

# Chapter 1

## Introduction to International Trade

- **Why do we care about International Trade ?**

- ⇒ International trade can be viewed as “international aspects of supply and demand”
- ⇒ The inter-twining of international and national markets runs throughout international trade

Let's think about the following questions!

- Why an Indian PhD scholar is teaching you an economics course at Purdue?
- Why do we have so many international students at Purdue, or in the US?
- If the US raises government spending to increase employment, will employment in Canada increase?
- If India decides to train more Physicians, will the supply of physicians increase in the UK?

The Census Bureau records data on about 14000 classifications of commodities entering into the foreign trade of the US – 4000 for exports and 10000 for imports.

- Are 14000 explanations for these trade flows truly necessary?
- Can one explanation possibly cover every bundle of merchandise?

Link: <https://www.census.gov/foreign-trade/data/index.html>

- **What are we going to do in ECON 370?**

- Our quest is for the simplest models which are capable of answering the important questions trade patterns and how public policy should deal with them

- **The power of trade models:**

- The models explaining international trade are simple, strong and general.
- They not only explain international trade patterns, they also tell much about patterns of production, income distribution, and so on within countries.
- International Trade builds models to explain links between national economies and to show how nations' policies can yield maximum welfare and stability

▪ **Trade and Policy making**

- Trade occurs between sovereign nations – between us and them!
- Two governments (with potentially clashing objectives) can choose policies affecting the flow of trade between them.

Then, how does international economics pick its way through nationalistic attitudes and controversies?

- A critical role for the theory of international trade is to identify gains from trade and their indications for economic policy.
- After gains are determined, the next focus is the division of gains among the trading nations.
- However, economic analysis also identifies policies that maximize global welfare.
- Changes in the international trade policies almost always change the distribution as well as the level of a country's income.
- It is important to understand the relation between trade and income distribution to understand trade policies.

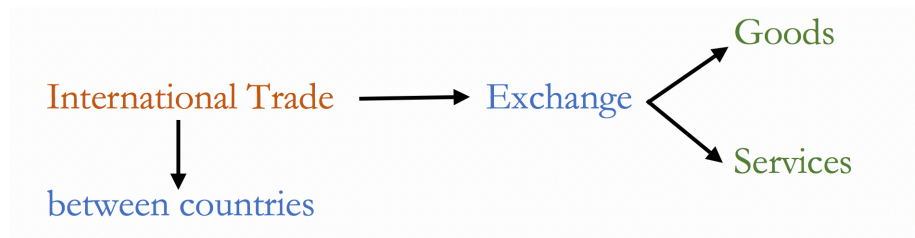
Consider the example: Trade between the US and Japan

From 1983 to 1985, the US and Japan pursued policies that kept the price of dollar high and the yen low.

- ⇒ Japanese goods become cheap for American buyers
- ⇒ Japan's resulting bilateral trade surplus provoked complaints from competing American industries

**BASIC CONCEPTS:**

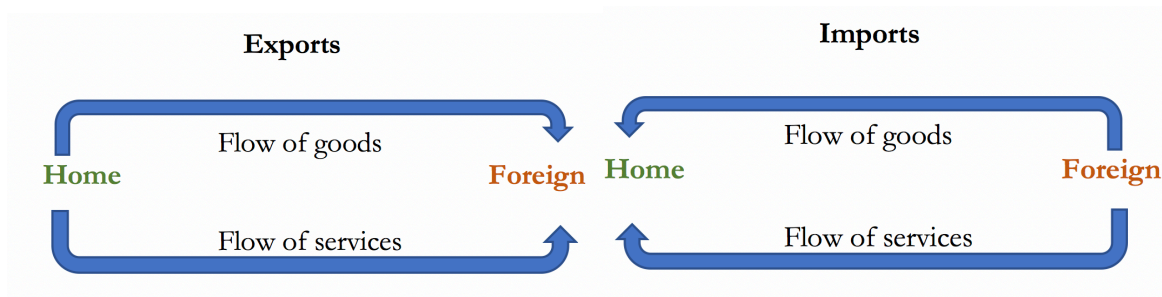
- International Trade



Trade is flow of goods and services across borders

Concerns: Who? What? At what quantity? At what price? Benefits? Costs? Restrictions? Policies?

