CHAPTER

1 An Introduction to the World Economy

Learning Objectives

After studying this chapter, students will be able to:

1.1 **Discuss historical measures of international economic integration with data on trade, capital flows, and migration.**

1.2 **Compute the trade-to-GDP ratio and explain its significance.**

1.3 **Describe three factors in the world economy today that are different from the economy at the end of the first wave of globalization.**

1.4 **List the three types of evidence that trade supports economic growth.**

1.5 **Describe the employment possibilities and occupations open to students of international economics.**

INTRODUCTION: INTERNATIONAL ECONOMIC INTEGRATION

In August 2007, a crisis erupted in the housing sector of the United States. At the time, few people realized that the subprime mortgage crisis would become a demonstration of international economic integration or that it would push the world economy to the brink of collapse. The crisis grew through the remainder of 2007 and into 2008, so that by the summer nearly all high-income economies were in deep distress. Contagion from the crisis spread like an epidemic as banks and other financial firms collapsed and solvent firms stopped lending. The scarcity of credit caused difficulties for businesses that could not find financing for their day-to-day operations, while, at the same time, consumers cut back on their spending and businesses cut back on new investment. By the end of 2008, economies around the world were in recession, with the notable exceptions of China, India, and the major oil producers.

In early 2020, another crisis, the deadly COVID-19 pandemic, caused national economies to suddenly shut down and severely disrupted the international flow of goods, services, and people. The effects are still developing as this text goes to print, but even though the pandemic has an entirely different origin than the financial crisis of 2007–09, both are examples of crises leading to severe economic recessions in many countries around the world. Both are extreme examples, but they are not unique. The Russian Crisis of 1998–99, the Asian Crisis of 1997–98, the Mexican Crisis of 1994–95, the Latin American Debt Crisis of 1982–89, and a number of others caused major damage to financial systems, businesses, and households, both in the places where they originated and in many other countries.

The international integration of national economies has brought many benefits to nations across the globe, including technological innovation, less expensive products, and greater investment in regions where local capital is scarce, to name a few. But it has also made countries vulnerable to economic problems that have become more easily transmitted from one place to another. Given that the benefits and costs of international economic integration are surrounded by controversy, it is worth clarifying what we mean by the term *international economic integration,* or *globalization in the economic sphere*. To help us understand these forces better, a historical perspective is also useful.

ELEMENTS OF INTERNATIONAL ECONOMIC INTEGRATION

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Most people would agree that the major economies of the world are more integrated than at any time in history. Given our instantaneous communications, modern transportation, and relatively open trading systems, most goods can move from one country to another without major obstacles and at relatively low cost. For example, most cars today are made in fifteen or more countries after you consider where each part is made, where the advertising originates, who does the accounting, and who transports the components and the final product. Nevertheless, the proposition that today's economies are more integrated than at any other time in history is not simple to demonstrate. It is clear that our current wave of economic integration began in the 1950s, with the reduction of trade barriers after World War II. In the 1970s, many countries began to encourage financial integration by increasing the openness of their capital markets. The advent of the Internet in the 1990s, along with the other elements of the telecommunications revolution, pushed economic integration to new levels as multinational firms developed international production networks and markets became ever more tightly linked.

Today's global economy is not the first instance of a dramatic growth in economic ties between nations, however, as there was another important period between approximately 1870 and 1913. New technologies such as transatlantic cables, steam-powered ships, railroads, and many others led the way, much as they do today. For example, when the first permanent transatlantic cable was completed in 1866, the time it took for a New York businessperson to complete a financial transaction in London fell from approximately three weeks to one day, and by 1914 it had fallen to one minute as radio telephony became possible.

We have mostly forgotten about this earlier period of economic integration, and that makes it easier to overestimate integration today. Instantaneous communications and rapid transportation, together with the easy availability of foreign products, often cause us to lose sight of the fact that most of what we buy and sell never makes it out of our local or national markets. We rarely pause to think that haircuts, restaurant meals, gardens, health care, education, utilities, and many other goods and services are partially or wholly domestic products. In the United States, for example, about 83.4 percent of goods and services are produced domestically, with imports (16.6 percent) making up the remainder of what we consume (2014). By comparison, in 1890 the United States made about 92 percent of its goods and services, a larger share than today but not radically different.

