



How Pennsylvania's Economy Benefits from International Trade & Investment

Overview

With more than 95 percent of the world's population and 80 percent of the world's purchasing power outside the United States, future economic growth and jobs for Pennsylvania and America increasingly depend on expanding U.S. trade and investment opportunities in the global marketplace.

The following pages feature key facts and figures drawn from new Business Roundtable research, U.S. government data, and other data sources that demonstrate the benefits of international trade and investment to economic growth and jobs in Pennsylvania.

Why is International Trade & Investment Important to Pennsylvania?

- **International trade, including exports and imports, supports 1.6 million Pennsylvania jobs – more than 1 in 5.** These trade-related jobs grew 4.2 times faster than total employment from 2004 to 2013 and are at large and small companies, on farms, in factories, and at the headquarters of Pennsylvania's globally engaged firms. *(See Pennsylvania Jobs Depend On Two-Way Trade)*
- **Pennsylvania exported \$40.6 billion in goods and \$19.1 billion in services in 2013,** including basic chemicals, pharmaceuticals & medicines, misc. general purpose machinery and travel services. Of Pennsylvania's 15,655 exporters, 89 percent are small- and medium-sized companies with less than 500 workers. *(See Pennsylvania Businesses Grow With Exports)*
- **Customers in 212 countries buy Pennsylvania-made goods and services,** including billions of dollars in annual exports to markets like Canada, Mexico and China. Goods exports have grown more than three times faster than state GDP since 2003. *(See Pennsylvania Companies Export Throughout The World)*
- **Imports lower prices and increase choices for Pennsylvania companies and families.** Lower raw material and input costs help Pennsylvania companies stay competitive in global markets, while families can stretch paychecks further as trade agreements reduce the cost of products by eliminating costly barriers to trade. *(See Pennsylvania Companies And Workers Use Imports To Compete)*
- **Free trade agreements (FTAs) have helped fuel rapid export growth from Pennsylvania to partner countries.** In 2013, \$18.8 billion of Pennsylvania's goods exports, or 46 percent, went to FTA partners. This represents a 125 percent increase since 2003. *(See Pennsylvania Needs Trade Agreements To Grow)*
- **Foreign-owned companies invest and build facilities and employ 275,300 workers in Pennsylvania.** *(See Foreign Investment In Pennsylvania Creates Jobs)*



Pennsylvania Jobs Depend on Two-Way Trade

Overview

Creating and preserving quality U.S. jobs is a goal shared by all Americans. With more than 95 percent of the world's population and 80 percent of the world's purchasing power outside of the United States, future American economic growth and job creation depend on open markets abroad.

Trade Creates & Supports Jobs in Pennsylvania

- Export growth increases jobs by generating new business for Pennsylvania's manufacturers, service providers and farmers. Imports support jobs and keep costs low, helping Pennsylvania businesses compete and saving Pennsylvania families real dollars at the cash register.
- More than one in five Pennsylvania jobs depend upon international trade.
- Pennsylvania's trade-related employment grew 4.2 times faster than total employment from 2004 to 2013.
- Jobs in U.S. exporting plants pay on average up to 18 percent more than similar jobs in non-exporting plants.
- U.S. exporting plants increase employment 2 to 4 percent faster annually than plants that do not export. Exporting plants also are less likely to go out of business.
- Trade-supported jobs are not just at companies that export and import. Trade supports higher wages for workers and lower costs for companies and consumers, providing them with more money to spend on other things. This spending supports additional jobs throughout the U.S. economy in sectors like entertainment, education and construction.

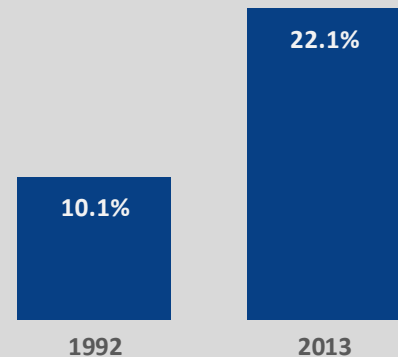
By the Numbers

1.6 million

Number of Jobs in Pennsylvania Supported by Trade

Share of Jobs Tied to Trade

Increased 119% from 1992 to 2013



Jobs Tied to Trade Top Sectors, 2013

Retail	180,000
Management, Administrative Services	112,400
Professional, Scientific, Tech Services	104,600
Finance, Insurance	95,300
Manufacturing	80,600



Pennsylvania Businesses Grow with Exports

Overview

Pennsylvania exported an estimated \$40.6 billion in goods and \$19.1 billion in services in 2013. Between 2009 and 2013, Pennsylvania goods exports have increased by 46 percent and services exports by 28 percent. Large companies now account for 65 percent of the value of Pennsylvania's goods exports, with the rest provided by small- and medium-sized enterprises (SMEs).

