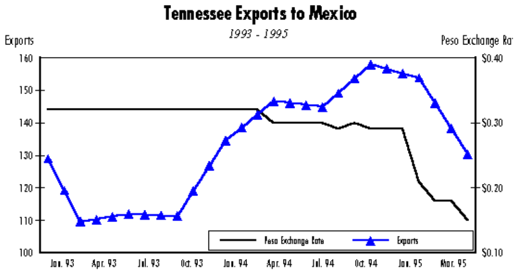
Tennessee's Trade with Mexico: The Impact of a Turbulent Year

Steven G. Livingston

Rarely have exporters operated in as volatile an environment as that of Mexico over the past 18 months. First came the tremendous promise of NAFTA. On January 1, 1994 tariffs dropped to zero on 48.9% of U.S. exports entering Mexico, a dramatic increase from the 17.9% of American exports which were duty free in 1993. While Mr. Perot listened for the giant sucking sound, almost all trade forecasters heralded what they believed would be an historic boom in trade. And, indeed, through 1994 the growth of US exports to Mexico doubled that of US exports to the rest of the world. No one, however, predicted what happened next: the collapse of the peso and a severe contraction of the Mexican economy. In the wake of this crisis, Mexican imports fell sharply. From April 1994 to April 1995, the Mexican trade balance shifted from a deficit of $1.4 billion to a surplus of $620 million, with imports dropping some 15.4%. US exports tumbled, dropping from $4.5 to $3.5 billion a month between November 1994 and February 1995. Exports are now stabilizing, but at a level not much different than before NAFTA. Meanwhile, because of the cheap peso, Mexican exports to the US have surged to record levels, perhaps soon to break $6 billion a month.

How have Tennessee firms fared in this environment, and what does the future hold for them? Perhaps fortunately, Tennessee is not as reliant on the Mexican market as are many states. In 1994 Mexico accounted for 7.84% of the state's exports, slightly below the US average - and nowhere near the over 25% of a state like Texas. Nevertheless, Mexico has become increasingly important to Tennessee exporters. It is our third largest market. 1994 exports were valued at a little over $600 million, six times the figure in 1987. Mexico today takes double the percentage of state exports that it did less than ten years ago. Of course, these figures hide significant variations within different industries. In Tennessee, seven of the twenty seven SIC industry groupings which export sell more than 10% of their exports to Mexico (only five sectors show no exports to Mexico). Agriculture, leather working, and the primary metal industries are particularly reliant on the Mexican market. Most of these industries did well between the NAFTA boom and the peso bust: Tennessee exports to Mexico rose about $30 million a quarter after NAFTA came into effect. Fourteen of the twenty two industry groups with Mexican exports posted solid gains. The bust, however, hit equally hard. Exports fell $23.5 million between the end of 1994 and the first quarter of 1995, dropping to levels of a year and a half earlier. Figure 1 documents this fall.



Assuming that exports had instead continued to grow only at a modest 5% - much less than the 10 year historical average - this means a loss of some $95 million in Tennessee exports for 1995. Yet a few star sectors such as petroleum refining (up 828%) and textiles (367%) have continued to grow in the face of this general downturn. And none of Tennesee's "big three" export sectors were savaged - while the transportation industry was off 8%, chemicals (+49%) and the industrial machinary industry (+57%) made robust gains.

Most experts expect Mexico to experience a prolonged economic slump. The overall export environment will continue to be tough. As explained in the accompanying article on the peso collapse by Professor Zeitz, much of the impact is yet to be felt. We do, however, have several clues for determining how particular Tennessee industries will be affected. Table 1 displays them. Two obvious clues are how responsive industries have been to the previous events in Mexico. The NAFTA and Peso "effects" are percentage deviations from the quarterly industry growth rate which we would have anticipated (for the first quarter of 1994 and 1995 respectively) had the two events not occurred. Industries gaining from NAFTA should have a significant positive "NAFTA effect" and industries suffering from the peso collapse should have a strongly negative "Peso effect." Particularly worrisome are those industries such as food processing or rubber manufactures which experienced dramatic export declines after the peso collapse.

We have several additional guides for estimating future trade performance. One is the preexisting sectoral trade balance between Mexico and the U.S. This is a measure of the relative competitiveness of U.S. industries in each sector. The sectors with strongly positive U.S. balances ought to best positioned to fend off rival Mexican producers; in some cases they may have no powerful local competitors. Another measure is the substitutability between foreign and domestic products (the "elasticity of substitution" in the lingo of economics). Industries in which foreign and domestic products are highly differentiated should be better able to withstand the price advantages newly gained by their Mexican competitors. Parenthetically, they should also be better positioned to protect home markets from Mexican imports. The Michigan Model of World Production and Trade has estimated an index of substitutability for the U.S. Here it is used as a proxy for Mexico as well. The higher the index, the more differentiated the product and therefore the less the vulnerability of exports to price competition alone. Finally, the Commerce Department's International Trade Administration produces market research studies which highlight the sectors it believes are the best positioned to expand their exports. Table 1 indicates those sectors where the ITA has located Mexico's greatest export opportunities.

