



Briefing Paper

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TRADE AND PENNSYLVANIA: Distorted Trade Patterns Translate Into Job Loss For Commonwealth

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Summary

Over the past decade, trade has been one of the most hotly contested dimensions of U.S. economic policy. In light of continuing controversy, this Briefing Paper evaluates the impact of trade on jobs in Pennsylvania since 1994, the year in which the North American Free Trade Agreement (NAFTA) went into effect. We estimate this impact at the state level and within nine regions of Pennsylvania, each containing one or more U.S. Congressional districts.

Key findings include the following.

- From 1994 to 2000, a rising trade deficit cost Pennsylvania an estimated 142,221 jobs, 2.9 percent of total 1994 employment in the state.
- In manufacturing, an estimated 106,142 Pennsylvania jobs disappeared due to trade from 1994 to 2000, more than one out of every nine manufacturing jobs.
- The estimated annual average wage of the manufacturing jobs that Pennsylvania lost equals \$39,328.
 - This exceeds by over \$7,000 the state's average non-manufacturing wage (\$32,192).
 - \$39,328 is as much as three times the annual average wage of Pennsylvania service industries in which many displaced workers would find re-employment.
- The hardest hit part of Pennsylvania was the Capital region encompassing the new 17th Congressional District, which lost nearly 10,000 jobs, including nearly 8,000 in manufacturing.
- The second hardest hit part of Pennsylvania was the Lehigh Valley spanning the 11th and 15th Congressional Districts, which lost an estimated 9,325 jobs each.
- Other hard hit areas include Districts 19 (Southern Metropolitan PA) and 10 (in the Northeast including Scranton), each of which lost at least 8,281 jobs, including at least 6,766 in manufacturing.
- The least hard hit areas include seven Congressional Districts that fall in the Philadelphia metropolitan area and four that fall mostly in the Pittsburgh metropolitan area.

Job Loss in the United States, Pennsylvania, and Other States

Proponents of current U.S. trade policies often point to the rapid growth over time in U.S. exports and the jobs created by these exports. For example, U.S. exports ballooned from \$583 billion in 1994 to \$942 billion in 2000 (in constant 2000 dollars). Many U.S. exports, however, do nothing to create U.S. jobs: they are simply processed in other countries and then come back into the U.S. domestic market. In the case of Mexico, University of California-Berkeley Professor Harley Shaiken estimates that such “revolving door exports” account for an estimated 60 percent of U.S. exports. Overall, U.S. imports from 1994 to 2000 jumped from \$765 billion to \$1,381 billion, i.e., by \$257 billion more than U.S. exports increased over the same period.

To evaluate the overall impact of trade on U.S. employment, Robert Scott of the Washington-based Economic Policy Institute looks at both imports and exports. Scott estimates the jobs gained due to exports, the jobs lost due to imports, and the net job loss resulting from the excess of imports over exports.¹ For the period 1994-2000, Scott generates estimates for 31 industries in the United States, including each of 20 manufacturing industries.² Industry-level job impacts were also generated for each of the 50 states. Scott’s findings follow.

- From 1994 to 2000, a rising trade deficit cost the United States an estimated 3.044 million jobs, including nearly 2 million in manufacturing.
- With 142,221 net jobs lost, Pennsylvania experienced the fifth-highest job losses of any state, behind California, Texas, New York, and Michigan. Pennsylvania’s net job losses represent 2.9 percent of Pennsylvania employment in 1994.
- Pennsylvania also experienced the fifth-highest manufacturing net job losses due to trade, 106,142. This equals 11.4 percent of 1994 manufacturing employment in Pennsylvania, more than one out of every nine manufacturing jobs.
- The jobs lost in Pennsylvania averaged \$39,328 in annual wages. This exceeds the statewide average annual wage of \$32,192 by over \$7,000. It equals as much as three times the annual average wage in Pennsylvania service industries — such as distribution, business services, and retail — in which many displaced workers would find re-employment.