Small & Large Employers Partner to Export

In addition to exporting directly themselves, thousands of American SMEs export indirectly when they sell goods and services to large U.S. exporters. Based on their direct and indirect export activity combined, SMEs represent more than 40 percent of the value of U.S. exports.

Top Pennsylvania Exports

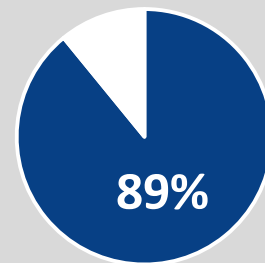
- Pennsylvania ranks among the top 5 state exporters in 20 industries, including first in misc. transportation equipment (\$644 million) and sugar & confectionary products (\$622 million) and second in coal & petroleum gases (\$2.0 billion) and iron, steel & ferroalloys (\$1.7 billion).
- Pennsylvania is America's 33rd largest exporter of agricultural products. It ranks among the top 10 exporters of apples, noncitrus fruits, and misc. agricultural products.
- One of Pennsylvania's fastest growing export categories is aerospace products, which have increased by 17 percent per year since 2003. In 2013, exports of these products reached \$1.4 billion.

By the Numbers

15,655

Number of Pennsylvania Businesses that Exported in 2012

Share of Pennsylvania Exporters that are Small- & Medium-Sized Businesses



Top Pennsylvania Exports, 2013

Goods

Basic Chemicals	\$2.7 billion
Pharmaceuticals & Medicines	\$2.6 billion
Petroleum & Coal Products	\$2.1 billion
Coal & Petroleum Gases	\$2.0 billion
Misc. General Purpose Machinery	\$1.7 billion