The question as to whether we are more economically integrated today or during some period in the past is not academic. Between the onset of World War I in 1914 and the end of World War II in 1945, the world economy suffered a series of human-made catastrophes that de-integrated national economies. Two world wars and a global depression caused most countries to close their borders to foreign goods, foreign capital, and foreign people. Since the end of World War II, many of the economic linkages between nations have served to repair the damage done during the first half of the twentieth century, but there is no reason to think that events might not cause a similar decoupling in the future.

Understanding international economic integration requires us to define what we mean by the term. Economists usually point to four criteria or measures for judging the degree of integration, which are trade flows, capital flows, people flows, and the similarity of prices in separate markets. The first three points are relatively self-explanatory, while the similarity of prices refers to the fact that integrated economies have price differences that are relatively small and are due mainly to differences in transportation costs. Goods that can move freely from a low-cost to a high-cost region should experience price convergence as goods move from where they are plentiful and cheap to where they are relatively scarcer and more expensive. All of these indicators—trade flows, factor (labor and capital) movements, and similarity of prices—are measures of the degree of international economic integration.

The Growth of World Trade

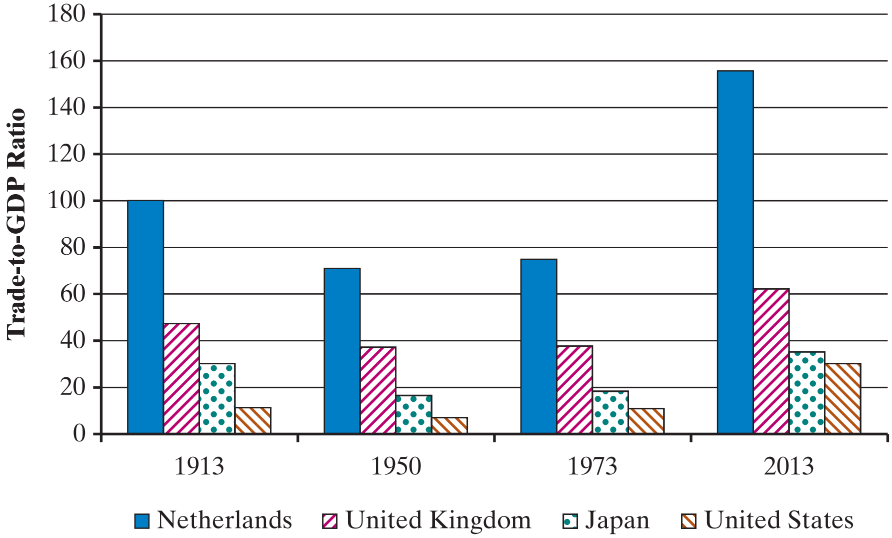
Since the end of World War II, world trade has grown much faster than world output. One way to show this is to estimate the ratio of exports by all countries to total production by all countries. In 1950, total world exports—which are the same as world imports—are estimated to have been 5.5 percent of world **gross domestic product (GDP)**, a measure of total production. Sixty-three years later, in 2013, they were approximately 30 percent of world GDP, nearly six times more important relative to the size of the world economy. One important measure of international trade in a nation's economy is the sum of exports plus imports divided by the GDP. Specifically, it is the value of all final goods and services produced inside a nation during some period, usually one year. The **trade-to-GDP ratio** is represented as follows:

$$\text{Trade to GDP ratio} = (\text{Exports} + \text{Imports}) \div \text{GDP}$$

The ratio does not tell us about a country's trade policies and countries with higher ratios do not necessarily have lower barriers to trade, although that is one possibility. In general, large countries are less dependent on international trade because their firms can reach an optimal production size without having to sell to foreign markets. Consequently, smaller countries tend to have higher ratios of trade to GDP.