Job Loss in Pennsylvania Regions

To examine job loss within Pennsylvania, we divide the state into nine regions that coincide with individual congressional districts or with clusters of districts.³

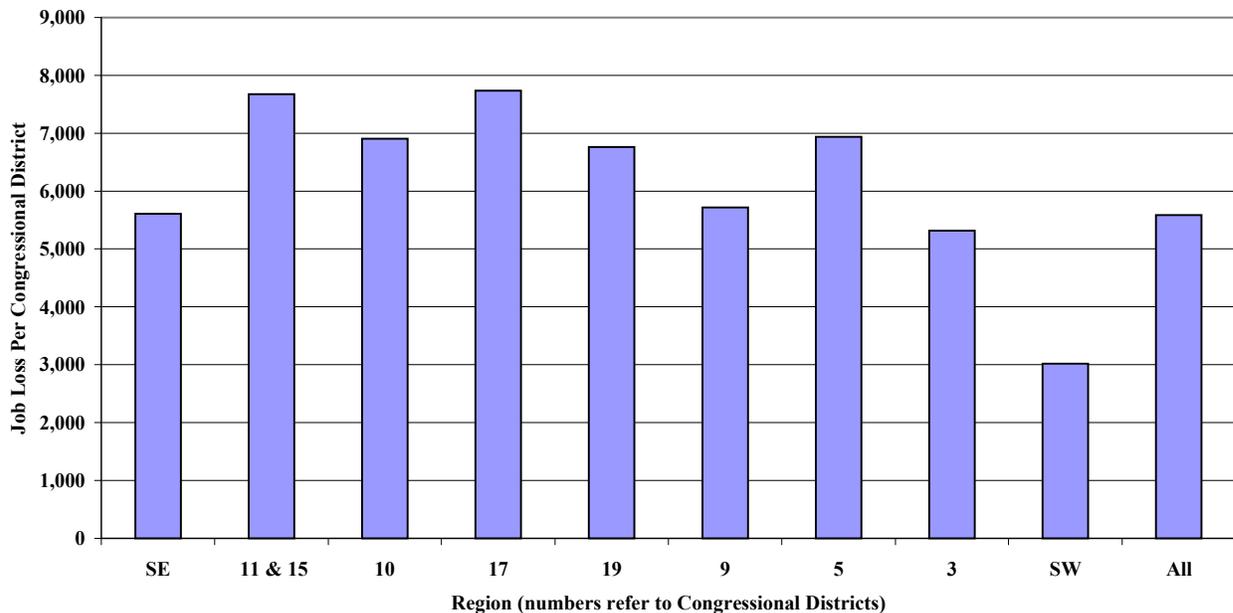
To estimate job loss within each of these nine regions, we use the same methodology relied on by official U.S. government statistics to generate exports and imports by state. That is, we allocate net job losses in each of 31 industries (estimated by EPI for Pennsylvania as a whole) to sub-state regions based on each region’s share of total Pennsylvania employment in the industry. Table 1 and Figure 1 contain the results of this regional analysis.



Table 1. Trade-Related Job Losses by Region in Pennsylvania, 1994-2000			
Region of the State	Congressional Districts	Net Job Loss Per Congressional District	Net Manufacturing Job Loss Per Congressional District
Southeast	1, 2, 6, 7, 8, 13, 16	7,582	5,610
Central East	11, 15	9,325	7,676
Northeast	10	8,504	6,904
Capital Region	17	9,662	7,734
Southern Metropolitan	19	8,281	6,766
Southern Rural	9	7,831	5,716
Northwest Central	5	8,456	6,936
Northwest	3	6,947	5,313
Southwest	4, 12, 14, 18	5,184	3,019
Statewide	All	7,481	5,582

Source: Keystone Research Center based on Economic Policy Institute and Pennsylvania Department of Labor and Industry data.

Figure 1. Net Manufacturing Job Loss in PA. Regions due to a Rising Trade Deficit, 1994-2000



Note: SE refers to Southeast and includes Congressional Districts 1, 2, 6, 7, 8, 13, 16. SW refers to Southwest and includes Congressional Districts 4, 12, 14, and 18. For the geographic area covered by each Congressional District, see Table 1, column 1.
Source: Table 2.

- The hardest hit part of Pennsylvania was the Capital region encompassing the new 17th Congressional District, which lost 9,662 jobs, including 7,734 in manufacturing. This region included heavy concentrations of apparel and leather products industries.
- The second hardest hit part of Pennsylvania was the Lehigh Valley spanning the 11th and 15th Congressional Districts, which lost an estimated 9,325 jobs each.
- Other hard hit areas include Districts 19 (Southern Metropolitan PA) and 10 (in the Northeast including Scranton), each of which lost at least 8,281 jobs, including at least 6,766 in manufacturing.
- The least hard hit areas include seven Congressional Districts that fall in the Philadelphia metropolitan area and four that fall mostly in the Pittsburgh metropolitan area. The Philadelphia region includes a substantial fraction of the state's chemical industry, which was not especially hard hit. By contrast, Philadelphia now has a relatively low proportion of many other manufacturing industries. Southwest Pennsylvania now has a relatively small portion of most of the state's manufacturing industries.

