I

The Dawn of the Chinese Century

Economists and editorial writers often paint China's ascent as one more case of an emerging economy on its way up, preceded by Japan and the Asian "tigers" (South Korea, Singapore, Taiwan, and Hong Kong), and soon to be joined by India. It is anything but: China's rise has more in common with the rise of the United States a century earlier than with the progress of its modern-day predecessors and followers. What we are witnessing is the sustained and dramatic growth of a future world power, with an unmatched breadth of resources, lofty aspirations, strong bargaining position, and the financial and technological wherewithal of an established and business-savvy Diaspora. The impact of a rising China on the countries of the world—both developed and developing—will be enormous, and so will be the need to develop strategies and responses to meet the challenge.

This book is not about China bashing in the tradition of the Japanbashing media of the 1980s, nor a glowing praise of the "Japan as Number 1" genre. Rather, its aim is to capture the impact that the inevitable ascent of China will have on businesses, employees, and consumers around the world—especially in the United States—and assess what firms and individuals will have to do to remain competitive in the new order. It is the position of this book that the "dislocations" brought about by China's advance are not cyclical and temporary but represent fundamental restructuring of the global business system and a repositioning of its key constituencies. We are about to wake up to a new business environment, with new ground rules for business competition, fresh terms of employment, and novel consumption patterns—one that will redraw the battle lines on the political, economic, and social fronts, and one that will place new challenges at the doorstep of nations, firms, and individuals.

China in the Global Economy

If you adjust for purchasing power differentials, China is already the world's second largest economy. Growing at a faster clip than any other major nation, it is on course to surpass the United States as the world's largest economy within two decades. Some observers discount the Chinese growth numbers as exaggerated, but shaving a point, as they suggest, of a GDP growth rate of seven to eight percent would still leave China with the most rapid growth rate in either the developed or developing world over a sustainable time period. Other observers, relying on proxies such as energy consumption, argue that China's growth rate is actually higher than the official numbers suggest. While the Chinese economy faces some serious roadblocks, such as a crumbling banking system, an inefficient service sector, and a significant disenfranchised element, these obstacles are more likely to slow rather than stop China's economic march.

In many industries, especially those that are labor intensive, China is by now the dominant global player. China-based factories make 70 percent of the world's toys, 60 percent of its bicycles, half its shoes, and one-third of its luggage. In those product categories, it is often impossible to find a non-Chinese product on store shelves. In some other product categories, such as textiles and garments, China's share has been held back by quota and tariff walls that are scheduled to come down following the country's accession to the World Trade Organization (WTO) and the expiration of international trade regimes. China, though, is not content with remaining a low-tech, labor-intensive

manufacturer. It is already active in areas where technology plays an important role and labor is not the dominant cost factor. The country builds half of the world's microwave ovens, one-third of its television sets and air conditioners, a quarter of its washers, and one-fifth of its refrigerators; these products represent the fastest-growing segment of its exports. Manufacturers in other countries increasingly rely on Chinese components or subassemblies to stay competitive.

Unlike Japan and Korea, China will not let go of the labor-intensive segment as it moves up the ladder. Instead, it will leverage its dominance in labor-intensive and mid-technology industries to fund a major push into knowledge-intensive areas that will drive the future world economy. It is this combined push that will catapult China into the ranks of leading economic powers, and it is this blend that will pose unprecedented challenges to its global competitors. With an increasingly assertive foreign policy, China is also determined to translate its growing economic muscle into geo-political stature and counterbalance what it sees as America's global hegemony. At the same time, like other nations, China will pull its growing political weight in promoting its economic interests.

Resources and Capabilities

The resources that China brings to the table are all too often discounted and misunderstood. To say that this is a country of 1.3 billion people has become some sort of a cliché, until one considers the implications of this enormous size. Foreign firms salivated for years at the thought of selling a toothbrush to every Chinese, a delusion and a symbol of corporate utopia when it first emerged in the early 1980s, but increasingly a reality, even if confined by region or product category. China is already the largest market for Boeing's commercial aircraft and American machine tool makers, and its automotive market is the most promising in the world. (China is already Volkswagen's biggest foreign market, ahead of the United States.)

The attractiveness of its domestic market provides China with tremendous bargaining power, a trump card that was unavailable to Japan and South Korea before it. The lure of its domestic market enables China to require technology transfer as a condition for foreign investor entry, wringing unprecedented concessions. In the automotive industry, foreign firms such as General Motors agreed to establish research and

development centers at a scope never before contemplated in a developing market. Not only did these manufacturers agree to transfer technology that is arguably close to their core capabilities, but they consented to do so in an environment with virtually no protection of intellectual property rights (IPR) and in parallel alliances never before seen: China is the only country in the world where domestic automotive makers maintain equity ventures with competing foreign partners, which makes it possible to learn "best practices" from both and end up with potentially more knowledge than either foreign party. The aim is to produce Chinese multinationals that will hold their own in a global economy and replicate the success of Toyota, Sony, and Samsung, but in a shorter time frame.