These clues together suggest some Tennessee industries should continue to fare well: furniture and fixtures (currently exporting very little to Mexico) and petroleum refining have perhaps the best prospects. Textiles and the fabricated metal industry should also continue to be strong. The leather, primal metal, and stone, clay, glass and concrete industries, however, may be in for a harder road. Not surprisingly, however, most industries appear to face a mixed environment. This suggests that much of the success of Tennessee exporters will continue to depend on finding particular niches or opportunities within the larger crosscurrents now buffeting the Mexican market.

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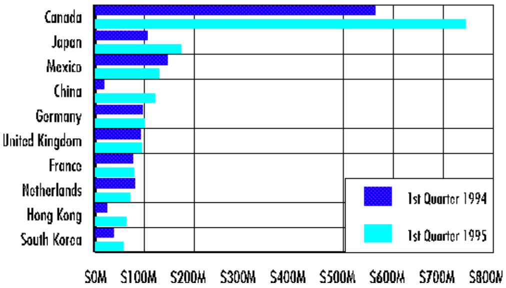
Tennessee International Trade Report
1st Quarter 1995

In spite of the Mexican peso crisis, Tennessee exports have been booming in 1995. Shaking off an 11% decline in exports to Mexico, overall first quarter exports rose to $2.290 billion, $277.5 million above last quarter, and nearly $600 million above exports for the same period in 1994. - a 34% growth rate. Virtually every sector improved its export performance. In March, the state's exports exceeded $800 million in a month for the first time. Tennessee's export sales continue to grow faster than the national average and, in another first, the state's manufacturing exports climbed above 1.4% of total US manufacturing exports. The bulk of exports again went to Canada, Mexico, and the European Union, however East Asian markets were particularly dynamic, with trade to China up some 528% and exports to Vietnam an astronomical 25775% . Transportation (automotive) equipment and chemicals remained Tennessee's largest export sectors and both made healthy gains during the first three months of 1995, but the oil sectors (SICs 13 and 29) and agricultural crops posted the biggest increases in growth.

The second quarter appears off to a similar record setting pace, with April exports 29% higher than a year ago.

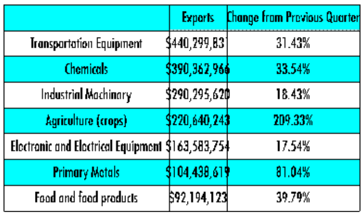
Tennessee's Leading Trade Partners

Growth of Exports



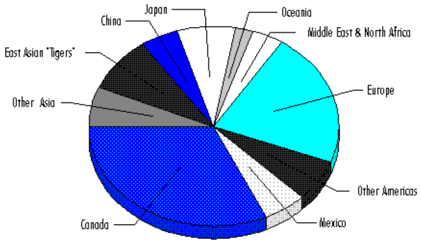
Tennessee's Largest Exports Sectors

1st Quarter 1995



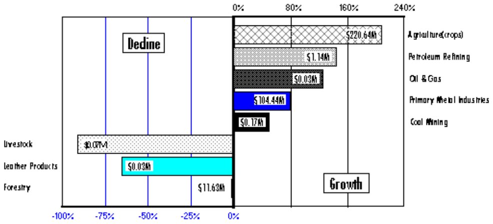
	Exports	Change from Previous Quarter
Transportation Equipment	$440,299,83	31.43%
Chemicals	$390,362,966	33.54%
Industrial Machinary	$290,295,620	18.43%
Agriculture (crops)	$220,640,243	209.33%
Electronic and Electrical Equipment	$163,583,754	17.54%
Primary Metals	$104,438,619	81.04%
Food and food products	$92,194,123	39.79%

Tennessee's Exports by Region

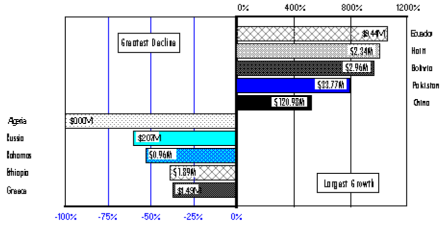


Growth and Decline in Exports by Industry

1st Quarter 1995



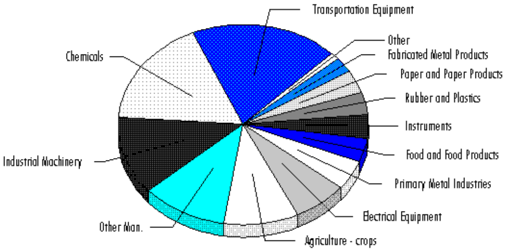
*Note Only three Tennessee industries experienced a decline in exports in 1st Quarter 1995



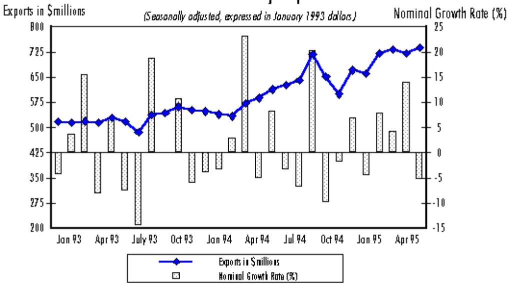
Fastest Growing Export Destinations

1st Quarter 1995

(among countries with more than $2M in sales)



Tennessee Exports by Industry



Tennessee Monthly Exports

(Seasonally adjusted, expressed in January 1993 dollars)