Figure 1.1 shows the trade-to-GDP ratio for four countries between 1913 and 2013. The decline in trade between the onset of World War I and 1950 is clearly visible in each country, as is the subsequent increase after 1950. Another pattern shown in Figure 1.1 is the smaller ratios for the United States and Japan, which have the largest populations, and the much higher ratio for the Netherlands, which has the smallest population in the sample. In general, smaller countries trade more than larger ones since they cannot efficiently produce a wide range of goods and must depend on trade to a greater extent. For example, if the Netherlands were to produce autos solely for its own market, it would lack

FIGURE 1.1 Trade-to-GDP Ratios for Four Countries, 1913–2013



Data from Maddison, A. (1991). "Dynamic Forces in Capitalist Development" © 1991 Oxford University Press and The World Bank, *World Integrated Trade Solution*, © James Gerber.

economies of scale and could not produce at a competitive cost, whereas the U.S. market can absorb a large share of U.S. output. Hence, the trade-to-GDP ratio measures the relative importance of international trade in a nation's economy, but it does not provide any direct information about trade policy or trade barriers.

Figure 1.1 gives a historical overview of the decline and subsequent return of international trade after World War II, but it obscures important changes in the composition of trade flows from early in the twentieth century to those at the end of the century. Before World War I most trade consisted of agricultural commodities and raw materials, while current trade is primarily manufactured consumer goods and producer goods (machinery and equipment). Consequently, today's manufacturers are much more exposed to international competition than was the case in 1900. In addition, much of the growth of world trade since 1950 has been accomplished by multinational corporations. With production sites in multiple countries and inputs that pass back and forth between affiliates, multinational corporations have become dramatically important. This trend has been supported and encouraged by the telecommunications revolution and transportation improvements that have lowered the costs of coordinating operations physically separated by oceans and continents. And finally, it has also become possible to coordinate service operations such as accounting and data processing from a great distance. In sum, trade today is qualitatively different than in 1913, and the growth of the trade-to-GDP ratio since 1950 does not tell the whole story.

Capital and Labor Mobility

In addition to exports and imports, factor movements also are an indicator of economic integration. As national economies become more interdependent, labor and capital should move more easily across international boundaries. Labor, however, is less mobile internationally than it was in 1900. Consider, for example, that in 1890 approximately 14.5 percent of the U.S. population was foreign born, while in 2010, the figure was 12.9 percent. In 1900, many nations had open door immigration policies, and passport controls, immigration visas, and work permits were exceptions rather than rules. The movement of people was severely restricted by the two world wars and the Great Depression of the 1930s. In the 1920s, during the interwar period, the United States sharply restricted immigration with policies that lasted until the 1960s, when changes in immigration laws once again encouraged foreigners to migrate to the United States.

On the capital side, measurement is more difficult, since there are several ways to measure capital flows. The most basic distinction is between flows of financial capital representing paper assets such as stocks, bonds, currencies, bank accounts, and flows of capital representing physical assets such as real estate, factories, and businesses. The latter type of capital flow is called **foreign direct investment (FDI)**. To some extent, the distinction between the two types of capital flows is immaterial because both represent shifts in wealth across national boundaries and both make one nation's savings available to another.

When we compare international capital flows today to a century ago, there are two points to keep in mind. First, savings and investment are highly correlated. That is, countries with high savings tend to have high rates of investment, and low savings is correlated with low investment. If there were a single world market in which capital flowed freely and easily, this would not necessarily be the case. Capital would flow from countries with abundant savings and capital to countries with low savings and capital, where it would find its highest returns. Second, a variety of technological improvements increased capital flows in the 1800s, as they are doing today. Transoceanic cables and radio telephony have already been mentioned, but capital flows also increased in the late 1800s because there were new investment opportunities such as national railroad networks and other infrastructure, both at home and abroad.

If we compare the size of capital flows today to the previous era of globalization, flows today are much larger but mainly because economies are larger. Relative to the size of economies, the differences are not great and may even favor the 1870 to 1913 period, depending on what is measured. Great Britain routinely invested 9 percent of its GDP abroad in the decades before 1913, and France, Germany, and the Netherlands were as high at times. For significant periods, Canada, Australia, and Argentina borrowed amounts that exceeded 10 percent of their GDP, a level of borrowing that sends up danger signals in the world economy today. In other words, it is hard to make the argument that national economies have a historically unprecedented level of international capital flows today.