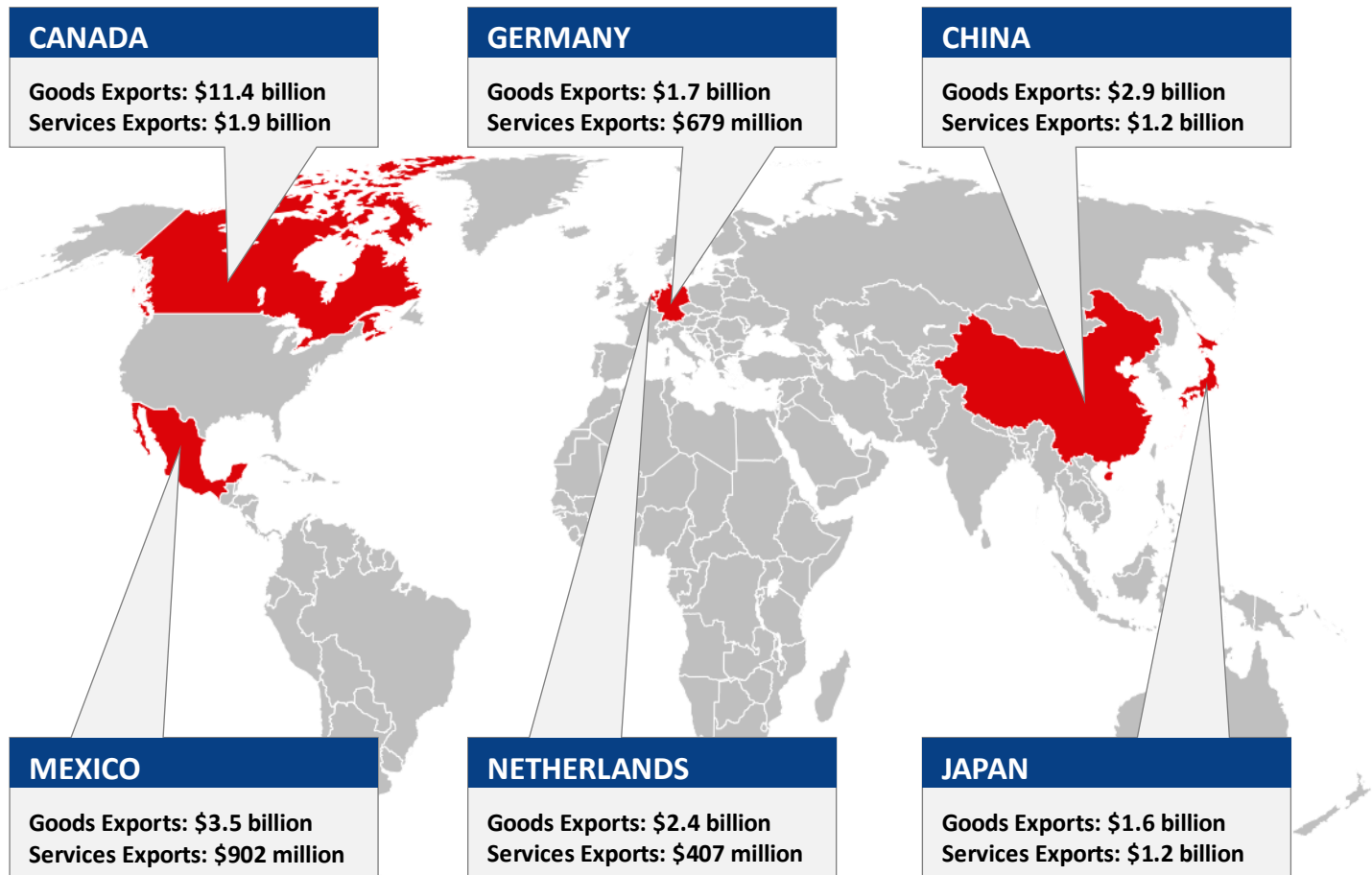
Services

Travel	\$4.9 billion
Financial Mgmt. & Advisory Services	\$1.8 billion
Education	\$1.4 billion



Pennsylvania Companies Export throughout the World

In 2013, Pennsylvania companies sold their products in 212 international markets. Top export markets include:



Fast Facts: How Exports Help the Pennsylvania Economy Grow

- Goods exports accounted for 6.3 percent of Pennsylvania's state GDP in 2013.
- Pennsylvania's goods exports have grown more than three times faster than state GDP since 2003. The average annual export growth during this period was 10.7 percent, while the average annual state GDP growth was 3.5 percent.
- Pennsylvania's top export markets for goods are Canada, Mexico, and China. Its top market for services is Canada.
- Among major export markets for Pennsylvania's goods, Brazil has grown the fastest at 31 percent per year since 2003. Exports to the Netherlands grew by 22 percent per year, while exports to Korea grew by 15 percent per year.



Pennsylvania Companies & Workers Use Imports to Make Products and Compete in International Markets

Overview

In 2013, 60 percent (\$1.3 trillion) of the products imported into the United States were inputs and components used by American producers. Lower cost inputs keep U.S. manufacturing competitive in international markets. Imports frequently contain components (like cotton or semiconductors) and services inputs (like design) provided by U.S. companies and farmers, including companies and farmers in Pennsylvania.

- Services, especially transportation from Pennsylvania's, finance and insurance, marketing and legal services are needed to bring imported goods to American manufacturers and households.
- In 2012, about 75 percent of identified U.S. importers were very small businesses with less than 20 employees.
- Trade and investment liberalization policies save the average Pennsylvania family of four more than \$10,000 per year.
- Imports help keep prices down for Pennsylvania families while increasing their choices for goods and services. Prices for imported consumer goods tend to drop year after year.

In 2012, nearly 186,000 U.S. companies (including 9,814 in Pennsylvania) imported products...

And roughly three-quarters of U.S. importers were very small businesses with less than 20 employees.

Imports Decrease Prices for Goods & Services



-86.9%

Decrease in the Price of Televisions Between 2003 and 2013.



-71.2%

Decrease in the Price of Computers Between 2003 and 2013.



-41.9%

Decrease in the Price of Toys Between 2003 and 2013.