- Exports and Imports



Examples:

The money spent by a US visitor to the Great wall of China is a service export of China and service import of the US.

Similarly, the money spent by a Chinese visitor to the Grand Canyon is a service import of China and service export of the US.

An US citizen purchasing a BMW car is a goods import of the US and a goods export of Germany.

- Trade Balance

⇒ Exports – Imports

⇒ The difference between a country's total value of exports and imports with the rest of the world (including both goods and services)

⇒ Exports > Imports : Trade Surplus

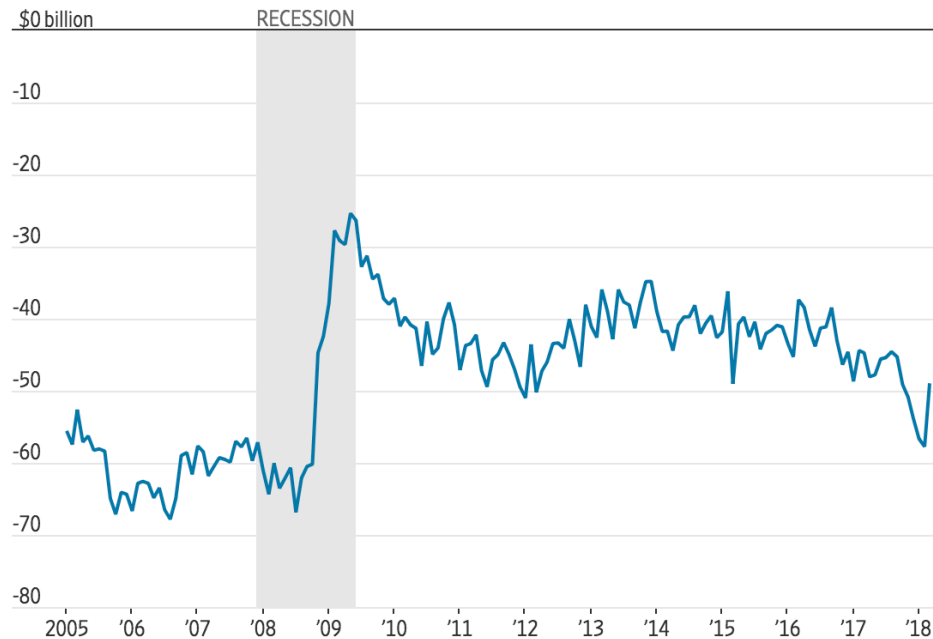
⇒ Exports < Imports : Trade Deficit

⇒ **Bilateral trade balance** is difference between exports and imports between two countries.