While the relative quantity of capital flows today may not be that much different for many countries, there are some important qualitative differences. First, there are many more financial instruments available now than there were a century ago. These range from relatively mundane stocks and bonds to relatively exotic instruments such as derivatives, currency swaps, and others. By contrast, at the turn of the twentieth century, there were many fewer companies listed on the world's stock exchanges, and most international financial transactions involved the buying and selling of bonds.

A second difference today is the role of foreign exchange transactions. In 1900, countries had fixed exchange rates and firms in international trade or finance had less day-to-day risk from a sudden change in the value of a foreign currency. Many firms today spend significant resources to protect themselves from sudden shifts in currency values. Consequently, buying and selling assets denominated in foreign currencies is the largest component of international capital movements. For example, according to the Bank for International Settlements in Geneva, Switzerland, *daily* foreign exchange transactions in 2013 were equal to \$5.3 *trillion*. In 1973, at the end of the last era of fixed exchange rates, they were \$15 billion.

The third major difference in capital flows is that the costs of foreign financial transactions have fallen significantly. Economists refer to the costs of obtaining market information, negotiating an agreement, and enforcing the agreement as **transaction costs**. They are an important part of any business's costs, whether it is a purely domestic enterprise or a company involved in foreign markets. Due to sheer distance, as well as differences in culture, laws, and languages, transaction costs are often higher in international markets than in domestic ones. Today's lower transaction costs for foreign investment mean that it is less expensive to move capital across international boundaries.

The volatile movement of financial capital across international boundaries is often mistakenly regarded as a new feature of the international economy. Speculative excesses and overinvestment, followed by capital flight and bankruptcies, have occurred throughout the modern era, going back at least to the 1600s and probably earlier. U.S. and world history show a number of such cases. Financial crises are not a new phenomenon, nor have we learned how to avoid them—a fact driven home by the recent subprime mortgage crisis.

Features of Contemporary International Economic Relations

While international economic integration has been rapid, it does not appear to be historically unprecedented. The trade-to-GDP ratio is about 50 percent higher in the U.S. economy than it was in 1890, and manufacturers and service providers are more exposed to international forces. Labor is less mobile than in 1900 due to passport controls and work permits, but capital is more mobile and encompasses a larger variety of financial forms. Prices in many U.S. and foreign markets tend to be similar, although there are still significant differences. In quantitative terms, the differences between today and 120 years ago may not be as great as many people imagine, but qualitatively, a number of additional features of the world economy separate the first decade of the twenty-first century from the first decade of the twentieth.

Deeper Integration High-income countries have low barriers to imports of manufactured goods. There are some exceptions (processed foodstuffs and apparel), but as a general rule import **tariffs** (taxes on imports) and other barriers such as **quotas** (quantitative restrictions on imports) are much less restrictive than they were in the middle of the twentieth century. As trade barriers came down during the second half of the twentieth century, three other trends began to intensify economic integration between countries. First, lower trade barriers exposed the fact that most countries have domestic policies that are obstacles to international trade. National regulations governing labor, environmental, and consumer safety standards; rules governing investment location and performance; rules defining fair and unfair competition; rules on government "buy-national" programs; and government support policies for specific industries—all have little impact on trade until formal trade barriers start to fall and trade volume increases. These policies were not implemented to protect domestic industries from foreign competition, and as long as tariffs were high and trade flows were limited, they did not matter much to trade relations. Once tariffs fell, however, many forms of domestic policies began to be viewed as barriers to increased trade. Economists sometimes refer to the reduction of tariffs and the elimination of quotas as **shallow integration** and negotiations over domestic policies that impact international trade as **deep integration**. Deep integration is much more contentious than shallow integration and much more difficult to accomplish since it involves domestic policy changes that align a country with rules that are created abroad or at least negotiated with foreign powers.

A second noticeable trend over the past few decades is that technologically complicated goods such as smartphones and automobiles are made of components produced in more than one country and, consequently, labels such as "Made in China" or "Made in the USA" are less and less meaningful. Low tariffs along with innovations in transportation and communication technologies have enabled firms to locate production of the different components of a sophisticated product in different countries. For example, the hardware for a 3G iPhone is produced in Germany, Korea, Japan, and the United States, and then it is assembled in China. The most valuable share of the hardware is made in Japan, but no one thinks of this device as a Japanese phone. In this case, as in many others, it is not accurate to say the product is made in one particular country since the parts come from all over and the product is the result of a multinational effort involving firms and workers from many different countries.