China's size also means a vast pool of human resources. The reservoir includes not only an unlimited supply of menial laborers, but also a large and growing number of engineers, scientists, and skilled technicians, many of whom are employed in government-funded research and development centers or in the increasingly prominent technological centers established by foreign multinationals. The coexistence of cheap labor with increasingly abundant skilled personnel defies common assumptions on national competitiveness as a case of "either or" and underlies China's strategy of sustaining its dominance in labor-intensive industries even as it enters technology-intensive realms.

China's scope and pace of modernization of its own educational system is much greater than that of earlier contenders. Even today, Japan's educational system remains largely insular to foreign influences as well as to change in general, which is something the Japanese acknowledge as a serious obstacle to economic advancement and growth in a knowledge economy. Korean universities, while more open than their Japanese counterparts, have only recently started to actively recruit overseas faculty, although they have been recruiting Korean nationals educated abroad for years. Chinese institutions of higher education are showing more openness, and at least the elite institutions are displaying not only readiness but also enthusiasm for adjusting curriculum and making other changes. China's top universities are moving aggressively to upgrade their infrastructure and skill sets, establishing alliances with Western institutions and companies and actively courting foreign-trained faculty.

In addition to boosting its own educational system, China is counting on an eventual influx of Chinese students returning from abroad. Chinese students are now the largest contingent of foreign students in the United States. According to the Institute of International Education, more than 64,000 students from mainland China studied in the United States in 2002-2003. In the same year, the U.S. also hosted more than 8,000 students from Hong Kong and more than 28,000 from Taiwan, for a total of over 100,000. Chinese students also study in Europe, Australia, and Japan, among other host countries. The Chinese government has been accelerating its efforts to entice the best and brightest of this crop to return, offering "overseas terms" and joint appointments to the most promising prospects. Even without formal incentives, many students as well as practicing scientists and executives are lured back by the wealth of economic opportunities offered by a fast growing economy. These returnees are bringing with them not only academic knowledge, but also something else the Chinese sorely need: application know-how and business-related expertise.

Another important source of technological, scientific, and managerial knowledge resides in the economies of Taiwan and Hong Kong. Pushed in part by Chinese low-end producers breathing at their necks, both territories—not to mention Singapore—have been busy upgrading their educational systems over the past two decades. Hong Kong now boasts eight universities, up from three in the late 1970s. These universities, some of which are world class, play a key role in upgrading China's human resource infrastructure; increasingly, they are host to mainland students, and many of their local graduates end up working directly or indirectly with mainland enterprises.

That said, China has a long way to go before it can overcome key weaknesses, such as lacking a developed service sector to support its manufacturing base and to which to channel some of its superfluous personnel, a banking sector not far from default, and a limited ability to generate technological innovation. Judging from past experience, however, there is every reason to believe that China will be able to overcome these problems, emerging even stronger from the process. A key strength is that China is not alone; rather, it's the hub of a cluster of complementary and increasingly integrated economies that is Greater China.

The Synergies of Greater China

In a cultural, economic, and geo-political sense, China consists not only of the People's Republic, but also of Hong Kong, an entrepreneurial center which, from 1997, has been a Special Administrative Region of China with its own trade and foreign investment jurisdiction; Taiwan, a technologically advanced island, its contentious political status notwithstanding (China sees Taiwan as a renegade province), which is increasingly integrated into the Chinese economy; perhaps even predominantly Chinese Singapore, a center for high technology manufacturing and a base for many multinational enterprises; and a vast Chinese Diaspora that occupies the ranks of much of the business elites of Southeast Asia and is active in business circles around the globe. An example is Hong Kong-based Hutchison Whampoa, a diversified conglomerate with close to \$20 billion in revenue and operations in more than 40 countries.

Put these different parts of the Chinese puzzle together, and you find unequaled potential: a human resource pool that is not only the largest in the world but also includes a large number of scientists, engineers, and seasoned executives; an advanced and rapidly progressing technological infrastructure, and a leading industry position in many emerging technologies (Taiwan is the world's largest producer of notebook computers); vast capital (together, the economies of China, Taiwan, Hong Kong, and Singapore have three-quarter trillion dollars in foreign reserves); a dominant trade position (Hong Kong's container port is among the busiest and most advanced in the world); major bases and Asian regional headquarters for multinational enterprises (Shanghai, Hong Kong, and Singapore); and global business savvy (the Chinese Diaspora).

Increasingly integrated (Singapore somewhat less so) and dependent on their mainland China business, those economies possess complementary and synergetic attributes of capital, skill, knowledge, human resources, and market savvy that can deliver development on a magnitude and at a pace never before seen in a developing economy. At almost \$1.4 trillion, Greater China's (the PRC, Hong Kong, Taiwan, and Singapore) merchandise trade trails only that of the European Union and the U.S. and is almost double the Japanese volume. In an increasingly global economy, this volume forms the basis for tremendous bargaining power as other trading nations weigh their responses to trade and

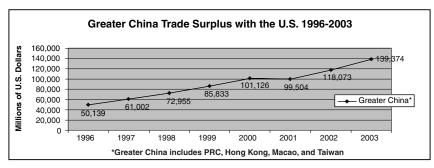
economic issues in the context of broader flows and their own exports. Greater China is rapidly becoming the hub for an even larger and rapidly growing Asian economy: Mainland China is already South Korea's biggest export market, while Greater China is the biggest market for virtually all other Asian nations.