Imports Increase Choices for Goods & Services



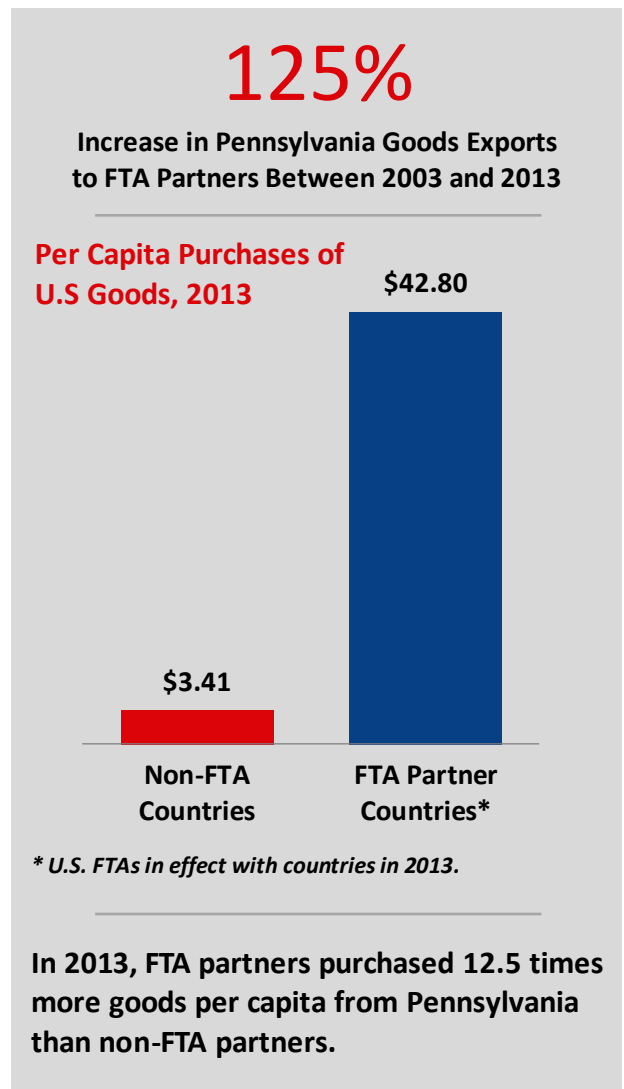
Pennsylvania Needs Trade Agreements to Grow

Overview

The United States has some of the lowest trade barriers in the world. Overall U.S. trade with our 20 free trade agreement (FTA) partner countries supports 17.7 million American jobs. Trade agreements level the playing field by lowering other nations' trade barriers, opening up foreign markets to U.S. exports and setting strong, enforceable rules for trade between the United States and those other countries. Pennsylvania has increased its exports to FTA partners following implementation of the U.S. FTAs with those countries.

- In 2013, \$18.8 billion of Pennsylvania's goods exports, or 46 percent, went to FTA partners.
- Since 2003 Pennsylvania's goods exports to countries with FTAs in effect with the United States in 2012 have increased by 125 percent.
- Pennsylvania's exports to Canada and Mexico have increased by \$10.6 billion (250 percent) since NAFTA went into effect in 1994.
- Pennsylvania's exports to Chile have increased by 240 percent since the FTA with Chile took effect in 2004.
- Pennsylvania's exports to Korea of boilers and tanks have increased sixfold, from \$13 million to \$80 million, in the two years since the FTA with Korea went into effect.
- Canada and Mexico combined to buy 77 percent of Pennsylvania's exports of motor vehicle parts in 2013.
- Countries negotiating the Trans-Pacific Partnership (TPP) and Transatlantic Trade and Investment Partnership (TTIP) agreements purchased \$27.6 billion, or 68 percent, of Pennsylvania's goods exports in 2013.

By the Numbers





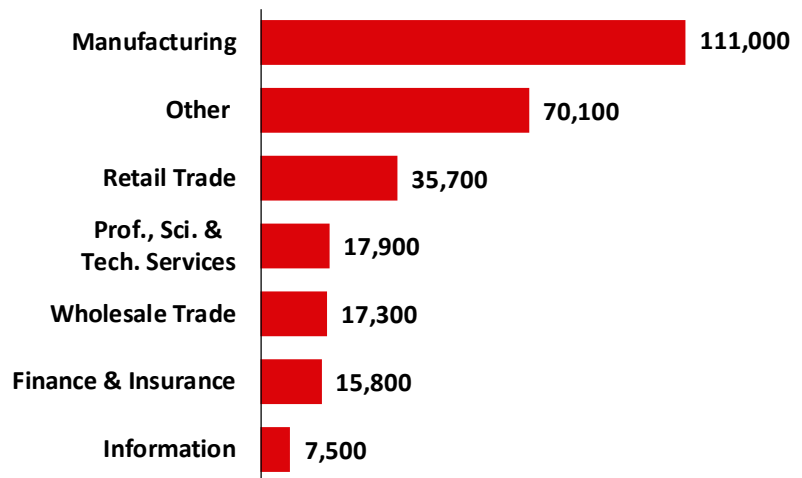
Foreign Investment in Pennsylvania Creates Jobs

Overview

Foreign-owned companies invest significant amounts of capital to open or expand facilities in Pennsylvania every year. Foreign-owned companies from around the world employ hundreds of thousands of workers in Pennsylvania, including:

- 55,000 workers employed by companies based in the United Kingdom;
- 38,000 workers employed by companies based in Germany;
- 36,900 workers employed by companies based in the Netherlands;
- 23,100 workers employed by companies based in Japan;
- 21,700 workers employed by companies based in France.