A third trend is the recent rise of organized movements opposed to international trade. In part, these movements are responding to the two trends cited in the previous paragraphs: deeper integration reduces national autonomy, and the movement of production processes abroad appears to threaten the well-being of national industries, communities, and families. Economic analysis that tries to separate the effects on economic security of international trade from those of changing technology is difficult and incomplete. Nevertheless, the growth of organized opposition to open trade is not the first such occurrence. During the first wave of globalization, populist movements arose in opposition to international integration and the rise of giant industrial firms. Ultimately, national governments were forced to devise ways to limit the power of industrial interests, and international integration was reversed by World War I. How the current trend of growing anti-international trade movements develops is anyone's guess.

Multilateral Organizations At the end of World War II, the United States, Great Britain, and their allies created a number of international organizations to maintain international economic and political stability. Although the architects of these organizations could not envision the challenges and issues they would confront over the next fifty years, the organizations were given significant flexibility, and they continue to play an important and growing role in managing the issues of shallow and deeper integration.

The International Monetary Fund (IMF), the World Bank, the General Agreement on Tariffs and Trade (GATT), the United Nations (UN), the World Trade Organization (the WTO began operation in 1995 but grew out of the GATT), and a host of smaller organizations have broad international participation. They serve as forums for discussing and establishing rules, as mediators of disputes, and as organizers of actions to resolve problems. All of these organizations are controversial and have come under increasing fire from critics who charge that they promote unsustainable economic policies or that they protect the interests of wealthy countries. Others argue that they are unnecessary foreign entanglements that severely limit the scope for national action. (Chapter 2 examines this issue in detail.) These organizations are attempts to create internationally acceptable rules for trade and commerce and to deal with potential disputes before they spill across international borders; they are an entirely new element in the international economy.

Regional Trade Agreements Agreements between groups of nations are not new. Free-trade agreements and other forms of preferential trade have existed throughout history. What is new is the significant increase in the number of **regional trade agreements (RTAs)** that have been signed in the past twenty years.

The formation of preferential trade agreements is controversial. Trade opponents dislike the provisions that expose more of the national economy to international competition, whereas some trade proponents dislike preferences that favor countries included in the agreement at the expense of countries outside the agreement. The North American Free Trade Agreement (NAFTA), the European Union (EU), the Mercado Común del Sur (MERCOSUR), and the Asia Pacific Economic Cooperation (APEC) are examples of RTAs, but more than 417 have been recorded by the World Trade Organization (2016).

Trade and Economic Growth

Many people are more than a little apprehensive about increased international economic integration. The list of potential problems is a long one. More trade may give consumers lower prices and greater choices, but it also means more competition for firms and workers. Capital flows make more funds available for investment purposes, but they also increase the risk of spreading financial crises internationally. Rising immigration means higher incomes for migrants and lower labor costs or a better pool of skills for firms, but it also means more competition in labor markets and, inevitably, greater social tensions. International organizations may help resolve disputes, but they may also reduce national sovereignty by putting pressure on countries to make operational changes. Free-trade agreements may increase trade flows, but again, that means more competition and more pressure on domestic workers and firms.

In general, economists remain firmly convinced that the benefits of trade outweigh the costs. There is disagreement over the best way to achieve different goals (for example, how to protect against the harmful effects of sudden flows of capital), but the general belief that openness to the world economy is a superior policy to closing off a country is quite strong. To support this stance, economists can point to the following kinds of evidence:

- Casual empirical evidence of historical experience
- Evidence based on economic models and deductive reasoning
- Evidence from statistical comparisons of countries

While none of these is conclusive by itself, together they provide solid support for the idea that open economies generally grow faster and prosper more than closed ones.