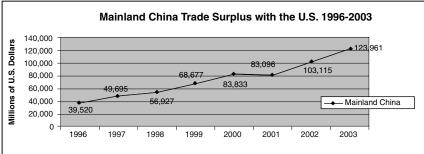
Coming to America

In the nineteenth century, the West forced a weak China to accept a series of unequal and humiliating treaties, forcing it to open its doors to foreign trade. The United States was a signatory to one of those treaties. The problem was that while the West coveted such Chinese products as tea and silk, it had little to offer in return that the Chinese would want (which is partially how the British got into the opium trade). Close to two centuries later, trade between the former adversaries is booming, and, again, Americans seem more interested in Chinese goods than Chinese are interested in America's. This time around, the Chinese want to sell, and American and European ports handle a lot more made-in-China merchandise than tea and silk.

Exhibit 1-1 displays China's trade in goods and services with the United States. Numbers are provided not only for mainland China (The People's Republic of China, or PRC for short), but also for Greater China (including Hong Kong, Taiwan, and Macao, but not Singapore), both to acknowledge the increased integration of these Chinese economies and to address a major complaint of the U.S. China Business Council, a U.S. trade group consisting of major U.S. exporters to China, that the trade numbers for the PRC are distorted because they do not account for Hong Kong's *entrepôt* position. (That is, many exports coming from the PRC come via Hong Kong, and many U.S. exports with a Hong Kong shipping address are destined for mainland China.) We include services because unlike merchandise trade in which it has a chronic deficit, the United States has a considerable surplus in the trade of services (such as transportation and consulting).

The U.S.-China Business Council also holds that the U.S. trade deficit with China is inflated, because the U.S. calculates imports and exports differently: U.S. imports are measured on a CIF (inclusive of cost, insurance, and freight), while its exports are calculated on an FAS (free alongside ship) basis. The Council contends that conversion of both imports and exports to an FOB (free on board) basis would adjust exports





Source: Census Bureau's Foreign Trade (FT-900), U.S. International Trade in Goods and Services annual issues. Updated 5/15/2003.

Exhibit 1-1 China's Balance of Trade with the United States.

upward by 1 percent and reduce imports by as much as 10 percent. Even with such adjustments, China would still post a huge trade surplus with the U.S., and considering the rate of growth for the deficit, the new numbers would merely reflect a six-month time lag. Furthermore, adjusting U.S. trade figures would not alter China's position relatively to other U.S. traders. The defensive position of the U.S.-China Business Council is revealing: It is a reminder of the powerful business lobby for China, which consists of major exporters to this market, such as Boeing, and those who rely on Chinese imports to remain competitive.

No less important than the overall numbers of the trade deficit is the composition of the deficit—in particular, Chinese imports into the United States. According to the Foreign Trade Division of the U.S. Census Bureau, the four highest import categories from China in 2003 were all technology related: miscellaneous manufactured articles at \$28.5 billion (CIF value), office machine and automatic data processing equipment at \$24.3 billion, telecommunications and sound recording

equipment at \$17.5 billion, and electrical machinery at \$12.6 billion. The labor-intensive categories of apparel/clothing and footwear are in fifth and sixth place, at \$12.6 and \$11.1 billion respectively, continuing a downward trend in ranking but not volume.² In 1999, in comparison, textile and apparel (together) and footwear placed second and third, respectively.

Economists are divided over how important a trade balance is. Some point out that the U.S. trade deficit is not huge as a proportion of GDP, even though it has already crossed five percent, which is an arbitrary red line. Others point out the danger of an increasing proportion of American financial obligations held in the hands of foreigners, who, if they were to lose faith in the American currency, could cause a crisis of confidence in the United States and destabilize a global economy in which the U.S. dollar remains the main reserve currency. It is commonly accepted that trade brings about mutual benefits to trading partners, with some suggesting that trade is beneficial even when not reciprocal (for example, U.S. consumers benefit from cheap Chinese products). An economic perspective is too narrow to capture the complexity of trade, its variable impact on diverse regions and industries, and, in particular, its social, political, and geopolitical repercussions. It is easy to make the macro economic argument that "free trade benefits us all"; it is also easy to make the often-political argument for "fair trade." It is much more difficult to pinpoint the parameters for fairness, identify who is playing fair in a new game, or pick winners (and losers). The China game may redefine all three.

Why is the United States the most vulnerable to (some would say the major beneficiary of) Chinese imports? In contrast to Japan, who for decades maintained a huge trade surplus with the outside world, China has been running only a small surplus in its global trade, and recently its imports have been rising faster than its exports. As its trade surplus with the United States expanded to \$11.5 billion in January 2004, China's overall trade balance for February 2004 expanded to \$8 billion—in the red. This means that other trading partners are doing quite well, maintaining a smaller deficit (the European Union, or EU) or a substantial surplus (Asia) in their China trade. (With the EU, China had a surplus of close to 50 billion euros in 2002, running a surplus with every EU country with the exception of Austria and Finland.)