Foreign-Owned Companies Employ 275,300 Pennsylvania Workers Across Many Industries



Selected Foreign-Owned Companies Employing Workers in Pennsylvania

Company	Industry	Country
ABB Inc.	Power Distribution Services	Switzerland
Akzo Nobel Coatings Inc.	Chemicals Manufacturing	Netherlands
Arcelormittal USA	Steel Manufacturing	Luxembourg
BAE Systems Inc.	Defense/Security/Aerospace Services	United Kingdom
Domtar Paper Company LLC	Paper Manufacturing	Canada
Giant Food Stores, Inc.	Retailing	Netherlands
Lanxess Corp.	Plastic and Rubber Manufacturing	Germany
Mott Macdonald	Engineering Services	United Kingdom
SAP America Inc.	Software Development	Germany
Siemens Energy & Automation	Electronics and Engineering Services	Germany
UBS Financial Services	Financial Services	Switzerland



Data Sources

PENNSYLVANIA JOBS DEPEND ON TWO-WAY TRADE

Jobs-Tied-to-Trade: Baughman and Francois, "Trade and American Jobs, The Impact of Trade on U.S. and State-Level Employment: 2014 Update" (2014) (<http://businessroundtable.org/resources/trade-and-american-jobs-2014-update>)

Exporting Firm Wages: Riker, "Do Jobs in Export Industries Still Pay More? And Why?" (2010) (http://www.trade.gov/mas/ian/build/groups/public/@tg_ian/documents/webcontent/tg_ian_003208.pdf)

Exporting Firm Growth: Bernard and Jensen, "Exporting and Productivity in the USA" (2004) (<http://faculty.tuck.dartmouth.edu/images/uploads/faculty/andrew-bernard/exprod.pdf>)

PENNSYLVANIA BUSINESSES GROW WITH EXPORTS

Small and Large Firms Partnering to Export (for 2007, the most recent year for which data were available): U.S. International Trade Commission, *Small and Medium-Sized Enterprises: Characteristics and Performance*, November 2010, (<http://www.usitc.gov/publications/332/pub4189.pdf>)

Exports, Rankings, and Trends: The Trade Partnership, derived from U.S. Census Bureau ("Census") data (<http://tradepartnership.com/data/cdxports-and-cdxjobs>)

Exporting Company Information: Census, "A Profile of U.S. Importing and Exporting Companies, 2011 – 2012" (<http://www.census.gov/foreign-trade/Press-Release/edb/2012>)

PENNSYLVANIA COMPANIES EXPORT THROUGHOUT THE WORLD

Exports, Rankings, and Trends: The Trade Partnership (<http://tradepartnership.com/data/cdxports-and-cdxjobs>)

Export vs. GDP Growth: Derived from Census export data and U.S. Bureau of Economic Analysis (BEA) "GDP by State" database (<http://bea.gov/regional/index.htm>)

PENNSYLVANIA COMPANIES & WORKERS USE IMPORTS TO COMPETE IN INTERNATIONAL MARKETS

Importing Company Information: Census, "A Profile of U.S. Importing and Exporting Companies, 2011 – 2012" (<http://www.census.gov/foreign-trade/Press-Release/edb/2012>)

Imports as Components: Derived from Census end-use import data

Savings from Liberalization: Bradford, Grieco, and Hufbauer, "The Payoff to America from Global Integration" (2005) (<http://www.piie.com/publications/papers/2iie3802.pdf>)

Price Changes: Derived from BLS Consumer Price Index database (<http://www.bls.gov/cpi/>)

PENNSYLVANIA NEEDS TRADE AGREEMENTS TO GROW

Exports and Trends: The Trade Partnership (<http://tradepartnership.com/data/cdxports-and-cdxjobs>)

Per Capita Purchases of Pennsylvania Goods: Derived from The Trade Partnership (<http://tradepartnership.com/data/cdxports-and-cdxjobs>) and World Bank population estimates

Jobs-Tied-to-FTAs: U.S. Chamber of Commerce, "Opening Markets, Creating Jobs: Estimated U.S. Employment Effects of Trade with FTA Partners" (2010) (http://tradepartnership.com/pdf_files/US%20Chamber%20-%20Opening%20Markets,%20Creating%20Jobs%20study.pdf)

FOREIGN INVESTMENT IN PENNSYLVANIA CREATES JOBS

Employment Data: BEA "Direct Investment & Multinational Companies" database (http://bea.gov/iTable/index_MNC.cfm)

Foreign Investors: Uniworld BP database of "Foreign Firms Operating in the United States" (<http://www.uniworldbp.com>)