The historical evidence examines the experiences of countries that tried to isolate themselves from the world economy. There are the experiences of the 1930s, when most countries tried to protect themselves from world events by shutting out flows of goods, capital, and labor. This did not cause the Great Depression of the 1930s, but it did worsen it, and ultimately it led to the misery and tragedy of World War II. There are also the parallel experiences of countries that were divided by war, with one side becoming closed to the world economy, and the other side open. Germany (East versus West), Korea (North versus South), and China (mainland China before the 1980s versus Taiwan and Hong Kong) are the best examples.

Economic theory generally supports these examples by suggesting the causal mechanisms that lead from trade to faster growth. Generally, the benefits of increased innovation, competitive pressure to raise productivity levels, and access to new technologies and ideas that are fostered by trade are positive factors. On the consumer side, trade provides a greater variety of goods and offers them at lower prices.

The statistical evidence of the benefits of more open economies comes from comparisons of large samples of countries over different periods. While the statistical tests of the relationship between trade policy and economic growth suffer from their own technical shortcomings, the results consistently show that more open economies grow faster. These results cannot be viewed as absolutely conclusive, but together with trade theory and the casual empirical evidence drawn from historical experiences, the available statistical analysis provides additional support for the notion that trade is usually beneficial.

TWELVE THEMES IN INTERNATIONAL ECONOMICS

Each of the twelve themes discussed next are examined in the chapters that follow. These themes are overlapping and multidimensional and often go beyond pure economics. International economic analysis cannot claim the final word, but we hope it will provide you an analytically powerful and logically consistent approach for thinking about the issues raised by these themes.

The Gains from Trade and New Trade Theory (Chapters 3, 4, and 5)

Why is international trade desirable? We have briefly addressed this issue, and we will consider additional points as we continue. Given that economic analysis clearly demonstrates that the benefits of international trade outweigh the costs, it is not surprising that virtually all economists generally support open markets and increased trade. The benefits of international trade were first analyzed in the late 1700s and are perhaps the oldest and strongest finding in all of economics. More recently, economists have begun to analyze returns to scale within firms and industries. Under the label "New Trade Theory," economists have demonstrated a number of new sources of national welfare improvements due to international trade and added greater sophistication to our understanding of market structure and trade effects.

Wages, Jobs, and Protection (Chapters 3, 6, 7, and 8)

International trade raises national welfare, but it does not benefit every member of society. Workers in firms that cannot compete may be forced to find new jobs or take pay cuts. The fact that consumers pay less for the goods they buy or that exporters hire more workers may not help laid-off workers. Increased awareness of the international economy has heightened the fears of people who feel vulnerable to change. They are concerned that wages in high-income countries must fall in order to compete with workers in low-wage countries and that their jobs may be moved overseas. One of the key challenges for policymakers is to find the right mix of domestic policies so that the nation benefits from trade without creating a backlash from those individuals and industries that are hurt.

Trade Deficits (Chapters 9, 11, and 12)

In 1980, a comprehensive measure of trade accounts in the United States showed that there was a slight surplus. Every year since then, the United States has had a trade deficit, and the sum of the deficits since 2000 is more than $7.9 trillion (2001 through 2010). The United States was not the only country running deficits, but each year a country runs a deficit in its trade accounts, it must borrow from abroad, essentially selling a piece of its future output in order to obtain more goods and services today. As the United States and other countries borrowed, China, Germany, Japan, and oil producers like Saudi Arabia and Russia lent. These large imbalances in lending and borrowing played a key role in the financial crisis of 2007–2009 and the development of economic conflicts between the United States, China, and other nations.

Regional Trade Agreements (Chapters 2, 13, and 14)

Currently (2020) there are more than 303 regional trade agreements in force around the world, and over 150 more have been negotiated but are not yet active. There are agreements to reduce trade barriers on every continent that include some of the world's most important economies. For example, the European Union (EU) allows free movement of goods, services, capital, and people in its twenty-seven member countries and has similar agreements with several additional non-EU nations. Mexico, Chile, Canada, and, until recently, the United States are active in creating new agreements in the Americas, Asia, and Europe. The ten members of the Association of South East Asian Nations (ASEAN) have moved to create a free-trade zone, while individual countries have signed additional agreements. China has begun to build a set of extensive regional ties in Asia and beyond, and Japan has signed a trade agreement with the European

Union. The pros and cons of these and other agreements are an active area of economic analysis and will be considered in several chapters.