How is this disparity between the United States and China's other trade partners possible? The answer is quite complex, as is explaining the variations, say, between the United Kingdom (UK), which proportionally runs an even greater deficit with China, and Germany, whose deficit is relatively small. The explanations are important in that each has its own supporting constituencies, each sheds different light on the China impact, and each offers its own repertoire of strategic responses at the national, industry, firm, and individual levels. The following sections present some of the explanations.

The Chronic Importer

The United States has been running a trade deficit with the rest of the world for a quarter of a century, a gap which now approaches the half a trillion dollar mark annually. Nominally, this is the largest trade deficit in the world, and hovering around 5 percent of GDP, it is also one of the highest ratios among industrialized nations. The U.S. has a substantial trade deficit with the EU, Canada, and Japan, among others, but its trade deficit with China is the largest and the fastest growing. One reason for China's lead is the global shift of manufacturing operations to the country. As Japanese, European, and American firms have been moving their manufacturing operations to China, their sales in the United States register as Chinese exports. For instance, over the past few years, the Japanese trade surplus with the U.S. has not grown, while the deficit with China has soared. Obviously, this argument does not explain why the U.S. overall trade deficit has not declined, which suggests that there may be other factors at play, such as competitiveness, exchange rates, the increasing offerings of global exporters, and the diversity of the U.S. population that supposedly enhances its appetite for foreign goods.

The Naïve Trader (or the One with More to Lose)

The United States is an open market, which many Americans (but not necessarily everyone else) believe has less tariff and nontariff barriers than those of it partners, and trade policies that Americans and many others would characterize as naïve (such as allowing relatively open access to American markets without insisting on reciprocity). In this view, the U.S. is being taken advantage of by its trade partners, especially China. China's defenders point to the gradual opening of its markets and its World Trade Organization (WTO) commitments. They

argue, not without justification, that many American firms have not invested the necessary time and energy in understanding the requirements of a rapidly opening Chinese market. Nicholas Lardy, a noted China scholar with the Institute for International Economics, observes that China's ratio of imports to GDP likely reached 30 percent in 2004 compared to 8 percent in Japan and 14 percent in the United States.³

As a global leader in technology and innovation and a net technology exporter, the United States can be said to suffer more from China's lax regime of intellectual property protection than other trade partners. Analogies are often drawn with Japan and the "four tigers" that started with disregard for property rights but later enhanced compliance though Chinese violations persist on a much grander scale and are tolerated, often supported and protected by powerful local interests. As China moves up the technology ladder, states the optimistic argument, it will be in its own interest to offer such protection. After all, in the nineteenth century, the United States was a major violator of intellectual property rights, as Charles Dickens, among others, learned to his dismay. The difference is that this time around, the share of research and development in product costs is much higher, and copyrighted products take up much more of the economic pie. We are also in a global economy, meaning that pirated and counterfeit products now find their ways to multiple markets. And, perhaps most worryingly, recent trends show a rise rather than a decline in the rate of violations.

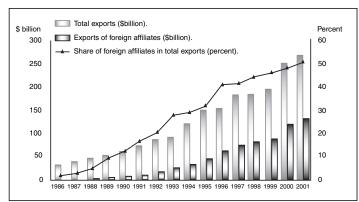
Follow the Curve

In this explanation, the U.S.-China trade imbalance results from the different point of the two countries along the development curve. In the same way that the United States lost agricultural employment a century ago, it is now shedding low-end manufacturing jobs, replacing them with higher-end, knowledge-intensive manufacturing and service jobs. In so doing, China plays a positive role by relieving the United States to do what it does best: producing and implementing knowledge at the upper rung of the ladder. The argument is understandably attractive to China's defenders, who point out that China and the United States overlap only on a narrow range of products (10 percent according to the Council on U.S. China Trade). Naturally, the development curve story implies that the trade gap between the two countries will diminish once China progresses.

The argument is appealing but also vulnerable. The range of products on which the United States and China compete is probably larger than the Council attests, and most importantly, is growing rapidly, which should not be surprising given the faster growth that China has been experiencing and the massive technology transfer into the country. Toyota, Nissan, and Honda started with lower-end vehicles before they established the luxury divisions of Lexus, Infiniti, and Acura; inquiries by the International Trade Commission reveal that Chinese TV sets and furniture already target both the low and high end. The development curve argument typically draws a parallel between economies shifting from manufacturing to services and from agriculture to manufacturing, but as we will argue later in this book, the parallel may be fundamentally flawed. Finally, unlike Japan and the tigers before it, China intends to retain its labor-intensive advantage as it moves into more sophisticated product lines; if it manages to do so, the range of products on which the two countries compete will grow still further.