## Discussion 1: Trade Deficit of the US

### A Lesser Deficit

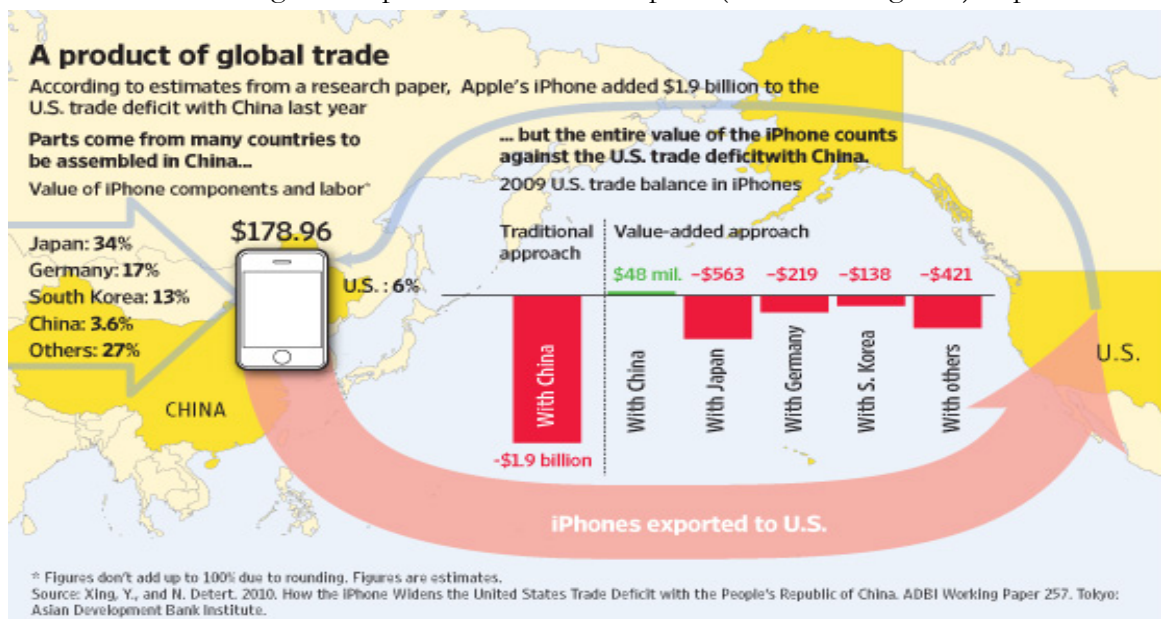
The U.S. trade deficit narrowed in March after widening in the wake of last year's hurricanes



Note: Seasonally adjusted monthly trade balance, goods and services, balance of payments basis  
Source: Commerce Department via St. Louis Fed

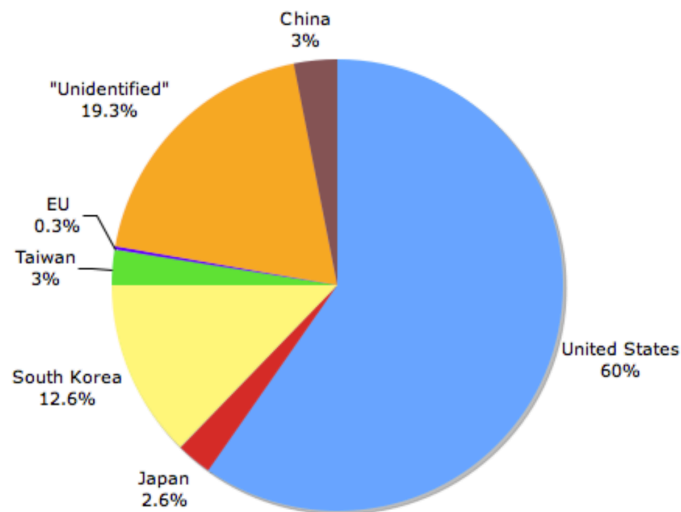
## Discussion 2: Value added for iPhone and iPad

