AN AMERICAN OPEN DOOR?
Maximizing the Benefits of Chinese Foreign Direct Investment

BY DANIEL H. ROSEN AND THILO HANEMANN
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SPECIAL REPORT

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Contents

Foreword ................................................................. 4

Acknowledgements .................................................. 6

Executive Summary .................................................. 8

Introduction: The Tide Turns for Chinese Investment ............... 13

I. Motives: China is Driven to Invest Abroad ....................... 16

II. Patterns: Chinese Direct Investment in the United States ....... 25

III. Impacts: Benefits and Risks of Direct Investment from China . 35

IV. Doormen: Policy and Politics .................................. 53

V. Conclusions and Recommendations: An American Open Door? 68

References ................................................................. 76

Appendix: Data on Chinese Direct Investment in the United States . 81
Over the past decade, China’s unprecedented surge of economic dynamism and development has radically altered the global landscape and affected a host of international relationships. These changes – having impacted the geopolitical balance of power, the international trade system, balance of payments accounts, patterns of energy consumption, and the environment on which millions of human beings depend – have occurred far more rapidly than most observers predicted, or even imagined possible. Indeed, many Americans seem only vaguely aware of how swiftly the world is changing around them and of the profound implications of China’s high-speed development for the United States.

One of the most significant trends that will influence how the United States and China – indeed, China and the world – interact in the future has only recently begun to emerge. In the past, FDI flowed predominantly from the so-called developed world to the developing world. Those flows are continuing, but China is now taking a lead role in seeking to invest in ventures around the world, including the United States, through mergers, acquisitions, and greenfield investments. As a result, the United States is finding itself increasingly on the receiving end of foreign direct investment from China.

How the United States responds to this new reality will have enormous consequences both for America’s economic future and for its relationship with China. Certainly, there are critical national security concerns that must be factored into any nation’s embrace of foreign direct investment. The United States has an effective mechanism in place for addressing such concerns, but there is an ever-present risk that as investment patterns change, the issue will be politicized in ways that will deny the United States the potential benefits of these investments. The United States to date has stood by the importance of open markets, but voices are asking whether that fidelity is wise in the face of these new and rapidly growing inflows of Chinese capital to the United States. Such questions are legitimate but must be evaluated in a well-informed and cleared-headed manner.

In undertaking this study, our purpose is to provide American officials and the public at large with an informed basis for assessing the challenge posed by this new reality. We hope that it will help shape an American response that will maximize the potential benefits for the United States.
States while properly addressing legitimate security concerns. Our reading of the evidence suggests that the United States can, without decreasing its vigilance on national security matters, embrace Chinese investments in ways that will stimulate innovation, job creation and infrastructure renewal, while at the same time laying the foundation for a more cooperative relationship with China.

This project has been a collaboration between Asia Society’s Center on U.S.-China Relations, the Kissinger Institute on China and the United States at the Woodrow Wilson International Center for Scholars, and the Monitor Group. The authors of this report, Daniel H. Rosen and Thilo Hanemann of the Rhodium Group, have done a commendable job analyzing the complex data relating to Chinese FDI in the United States as well as the political and policy implications of this new development. Their report provides a detailed review of how we arrived at the current situation and offers recommendations on how to maximize the benefits of Chinese FDI in the United States.

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Daniel H. Rosen  Thilo Hanemann
The coming decade will bring an unprecedented boom in Chinese capital seeking investment opportunities abroad, and will require Americans to respond to those flows. Foreign direct investment into China—mergers, acquisitions and greenfield investment in new facilities—played a major role in China’s economic boom, and U.S. firms today account for $50 billion of nearly $1 trillion in such investment in China. Chinese direct investment abroad, on the other hand, has been slow to take off and, to date, mostly has been focused on securing raw materials. In past decades, few Chinese firms dreamed of direct investment in the United States: with their home market taking off and the challenges of operating in the United States daunting, they had little reason to do so.

Because competition and profitability in China now are changing rapidly, incentives for Chinese firms to invest in America also are changing. Indeed, the takeoff already has begun, and Chinese direct investment in the United States is soaring, both in value and number of deals. Businesses from China have established operations and created jobs in at least 35 of the 50 U.S. states and across dozens of industries in both manufacturing and services. Official data tend to obscure the exciting reality that the United States is open to Chinese investment and that that investment is, in fact, arriving in increasingly larger amounts—more than $5 billion in 2010 alone. The actual number of jobs that Chinese investors have created likely exceeds 10,000—many times the official estimate. And this is just the beginning. If China follows the pattern of other emerging nations, more than $1 trillion in direct Chinese investment will flow worldwide by 2020, a significant share of which will be destined for advanced markets such as the United States.