Foreign-Generated and "Self-Inflicted" Imports

Looking at the trade data, you may see a picture of unscrupulous Chinese firms trying to elbow their way into the U.S. market. Before you jump to conclusions, however, keep in mind that more than half of China's global exports are by foreign multinationals that have set up shop there to supply their home and global markets (see Exhibit 1-2). In fact, the Chinese, like the Japanese before them, tend to subtract such exports from their trade figures, producing much lower export numbers.



Source: UNCTAD 2003.

Exhibit 1-2 China's Exports and the Share of Foreign Affiliates.

"Foreign Invested Enterprises" (foreign subsidiaries and cross-border joint venture companies) account for a big chunk of China's export growth because they have the know-how, quality level, reputation, distribution channels, and markets necessary for foreign market entry. Many—although by no means all—are American firms, driven by economic fundamentals (that is, it is cheaper to manufacture in China even when you take into account shipping and related costs) or by agreements they have signed with the Chinese government requiring a high export to sales ratio as a condition for domestic market entry or to obtain certain investment incentives. While some dispute the numbers, it is clear that American firms support Chinese imports into the U.S. if not as manufacturers than as buyers (such as Disney). Furthermore, the contribution of U.S. manufacturers to China's exports is likely to grow, and it is easy to see why: China's technology products are the fastest growth segment of its exports, foreign multinationals account for threequarters of technology exports (more in the case of high technology), and the U.S. remains the largest repository of technological knowledge. And there is one more reason: Compared to other developed economies, in particular the European Union, it is relatively simple to shut down operations in the United States, so manufacturing operations can be moved more easily to China and start exporting back into the U.S. In contrast, EU firms (in particular in Germany and France) face enormous obstacles in shutting down domestic plants, which erode the cost/benefit equation of moving production off-shore and, at least in the short run, reduce exports into the region.

The Currency Play

The almost pathetic view of the U.S. Secretary of the Treasury, John Snow, making a pilgrimage to China to plead for a revaluation of the yuan only to be turned down, focused attention on the role played by the *renminbi* (literally, "people's money") in the trade imbalance between the two countries. Most economists (as well as competitors and developed country unions) are convinced that the yuan is undervalued, although they disagree about the margin as well as on how risky a sudden appreciation would be for China and the global economy. Now that the U.S. dollar has declined against the euro (especially) and the Japanese yen, the pressure is on China to revalue to make Chinese products more expensive in the U.S. market.

The currency game was played vis-à-vis Japan during the 1980s, when, in the wake of the Plaza Accord, the dollar plunged in value against the yen. Yet, the drastic realignment in exchange rates hardly made a dent in the U.S. trade balance with Japan, leading frustrated economists to offer alternative explanations (such as that consumption patterns were not dependent on cost alone) and even to suggest that "Japan does not fit the economic models." Today, the yen is worth more than double its early 1980s dollar value, but the U.S. trade deficit with Japan is still the same (in 1980s dollar terms). Although the deficit would have been higher without the realignment, it was probably held back more by Japanese factories moving to the United States (especially in the case of the automotive industry, which accounts for a big chunk of the U.S. deficit with Japan) and China.

The constituencies pressuring for revaluation would like China to do one of the two: let the yuan free float, thus letting market forces determine exchange rate, or set a new, higher exchange rate band. In the past, China has rejected such pressure as intervening in its internal affairs, reminding everyone how it agreed not to devalue its currency in the face of massive devaluations by competitors such as South Korea, Thailand, and Indonesia during the Asian Financial Crisis. China's offer to use its huge reserves to support the Hong Kong dollar, then under attack, also gives credence to its stance that it will not yield on exchange rate pressures. While giving some signals regarding its future readiness for a modest revaluation, an emerging deficit in its overall trade balance will give China further rationale for opposing a change in current rates. Opposing the yuan revaluation are also the many U.S. manufacturers who import components or finished products from China and would be affected adversely by such change.

China Takes on the World

China's pressure on U.S. markets will only grow stronger. Companies that until now hesitated about shifting production to the country due to union agreements or for fear of a consumer backlash now realize they may have no choice if they wish to stay in business. Firms initially protected from Chinese competition by high transportation costs find themselves on the firing line as logistic costs decline and as productivity rises on the Chinese side. Others are following their industrial customers

who have moved to China and need their suppliers and service providers to be close by. Even companies supplying the U.S. defense establishment now realize they may have little choice, although they try hard to keep their core operations at home. Consultants and other service personnel follow to provide support for those operations and discover that China, like some other low-cost nations, is a good base from which to support overseas operations.