**Value-added**—value of goods exported minus cost of parts (intermediate goods) imported.

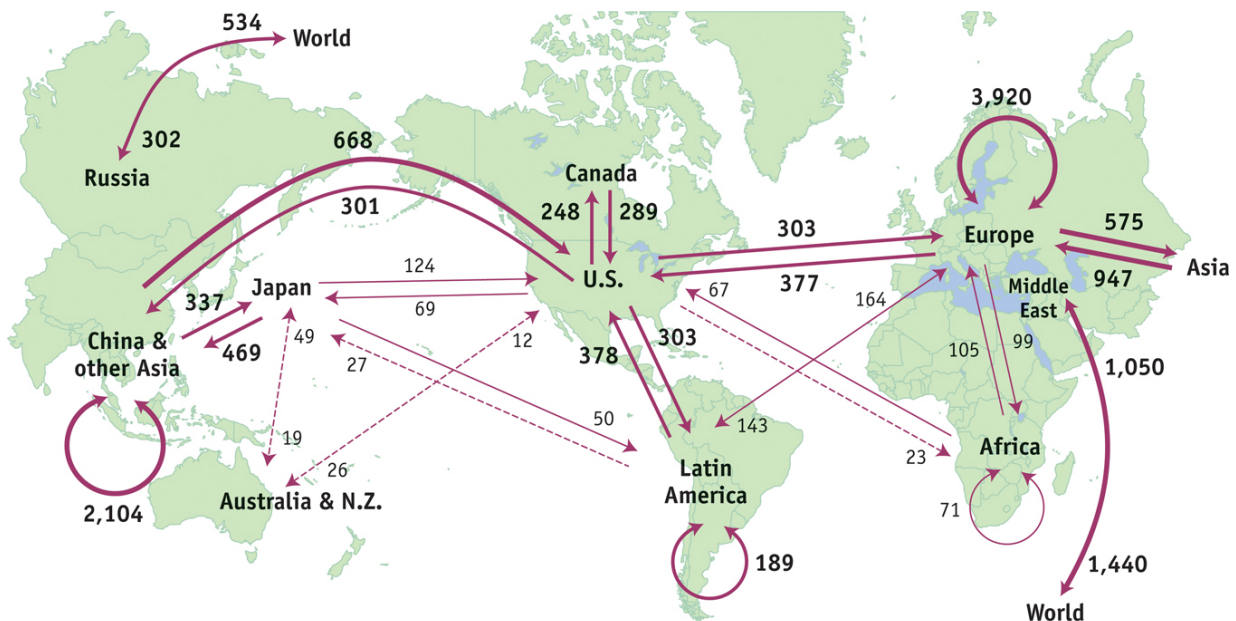


Link: <https://www.theatlantic.com/business/archive/2012/01/which-countries-make-money-off-the-ipad/251654/>

### Who Earns Money When Apple Makes An iPad?



### World Trade Flows



Total world trade flows in 2010: \$16,800 billion

#### World Trade in Goods

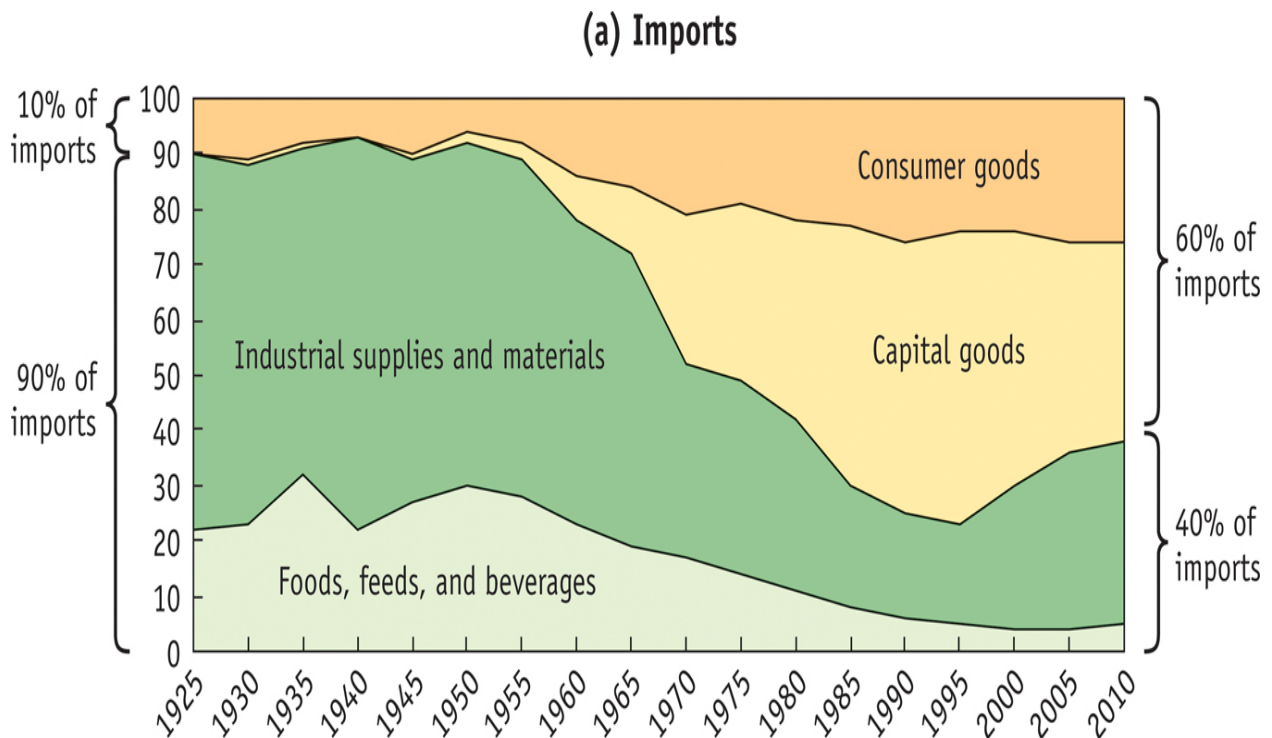
- < \$50 billion
- \$50–150 billion
- \$150–500 billion
- > \$500 billion