The Resolution of Trade Conflicts (Chapters 2, 7, and 8)

Commercial conflicts between nations cover a wide variety of issues and complaints. In one sense these conflicts are routine, as the WTO provides a formal dispute resolution procedure that has the assent of most of the world's nations. The WTO process does not cover all goods and services, however, nor does it say much about a large number of practices that some nations find objectionable. The ability of nations to resolve conflicts without resorting to protectionist measures is one key to maintaining a healthy international economic environment. Disputes can become acrimonious, so it is imperative that differences of opinion are not permitted to escalate into a wider disagreement. Trade wars are not real wars, but they are harmful nonetheless.

The Role of International Institutions (Chapters 2, 8, and 12)

The organization with the greatest responsibility for resolving trade disagreements is the WTO. The WTO came into existence in 1995 and was an adaptation of the GATT, which was created shortly after World War II. Resolving trade disputes is only one of the new roles played by international organizations. Various organizations offer development support, technical economic advice, emergency loans in a crisis situation, and other services and assistance. These organizations perform services that were not offered before World War II (development support), or that were done by a single country (lending in a crisis)—usually the world's greatest military power. They exist today only through the mutual consent and cooperation of participating nations; without that cooperation, they would dissolve. Their abilities are limited, however. They cannot prevent crises, and they cannot make poor countries rich. They are also controversial and are viewed by some as tools of the United States or as a threat to national independence. They are very likely to grow in function, however, as many international problems cannot be solved by individual nations alone.

Exchange Rates and the Macroeconomy (Chapters 10 and 11)

Seventeen of the twenty-seven members of the EU have adopted the euro as a common currency, and several more are preparing to join them in spite of the euro crisis that began in 2011. Panama, El Salvador, and Ecuador use the U.S. dollar. Some members of the U.S. Congress and some economists think that China artificially manipulates its currency to gain commercial advantages, and China's leaders worry that the United States might let the dollar sink in value to depreciate its foreign debt. Exchange rate systems come in a variety of forms and link the domestic economy to the rest of the world. They can help protect a country against harmful developments outside its borders, but they can also magnify and transmit those developments to the domestic economy. Exchange rates play a key role in the international economy.

Financial Crises and Global Contagion (Chapter 12)

As international trade and investment barriers declined, and as new communications and transportation systems developed, increasing quantities of capital flowed across national borders. These flows were encouraged by financial innovation and a general spirit of deregulation that held sway in much of the world from the late 1970s forward. Capital flows brought many desirable things, such as investment, new technology, and higher consumption, but they also often outpaced our ability to monitor and supervise and were frequently at the root of financial crises, including the severe global crisis that began in 2007. Economists are engaged in a broad discussion today, aimed at finding techniques for reducing the macroeconomic and financial volatility caused by capital flows without hampering the new investment and lending that they provide.

Capital Flows and the Debt of Developing Countries (Chapters 2, 9, and 12)

In 1996, the World Bank and the IMF began a debt relief program for a group of forty-two countries labeled the *Highly Indebted Poor Countries (HIPC)*. Thirty-four of these countries are in Africa. At the same time, nongovernmental groups and celebrities, such as Bono, began to lobby successfully for a reduction in the debts of poor countries and for changes in the lending policies of rich countries. In many parts of the world, problems of extreme poverty are compounded by large foreign debts that are unlikely to be repaid and often require a constant supply of new loans to pay interest on the old ones. The search for workable solutions is complicated in the borrowing countries by economic shocks, corruption, and unsustainable economic policies. Common problems in the lending countries include unwise loans to corrupt dictators and loans for some expensive and unnecessary goods sold by rich countries.

Latin America and the World Economy (Chapter 15)

In Latin America, the 1980s are known as the *Lost Decade.* High levels of debt, deep recessions, and hyperinflation caused the region to lose a decade of growth and development. In response, many countries embarked on a profound shift in their economic policies. They opened markets, allowed increased foreign investment, signed trade agreements, and ended a long period of relative isolation from the world economy. These policy changes became known as the Washington Consensus and helped to bring an end to the Lost Decade, but few economists think the policies were successful. Growth remained relatively low in many places, financial crises continued to undermine economic gains, and traditional issues of economic fairness were largely ignored. Latin American countries have developed a wide variety of new policies and experiments as they try to reduce poverty, generate prosperity, and provide opportunity for all their citizens.