"The great and well-known amount of imports of the productions of China into the United States," wrote Daniel Webster, Secretary of State in the John Tyler administration, in 1843, "are not likely to be diminished."4 Eventually, of course, it did. But while the quote serves as a reminder of the limits of forecasting, indications are that for now, the tide of Chinese exports will only grow. It will also not stop at America's shores. For now, the EU runs a merchandise trade deficit of about \$45 billion with China, but imports from China represent merely 1.8 percent of its total imports (EU countries included), and half its volume of Japanese imports (2002 figures). Once Chinese exports grow—and especially when they begin to challenge Europe's strategic and politically influential industries such as motor vehicles—the sentiment may change there, too, although it will remain subdued as long as European exports remain strong and as long as the more influential EU nations, such as Germany, have a relatively small deficit. Japan, whose worries about China are also geo-political, is especially vulnerable to China's ascent, because its competitive advantage lies in manufacturing, its economy has stagnated for over a decade, and its governance and corporate practices have slowed its adjustment to a changing global economy. Like the U.S., Japan's exports to China are about half its import level, and as in the case of the U.S., many of its imports from China are by Japanese firms that now manufacture there. However, unlike in the U.S. case, China is the only major economy with which Japan runs a significant trade deficit (Japan's exports to the U.S. are about twice its import level), which cushions the impact. And, being much more dependent on trade than both the U.S. and China, Japan can ill-afford to challenge the free trade system.

While the industrialized countries take (artificial) solace from the belief that China only threatens the labor-intensive part of their economies, developing nations do not have that luxury. Developing countries find themselves trailing in the contest for developed country investment dollars and watch with trepidation as foreign investors

uproot operations in their markets and shift them to China. The Chinese edge in terms of cheaper labor cost, a modern infrastructure, and the benefits of scale and agglomeration is now often sufficient to erase the proximity advantage of countries like Mexico, who have been counting on the combination of geography and NAFTA as a sort of insurance policy in the U.S. market. They are now finding out that payout is not guaranteed.

For emerging and developing economies in Asia, the Chinese impact is more ambivalent. While Asian countries continue to lose foreign investment to their powerful neighbor, the country is becoming an engine of growth for the entire region and a complement if not a substitute to developed country markets. (For instance, China has now replaced the United States as South Korea's largest foreign market.) With the notable exception of Japan, most Asian economies are running a trade surplus with China, and so do not see Chinese imports as an immediate concern. Nevertheless, China is considered a possible worry among Asian nations, some of which are only one step ahead on the development ladder and hence vulnerable to Chinese economic progress. In addition, there is considerable unease about the influence of the Chinese business elite, especially in the Muslim nations of Indonesia and Malaysia, as well as suspicion that the Chinese minority will benefit from China's rise while the ethnic masses will suffer as low-paying jobs move to China. Finally, Asian nations are concerned with changing geopolitics: Post World War II Japan was suspected because of its prewar and war record, but it did not have the military might and was a close U.S. ally. China, while historically nonexpansionist, is still a Communist nation, with the largest standing army in the world and strong geo-political aspirations.

In the heels of the China impact will come numerous aftershocks that will ripple their way throughout the world: rising prices for the energy and commodities that the burgeoning Chinese economy is devouring, severe "dislocations" for employees and their communities in regions and industries unable to compete or restructure, waves of immigrants pushed out of Central America and other regions by the devastation of the laborintensive operations they have come to rely upon, and, down the road, a new geo-political order in which China takes one of the leadership roles.

The World's Factory

Take a toy into your hands and, more likely than not, it will have a "Made in China" label. This is no surprise: China makes 7 of every 10 conventional toys sold in the world. That seems not to be a concern for the United States, which long ago conceded toy manufacturing to other economies, such as South Korea, Hong Kong, and Taiwan who, in turn, now have to contend with the new boy in town, China. U.S. toy giants such as Hasbro and Mattel remain competitive by moving production to low-cost locations while retaining design, development, and marketing skills in-house, under a powerful brand name. Toy manufacturing uses for the most part rudimentary technology, is not "strategic," and has no national security implications. The same is true for other labor-intensive industries, such as textiles that the United States exited, moved up market, or relied on immigrant labor to prolong its staying power.

China is no longer only about toys, however. Today, it is a major player in product lines that are still mass produced in America and Europe, such as home appliances, and China-made components are used extensively by the competition. The next phase will see subcontracting of entire operations, with the foreign firm maintaining oversight, branding, and marketing. When they export back, however, these established developed country firms will face competition from a new breed of Chinese manufacturers that export under their own brand name and in some instances set up for production on U.S. soil. China is also fast becoming a player in capital-intensive products, such as motor vehicles, as well as in technology-intensive lines, some of which, like flat-screen TV, have conceivable strategic use. Greater China now accounts for more than eight percent of global merchandise exports, with the mainland alone responsible for more than six percent. This may not seem much until you look at the growth curve: In 1996, the figure was less than three percent.

The shift toward China-based manufacturing is also underpinned by impressive advances in global supply chains. Driven by technological improvements and managerial efficiencies, the cost of logistics has been on a downward trend for two decades, and in some cases is down by two-thirds from its level a decade or two ago. The savings lower the cost of importation of finished goods and of components that travel back and forth between China and the United States (although volume increases have upped the cost of shipping from China). Savings also come from

improved turnaround time, which is a crucial variable in customized products such as furniture, one of the fastest growing "Made in China" import categories. American imports of Chinese-made furniture and bedding have now exceeded \$10 billion, up from less than \$4 billion just two years ago.