- **Share of World Trade**

Share of World Trade (%)		Share of World Trade (%)	
Europe (internal trade)	23	Asia (exports)	34
Europe (internal) plus trade with the U.S.	27	Middle East and Russia (exports)	12
Americas (internal trade)	8	Africa (exports)	2
Europe and the Americas (exports)	51	Australia and New Zealand (exports)	1.6

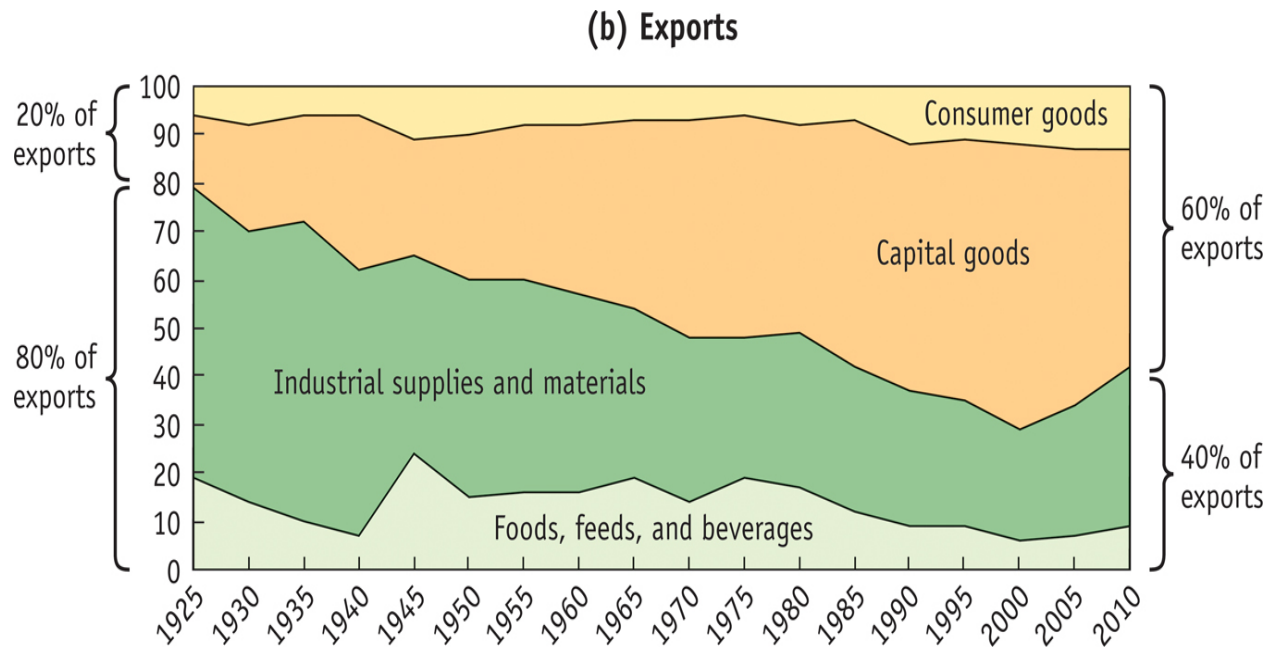
- **How volume and compositions of trade has changed overtime?**