However, surging Chinese investment has triggered anxieties as well as excitement among Americans. Major Chinese investment overtures have foundered in recent years, creating uncertainty and ill will between the two nations. Though the legally mandated screening organ for national security risks, the Committee on Foreign Investment in the United States (CFIUS), generally has operated in a fair manner, bad publicity stirred up by the threat of congressional interference is having a chilling effect on Chinese readiness to invest in the United States by sending confusing and unclear messages. Nowadays, whenever a Chinese investment proposal is announced, the first question the media poses is not how...
many jobs it might create, but whether groups in Washington will try to block it, with little regard for whether there is actually any threat entailed. This is ironic, as most China-backed deals are not covered by CFIUS, and those that are almost always receive proper hearings. Moreover, because such hostile receptions scare away needed—and legitimate—investment, invite retaliation against U.S. firms abroad, and distract Americans from the serious task of assessing real security concerns, they are dangerous to the national interest. Here, the example of Japan is instructive. Japan’s first investments in the United States during the 1980s were almost as controversial as China’s, but in the following years, U.S. affiliates of Japanese companies invested hundreds of billions of dollars in the United States, and today employ nearly 700,000 Americans.

We conclude that the recent growth of Chinese direct investment in the United States is proof of its great potential, but given the parade of political fearmongering seen so far, those benefits likely will be squandered if steps are not taken to restore clear thinking. Therefore, we offer a series of recommendations intended to alleviate the risk of diverting Chinese direct investment from the United States by maintaining the best possible security screening process, keeping America’s door open to the benefits of a China going global, and actively attracting the right investments from China so that the benefits for Americans are assured.

We summarize these recommendations here and elaborate on them at the conclusion.

1. **Send a clear and bipartisan message that Chinese investment is welcome.**
   Though the annual numbers are doubling, there is a growing perception in China that the United States is not enthusiastic about Chinese investment. Washington must recapture the high ground on this topic by pointing to the healthy growth in those investment flows to date and by making clear that U.S. policy will remain accommodative. A bipartisan congressional–executive statement is needed to send an unequivocal message of support for increased investment from China. It is especially important that the U.S. Congress plays a positive role in this messaging given its oversight role and recent activism on foreign investment.

2. **Systematize the promotion of FDI from China and elsewhere.**
   A review of U.S. efforts to attract investment from China and other countries is needed. The current laissez-faire approach stems from an era when the United States dominated global FDI flows; it assumes that the United States remains unrivaled in its attractiveness and functions as though all foreign investors come from similar countries that do not need much on-the-ground assistance. That situation has changed. More proactive measures are needed, not just at the state and local level, where earnest efforts are afoot, but also at the national level, where formal and informal barriers to foreign investment arise.
3. **Protect the investment review process from interference.**

The formal U.S. process of screening for national security concerns is generally well designed, but it is in urgent need of protection from politicization. If political interference is not tempered, some of the benefits of Chinese investment catalogued in this study—such as job creation, consumer welfare, and even contributions to U.S. infrastructure renewal—risk being diverted to U.S. competitors.

Some in China suggest that the United States publish a catalogue of open industries, just as the Chinese government does. While that suggestion is understandable in light of their recent experience, this approach is not suited to the United States. Within a given industry, there are acceptable and unacceptable investments, and it is impossible to anticipate all eventualities in advance. CFIUS is right to ask not whether China has hidden agendas and ambitions or whether a particular industry can be sensitive, but whether a specific deal constitutes an actual national security threat. In short, the existing U.S. review policy process is worth protecting.

CFIUS should further improve the transparency of its decision-making process and find ways to offer even better assurance that it is keeping to its mandate of solely screening investment for national security threats. Calls to alter the review process in ways that would allow further interference—by allowing national economic security questions to be subject to review, for example—must be rejected.

4. **Work to better understand Chinese motives.**

Many Americans—including many officials in Washington—believe that because China has so many state-owned enterprises, market forces and profit motives do not necessarily apply in that country. Therefore, they suspect that if a Chinese firm is coming to America, it must be for some political purpose rather than simply to make money.

This conclusion is wrong, and if we are to maximize U.S. interests, such misapprehensions must be corrected. But making clear that behind all of the rhetoric of statism and central planning, China’s firms typically put self-interest and profit above else, is no easy task. The proponents and beneficiaries of Chinese investment in the United States—including deal makers, venture partners, sellers, and localities—need to bear more of the burden of demonstrating this market orientation. By issuing the kind of bipartisan statement suggested earlier, U.S. policy makers can contribute to this reappraisal of Chinese objectives. And, of course, economists and policy analysts must redouble their efforts to make China comprehensible to both U.S. leaders and the general public.