Export-Led Growth in East Asia (Chapter 16)

Throughout the late 1980s and into the 1990s, it was hard to ignore the East Asian "miracle." While some economists point out that it was not really a miracle—just a lot of hard work and sound economic policies—the growth rates of the "high-performance Asian economies" were unique in human history. Rates of growth of real GDP *per person* commonly reached 4 to 5 percent per year, with 6 to 8 percent not unusual. In 1997, an economic and financial crisis hit the region hard. Although there were lingering effects, by 2000 the economies of the region's developing countries were growing at more than 7 percent a year. One of the dominant traits of the countries in East Asia is the extent to which they are outward looking and dependent on the growth of their manufactured exports.

China and India in the World Economy (Chapter 17)

China and India are the two largest populations in the world. Together, they account for more than a third of humanity. Throughout much of the twentieth century, however, neither country had significant impact on the world economy. Change began in 1978, when China started its dramatic shift away from isolationism. India's transformation from a relatively closed economy toward greater openness began in 1991 and has proceeded at a slower pace. Nevertheless, its sheer population size coupled with the technical excellence of its scientists and engineers has turned it into a growing force in the world economy. Low wages, competitive firms, new technologies, and innovations in transportation and communication networks have increased the presence of both countries in the world economy and given rise to new tensions and new opportunities.

WHAT DO INTERNATIONAL ECONOMISTS DO?

LO 1.5 Describe the employment possibilities and occupations open to students of international economics.

International economics can be a stand-alone major or, more often, a specialty within the field of general economics. It is also frequently included within degree programs in diplomacy, international relations, international studies, and international business. Specialists in international economics have a wide range of opportunities to work at home and abroad, and in any field that requires an understanding of international finance, international trade, foreign relations, or conditions in foreign countries. This includes many of the subfields of finance, such as banking, insurance, and investing, as well as international organizations, think-tanks, governments, private companies including law firms that do business internationally, and education. Many international economists work as analysts in one capacity or another. For example, research analysts provide background on market and business conditions in foreign countries; policy analysts help governments, industries, and international organizations understand the influence of different policies on international trade and finance or the role of policies in promoting economic development. Other possibilities include positions as market or business analysts, international trade specialists, political risk specialists, and foreign aid specialists. International economics is also excellent training to work as a journalist in the fields of international business and international affairs, and the diplomatic corps of every nation employs international economists to help gather economic information about foreign economies and to report on conditions abroad.

There are a number of reasons why international economics prepares students for many possible career opportunities. First, it requires some knowledge of the world beyond one's own country and culture. Understanding the challenges and opportunities that other countries face is an important part of the training and an invaluable asset in any organization with interests that cross national boundaries. Second, the material is rigorously analytical and requires students to master and apply abstract models in real-world contexts. Mastery of the core ideas also means an understanding of the assumptions and limits of the models without tossing out the insights they provide. In this sense, the ideas developed in international economics provide a variety of ways to examine economic conditions while maintaining a high degree of realism regarding unique and special conditions. Third, students will become knowledgeable in the reading and interpreting of charts and tables. This is a skill that is much in demand because it helps individuals communicate clearly and succinctly and makes the organization where they work more effective.

Vocabulary

deep integration
foreign direct investment (FDI)
gross domestic product (GDP)
quotas
regional trade agreement (RTA)
shallow integration
tariffs
trade-to-GDP ratio
transaction costs

Review Questions

1.1 How can globalization and international economic integration be measured?

1.2 Considering the criteria used for judging the degree of integration, what can you tell about India? Is it more or less integrated than it was 20 years ago?

1.3 What does the trade-to-GDP ratio measure? Does a low value indicate that a country is closed to trade with the outside world?

1.4 Describe the changes of trade-to-GDP ratio and the composition of trade for leading industrial economies between 1910 and 1950.