### Changing Composition of Imports

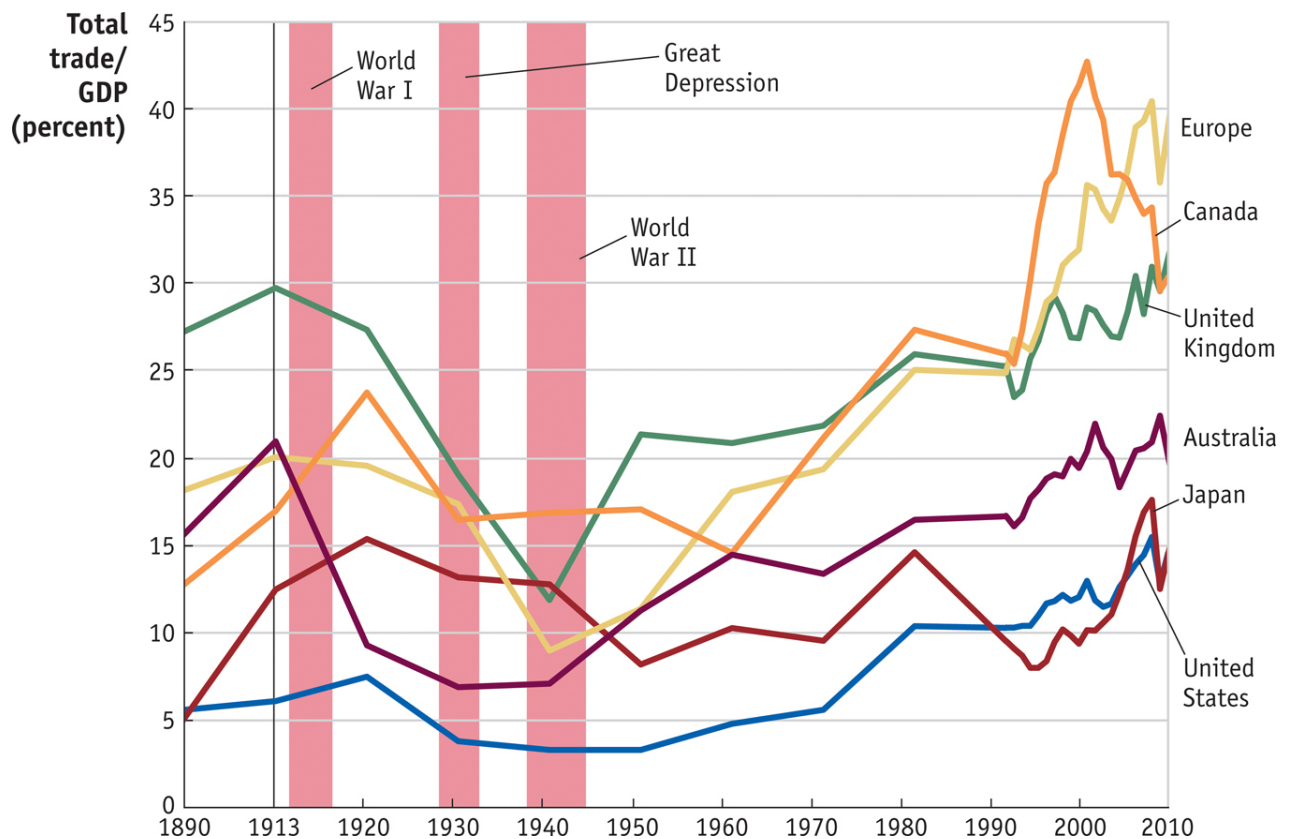




## Changing Composition of Exports



### Trade in Goods and Services relative to GDP



## ■ **Barriers to Trade**

- ⇒ A reason why the trade/GDP ratio differs across countries is because there are factors that influence the amount of goods and services that are traded internationally.
- ⇒ These include **trade barriers** such as import tariffs, transportation costs, customs, laws, events such as wars, and so forth.