5. **Communicate to China its share of the burden.**

China very much shares responsibility for the breadth of American misgivings. After all, at state-
related firms, especially the major state-owned enterprises, which make up almost half of all industrial assets, business decisions routinely are subjected to political considerations and executives are beholden to the dictates of the Chinese Communist Party. Even at private firms, nontransparent governance practices are common. And while this opacity may be about shrouding the profit streams of privileged individuals more than anything else, American screeners cannot discreetly avert their gaze as Chinese regulators and bureaucrats do. If China wants a more straightforward hearing for its firms in Washington, it must improve corporate governance at home.

We recommend that U.S. officials reclaim the high road from commentators who allege that Washington is unfairly blocking foreign firms, and call for a major improvement in Chinese corporate transparency so that regulators can do their jobs more easily. Other measures can help as well. A clearer separation between Chinese regulators and the firms they oversee would help alleviate foreign suspicions. A consumer-oriented welfare test in China’s competition policy also would help ensure that market performance, not other state objectives, is the determinant of a given Chinese firm’s behavior.

Of course, if China were to dismantle its system of state capitalism, U.S. officials would be far less worried about Chinese corporate intentions and the prospect of predatory intent from the firms under Beijing’s influence. But Americans should not expect China to change overnight. In the meantime, it should be clear that while Chinese investment is more than welcome, U.S. regulators have a legitimate interest in who is investing in the United States.

6. Remain open to “what if” scenarios.
In terms of nontraditional economic threats, U.S. concerns that China could become a large enough economy to be a price maker instead of a price taker are legitimate. If China’s sheer size, combined with its artificial pricing structures (e.g., the cost of capital arising from financial repression) were to “poison” global markets in the future, as Chinese outflows make up an ever more influential share of world totals, then a subsidy-disciplining regime for global direct investment akin to that for trade would become necessary. We suspect that China’s existing statist preferences will break down prior to that point, but we cannot be sure. There is no consensus on how to assess “unfair” influence of one nation’s domestic capital costs on world prices. Therefore, we recommend an international effort to think through these questions now, because answers may well be needed in the near future.

7. Do not play the reciprocity game.
The term “reciprocity” has been used too frequently in the context of Chinese investment—namely, if China is discriminatory against U.S. investment, the United States should reciprocate in kind. We recommend greater caution. China does maintain significant inward investment restrictions, but Beijing has been a leader in direct investment openness for decades,
and the notion of withholding U.S. investment access for more access in China is both foolish and against American interests. Yes, U.S. negotiators must press China to open wider to U.S. investors. But it is emphatically in America’s interests to separate that effort from whether to permit cash to flow from China into the United States. The United States should welcome capital from China, regardless of what Beijing’s state planners have to say about foreign investment in China. For 30 years, China has grown stronger by opening its door wider to FDI, irrespective of overseas openness. The United States should do the same, or risk Chinese firms setting up plants in Ontario instead of Michigan, or Juarez instead of El Paso.

8. Get our own house in order.
Finally, a review of history reveals that inward investment indicates neither weakness nor strength. Foreign investment, Chinese or otherwise, has long entered the United States, and it has done so for multiple reasons. Investors looking for fire sale steals will swarm around properties in bankruptcy. On the other hand, for a century and a half, investors have flocked to the United States because of the vibrancy and stability of our economy. In the future, the United States will attract the most desirable forms of foreign investment as long as it addresses its economic and policy problems at home.

Some are concerned that China will cash in its U.S. debt holdings and make direct investments instead. We do not see this happening. China is growing both its portfolio and direct holdings in the United States at the same time. Whether it continues to do so is a business question—does the United States present a superior investment opportunity?—rather than a political question.

The United States and China are at a turning point in their economic relationship. In the past, direct investment flowed predominantly from the “developed world” to the “developing world,” from countries such as the United States to China. In the future, China will invest sums abroad as vast as those that foreigners continue to place in China. How well the United States adjusts to this sea change will have a profound impact on its economic interests in the decades ahead, and set the tone for the larger U.S.—China relationship. This study will help America maximize its benefits from the boom without sacrificing security by dissecting the patterns and motives behind China’s direct investment flows and discussing their potential impacts on the United States.