The Export Imperative

China is still less reliant on exports than many other countries in Asia (such as Malaysia) and outside (such as Belgium), but its dependence is growing, and the export drive must continue for it to fund its growing imports of capital goods and production inputs and prevent a social and political time bomb from exploding, with unemployment serving as the trigger. Not only does China need to provide jobs to a huge cohort of young people, but it also must worry about the many millions still employed in money-losing state enterprises and the 100–200 million people who have left the countryside in search of work in urban areas and who would be the first to be affected by a serious economic downturn. Disaffected peasants have been a source of rebellion throughout Chinese history, and economic well-being is especially critical to a regime that has shed its ideological base and now relies on economic prosperity and nationalism as its sole sources of legitimacy.

Given the scale of its economy and its increased dominance in many product markets, the continuation of China's export drive will bring about commoditization of product markets that have previously relied on brand name and reputation for differentiation. With China as the cost leader, foreign manufacturers will have to meet or beat the Chinese "pricing floor" that rests not only on cheap labor and subsidies, but also on massive use of counterfeiting and piracy to circumvent development costs. This leaves industrialized country manufacturers with a limited range of options. The first option is to procure many if not most of the product's components and subassemblies from a Chinese producer, thus lowering the cost of the final product to the point of remaining competitive. This trend is already in full swing, with U.S. automotive firms sourcing billion of dollars in Chinese parts. The second option is to move operations to China to lower cost further as well as gain entry to the Chinese market. A third option is to find another production base, such as India or Mexico, that can meet or beat Chinese prices, but those locations rarely offer the combined benefits of a China base. A fourth option is to automate or otherwise increase productivity; however, in many traditional product lines, the most obvious productivity savings may have already been extracted; and, with key supporting industries exiting the market, it will be especially difficult to extend or even sustain productivity gains. Finally, firms faced with Chinese competition can shift from the fiercely competitive entry level into technology-intensive product lines, but they will find the steps leading up crowded by their counterparts who have had the same idea. Or, they can exit the business altogether, seeking to redeploy their resources into more promising endeavors.

Where the Jobs Are

Employees in labor-intensive industries, where labor costs represent a significant portion of product cost, are predictably the hardest hit by Chinese competition. Industries like textiles and garments rely on low or minimum wage labor, often done by immigrants from Mexico, Africa, and the Caribbean, yet they cannot compete with wages of barely above 50 cent an hour. With the exception of Bangladesh, Vietnam, and a few others, even developing economies cannot compete with such wages, especially when accompanied by higher productivity and infrastructure advantages. American makers of textile, apparel, and related products have been protected until now by international quota agreements and other tariffs, but those are coming down now. Low transportation cost, quick delivery, and fast reaction to changing consumer tastes are no longer sufficient to shield the industry from Chinese competition even when combined with political pressure on the part of elected officials in affected regions, such as the Carolinas.

China's job impact will not remain confined to labor-intensive industries. As the country moves up the technology ladder, the jobs affected will also be better paying and knowledge based. In the manufacturing sector, white-collar jobs, from accountants to back-office, are especially at risk, as are jobs within the service economy, such as insurance and banking. Although the latter, as well as software, are presently less at risk from China then they are from other countries, from India to Ireland, China is a factor: One reason for India's software push is that it is one of the few sectors where it is globally competitive vis-à-vis China, and even that edge may come under pressure as China upgrades its educational system.

The Chinese market is also creating many jobs for those industries that export their goods and services to China. China is the fastest growing U.S. export market; however, the magnitude and the composition of the U.S. trade deficit with China suggests that the number of jobs created there by exports to America is much higher than the number of jobs owing their existence to U.S. exports to China. Further, the job gains and the job losses are in different regions, industries, sectors, and company types. The variable impact is, in turn, laying the ground for conflict and misalignment of interests between winners and losers in this round of the trade game.

A Consumer Paradise

China has helped create what seems like a shoppers' paradise in the U.S., as well as in other countries. Many of the product lines that China now dominates, like wristwatches and bicycles, experienced an unprecedented real price decline. This has been good news for consumers. The commoditization of previously branded products has brought into the market consumers who in the past could not afford the product and enabled others to shift portions of their disposable income toward the purchase of higher level or a broader array of products and services, including those domestically made. At the same time, the flood of Chinese imports is creating unprecedented pressures on manufacturers who rely on brand name or country-of-origin impact (such as Italian leather goods), especially for below-luxury products, which were already pressured by the expansion of large discounters.

The growth of Chinese products on American store shelves is related closely to the rise of discounters like Wal-Mart, for whom China is progressively becoming the cornerstone in a strategy of offering the lowest possible prices for broad merchandise offerings. Wal-Mart, like other discount retailers, is becoming more and more dependent on China to provide offerings at "can't be beat" prices. The relation is symbiotic: China is dependent on Wal-Mart and like retailers to gain market entry for its yet-unknown brands by leveraging the retailer's name and huge scale. The cooperation is helping Wal-Mart solidify its position as the largest retailer in the world, while enabling Chinese firms produce to scale, which is a critical variable in mass-produced merchandise.