## ■ **Timeline of International Trade:**

### **1. First “Golden Age” of Trade (1890 to 1913)**

- ⇒ There were significant improvements in transportation because of steamship and railroad expansion

### **2. Inter-war Period (1913 to 1945)**

- ⇒ The trade to GDP ratio decreased between 1913 and 1920 for countries in Europe, as well as Australia.
- ⇒ It continued to decline with the Great Depression in 1929 and World War II in 1939.
- ⇒ To protect its farmers during this period, the United States passed the Smoot-Hawley Tariff Act in 1930, which raised tariffs on many goods imported from abroad.
- ⇒ In retaliation, European countries, such as France, Italy, and Britain, as well as Canada, imposed their own tariffs and import quotas against American products.
- ⇒ These trade barriers led to a dramatic decline in world trade.

### **3. Second “Golden Age” of Trade (Post War Period, 1945 - 2008)**

- ⇒ With the end of World War II in 1945, countries regained their trade.
- ⇒ In general, world trade improved after 1950 for some countries and by 1960 for others.
- ⇒ Also, the transportation costs reduced which occurred with the invention of the shipping container in 1956.
- ⇒ The ratio of trade to GDP continues to increase.
- ⇒ In 2005, ratio of trade relative to GDP was nearly 30%.

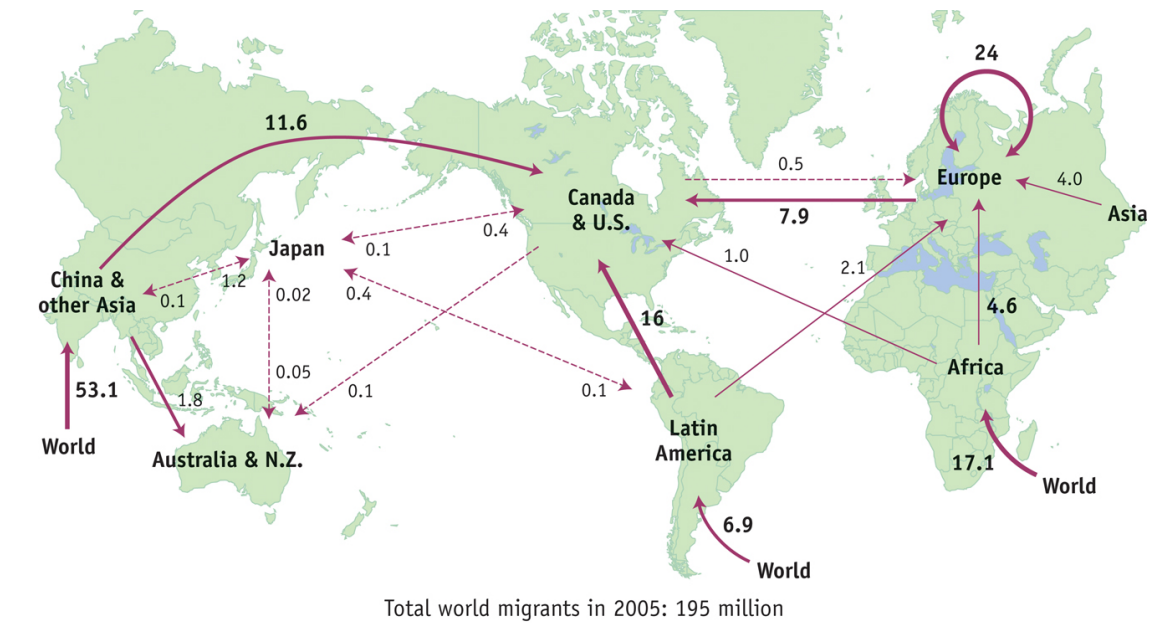
### **4. The Financial Crisis**

- ⇒ In 2008 many countries trade to GDP ratios began to fall as a result of the financial crisis.
- ⇒ Even though the cause of the crisis was unrelated to international trade, the impact on trade was substantial because it sent many countries into recession, leading to a fall in both exports and imports.