Job losses due to the rising U.S. trade deficit from 1994-2000 come on top of a roughly equal number of job losses experienced due to a rising trade deficit from 1979 to 1994 (Table 2).

Table 2. U.S. Job Loss Due to Trade, 1979-2000				
	U.S. Job Loss	U.S. Job Loss in Manufacturing	Pennsylvania Job Loss	PA. Job Loss in Manufacturing
1979 to 1994	2.4 million	2.2 million		
1994-2000	3.04 million	1.97 million	142,221	106,142

Sources: Robert E. Scott, Thea Lee, and John Schmitt. *Trading Away Good Jobs*, Economic Policy Institute Briefing Paper, 1997; and Robert E. Scott, *Where the Jobs Aren't*, Economic Policy Institute Issue Brief 168, October 30, 2001, p. 7.

Conclusion

For much of the 1990s, an expanding economy limited the impact of trade on U.S. workers. While manufacturing job loss meant lower wages for some workers, low unemployment reduced the number of workers without jobs at all. In the past two years, the economic recession has translated into more joblessness, including in manufacturing. Indeed, Pennsylvania lost 104,600 manufacturing jobs from May 1998 through August 2002, and 81,600 manufacturing jobs from 2000 (annual average) through August 2002.

The estimates in this paper show that a rising trade deficit accounts for roughly all the manufacturing jobs lost in Pennsylvania in recent years. Without trade-induced job loss, Pennsylvania manufacturing employment today would be about what it was in 1994.

In principle, international trade can raise living standards in the United States and promote economic modernization in the developing world. The current rules governing the international trade and financial systems, however, generate distorted trade patterns that have hurt Pennsylvania's middle class, while doing little to improve the lives of workers in many developing country trading partners.

In Mexico, for example, rapidly rising exports to the United States have done nothing to improve wages or quality of life. Despite rapidly rising productivity, according to official Mexican government statistics, real hourly wages for manual workers in Mexican manufacturing were 3 percent lower in 2001 than in 1993, the year before NAFTA went into effect. Economywide, Mexican wages in 1998 (the latest year for which we have figures) were 40 percent lower than in 1991.⁴ The broken link between wages and productivity in Mexico has not been repaired by NAFTA.

The United States needs a new approach to trade agreements and the international economy that is shaped by American values not just by the priorities of politically powerful corporations. This new approach must

- promote democracy, development, and expanding consumer markets in developing countries,
- expand not undercut economic opportunity domestically, and
- strengthen protection for labor and environmental standards at home and abroad.

Next year's anticipated U.S. Congressional consideration of a U.S.-Chile Free Trade Agreement represents a first opportunity to begin charting a new direction.

ENDNOTES

¹ Robert E. Scott, *Phony Accounting and U.S. Trade Policy: Is Bush Using Enron-Like Tactics to Sell Trade Deals to the Public?*, Economic Policy Institute Issue Brief #184, October 23, 2002; and Robert E. Scott, *Where the Jobs Aren't*, Economic Policy Institute Issue Brief 168, October 30, 2001.

² The impact of trade on U.S. jobs has not changed much since 2000. The U.S. trade balance on goods and services remained steady in 2001 and has worsened further in 2002. In the first six months of 2002, the trade balance on goods and services was \$240.5 billion, compared to \$221.3 billion in the first six months of 2001 and \$211.5 billion in the first six months of 2000. Data available online from the U.S. Department of Commerce, Bureau of Economic Analysis at <http://www.bea.gov/bea/rels.htm>. In August, the U.S. trade deficit surged to a record \$38.5 billion (Edmund L. Andrews, "Strong Dollar Runs Into Renewed Resistance," *New York Times*, October 19, 2002.)

³ We do not attempt to apportion job losses into all of Pennsylvania's congressional districts on an individual basis because districts in densely-populated areas consist of parts of a county and no easily accessible and up-to-date employment data exist below the county level. In addition, grouping congressional districts in urban and suburban areas into multi-district economic regions makes sense because workers displaced in one congressional district may live anywhere in the region and the impact of job loss is felt at the level of the regional labor market.

⁴ Carlos Salas, *The Impact of NAFTA on Wages and Incomes in Mexico*, Economic Policy Institute, Washington, D.C., April 2001, Table 2-2.