China's ascent may have broader consequences for the American consumer and, by the extension, for the U.S.' social and political landscape. Until now, complaints by manufacturing employees that the purchase of foreign products was undermining their livelihood, and hence the livelihood of other Americans whose products they would not be able to purchase once they were out of a job, fell on deaf ears. As long as the economy was quick to recover and create jobs, it was easy to sidestep the negative sentiment by showing the benefits of an open trade system for job creation and wealth. This time around, there seems to be at best an unexpected lag in job creation and at worst a structural change limiting job creation. With programs devised to handle the plight of trade losers lagging behind, the atmosphere is changing even if trade is only one factor contributing to job losses. Politicians are catching up with the new sentiment, and consumers may, too.

The Chinese challenge is of a magnitude that may alter the purchase equation, igniting a "buy American" debate. This could fundamentally change purchasing choices, replacing a cost/reputation formula with one incorporating job preservation as a key consideration. American consumers are said to prefer foreign brands, a preference used as one explanation for the huge trade deficit. Consumers have been willing to pay a premium for European and Japanese brands even under seemingly identical quality with U.S. brands. (Note, for instance, the premium that customers pay for the Toyota product versus the GM vehicle coming out of the same joint venture factory.) However, as the recent drop in French wine consumption following the Iraq war suggests, American consumers do not lack the ability to link their purchasing decisions with geopolitics, animosity perceptions, and other "nonrational" considerations. These considerations may yet come to occupy center stage in a fiercely contested consumer market.

The Coming Realignment

China's ascent will bring about novel challenges to "common wisdoms" and rethinking of old terms and assumptions anchored in events past. How do you classify a country governed by a Communist regime but whose government share of GDP is less than half that of the U.S.? An economy that attracts the largest volume of foreign investment in history without providing adequate protection for intellectual

property rights? One with extremely high savings rates but which grossly misallocates investment capital? One with the most competitive market in certain segments, but which has a paternalistic subsidy regime? A stabilizing force in world affairs that is now threatening the use of force to regain its "renegade province" of Taiwan? China will challenge these and many other dichotomies we have come to accept; it may also realign the economic, political, and social landscape in the United States as well as in other countries. Among the coming impacts and challenges in the United States:

- An increasing fault line separating those U.S. industries and firms who see themselves as primarily beneficiaries of an increasing China trade and investment and those who see themselves as victims of China's ascent. The first group consists of multinationals with extensive China operations; the second includes companies who cannot substitute China investment for exit, including many small and medium firms. The two groups will take on an opposing position on trade and protectionism and may align with the two political parties on the basis of their trade agenda.
- A return of job security to center stage of employer-employee negotiations and a possible reversal of a decade-old trend away from unionization. The feeling of vulnerability now grappling sectors that until recently saw themselves immune to off-shore job loss might entice the unionization of high-skill knowledge workers and bring about significant changes in the structure of the union movement and its activities.
- Severe pressures toward protectionism not seen for 70 years or so, including not only pressure to establish temporary tariffs, but also demands for renegotiation of trade agreements and challenges to the role of international institutions, most notably the WTO. With increasing concerns about the U.S. being the loser in the trade game, the risk of protectionism and its heavy damage to the global economy looms larger than ever.
- Paraphrasing the trade debate in terms of "rational economics" versus "hot-headed protectionism" will no longer do. While the benefits of free trade are clear, the long-term realities of a service-based economy lacking a manufacturing base are nothing but. The same is true for the assumption that the U.S. economy can prosper

by continuing to be the global innovator and focus on added value economic activities in a world where most nations aspire to, and invest in, the same strategy; and for the belief that the United States can indefinitely absorb the world's output paid for by U.S. assets.

For companies, employees, and consumers, the question is no longer if and when China is coming, for it is already here, but how to prepare for the new economy. Side by side the new economic realities, a new geopolitical order is being created. For instance, seeing the length to which the United States and Europe went to secure their oil reserves, why wouldn't an energy-starved and increasingly assertive China take the same route? And why wouldn't it leverage its economic muscle for geopolitical gains through such means as economic assistance, training, and defense support? For all the similarities, millennia of Chinese history suggest that it will chart its own course, but if history is clue (and I believe it is), China will not be satisfied with anything but a position of prominence, however defined.

So where does all this leave us? First, there is the unsettling prospect of a trade war. In an age of global interdependence, protectionism will be a severe mistake, producing grave consequences for all; yet this is where we may be heading if we continue to hold on to old clichés and false analogies—like the one asserting that the current shift from manufacturing to services is a repeat of the move from agriculture to manufacturing a century ago—until they hit a reality wall. Second, we share the responsibility of maintaining the perception of fairness, which lies at the heart of the American psyche. If we fail to identify and assist the losers in this new round of the trade game, the belief in opportunity for all may be undermined, and with it, the broad participation that makes America what it is: a haven for the openness and innovativeness but with a sense of inclusion. The challenge is how to do so without infringing on the dreams and hopes of other constituencies in the global economy, both at home and abroad. While we continue to look for the balance, the more immediate question for both firms and individuals is not how to stop the tide of Chinese imports, but how to remain competitive in the dawning Chinese century. That is what this book is about.