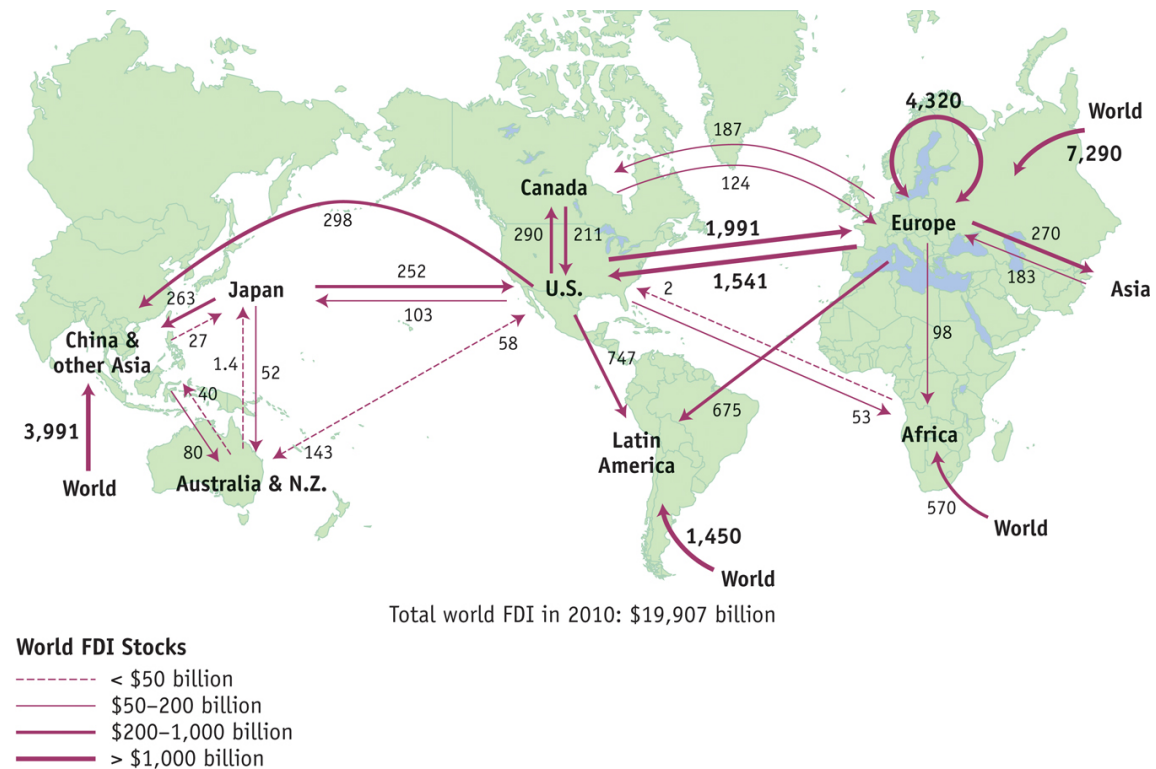
Additional Reading: Richard Baldwin’s Vox article “The Great Trade Collapse: What Caused It and What Does It Mean?” (<https://voxeu.org/article/great-trade-collapse-what-caused-it-and-what-does-it-mean>)



■ **Migration : Movement of people across borders**



■ **Foreign Direct Investment (FDI): Movement of capitals across borders**



- **Horizontal FDI** occurs when a firm from one country owns a company in another industrial country
  - ⇒ Example: Purchase of Rockefeller Center in New York by Japanese investor
- **Vertical FDI** occurs when a firm from an industrial country owns a plant in a developing country
  - ⇒ Example: Intel opens a chips factory in Ireland
  - ⇒ An example of **reverse vertical FDI** is China purchasing established companies based in the US.

#### REFERENCE

Caves, R. E., Frankel, J. A., and Jones, R. W. (1999) *World Trade and Payments : An Introduction* (9<sup>th</sup> ed.). New York: Harper Collins College Publishers.

Feenstra, R. and Taylor, A. (2014). *International Trade* (3<sup>rd</sup> ed.). United States: Worth Publishers.