The China Investment Monitor
Parallel to the release of this report, the Rhodium Group (RHG) has launched the China Investment Monitor (CIM), an interactive web application that allows users to explore the patterns of Chinese FDI in the United States. The CIM website will provide regular updates on Chinese investment in the United States and commentaries on specific deals and related topics. Please visit cim.rhgroup.net
Introduction: The Tide Turns for Chinese Investment

Many chapters in the story of China’s reappearance as a powerhouse are yet to be written because they have not yet happened. This is one of them: the emergence of China as a major global direct investor. We stand at the dawn of hundreds of billions of dollars in Chinese mergers, acquisitions, and investments in new greenfield facilities around the world over the decades to come. This is not just a story of new Chinese economic strength: Beijing is compelled to invest abroad because of resource scarcities at home. Chinese firms must put capital to work overseas, because that is where wealthy customers and value-creating talent are. China’s arrival as a direct investor marks a turning point in capabilities. This study seeks to explain what that means from the American perspective, for those running businesses, thinking about job creation, worrying about eroding infrastructure, and managing the national security.

For decades, China has been the biggest destination for foreign direct investment (FDI) in the developing world, but an insignificant player when it came to making such investments around the world. Now, that tide is turning. Over the past five years, China has ramped up its outward foreign direct investment (OFDI) rapidly, and in 2009, China made the top-10 list of global investors for the first time. China’s nascent direct investments were focused on natural resources—Asia, Australia, Africa, and South America saw most of the action. China’s direct investment profile in the United States remained trivial.

Today, however, Chinese direct investment in the United States has reached a takeoff point, and, driven by changes in China’s economy, it is starting to boom. As happened with FDI from Europe and Japan in the past, FDI from China to the United States is now more than doubling annually. This dizzying growth, and the prospect of more to come, has fixated policy makers and deal advisors. But, at the same time, it has stoked worries about what it will mean to have China as the owner next door rather than just a distant contract manufacturer.

1 As we will discuss in detail, direct investment is very different from buying securities such as stocks and bonds, which falls into the category of portfolio investment. China is a major portfolio investor because it has such a large surplus of foreign exchange from its trade surplus to reinvest, and because it is easy: call a broker and tell him to buy. Direct investment, on the other hand, is much more complicated.
The history of the United States is closely connected to inflows of foreign capital, but debates about foreign ownership have been a constant in its history as well.² In prerevolutionary America, patriots worried that British steel mills would make cannonballs to fire on them. Between the two world wars, it was German investment in the U.S. chemical industry that caused concern. The oil shocks of the 1970s fed concerns about OPEC petrodollar investors, while in the 1980s, the emergence of Japan as a direct investor created a near panic.³ In the past decade, investment from newly emerging economies has raised alarm. Middle Eastern investments, such as Dubai Ports World’s attempted purchase of port facilities (2006), attracted intense scrutiny after 9/11, India’s Essar made headlines for taking over distressed steel assets in Minnesota (2007), and Brazil’s Marfrig drew attention for buying up parts of McDonald’s supply chain (2010). However, in recent years, no country’s proposed investments have provoked as much anxiety as those from China.

China now is testing whether the open-market commitment that the United States consistently has held in the past will be sustained. In a mere half decade, Chinese direct investment overtures have elicited new heights of anxiety about inward investment in the United States. The extraordinary period of growth in Chinese investment in the United States now occurring is simultaneously exciting and certain to test American resolve to stand by its long-held notions about the virtues of unfettered flow of investment—notions it has championed around the world for half a century.

Investment from China faces the same categories of misgivings previously directed at other nations: China might buy military-enhancing technologies that could augment its military threat to the United States, deny the United States critical production capacity, or use domestic operations in the U.S. home market to spy or plan sabotage. For more than 200 years, hawkish Americans have warned of such threats to U.S. interests, and yet America has—through thoughtful screening procedures and sound policy regimes—managed to allay those legitimate national security concerns without closing American doors to foreign investment. And economists have found little evidence of negative impact, and often plenty of gains, from these investments. It is not a specific threat, but a more inchoate fear that China is now large enough to shape the world (more than it is shaped by the world) that worries Americans. By exploiting its size, Americans fear that China can sustain autocratic control of parts of its economy significantly longer than the nonmarket challengers that failed to fundamentally threaten U.S. economic interests in the past.

If those fears are justified, then conventional American thinking on inward investment might need to change. If those fears are not justified, and the United States abandons its free-market

² In fact, the first multinational corporations to invest in America arrived with the first settlers: the Plymouth Company came in 1606 and was succeeded by the Massachusetts Bay Company in 1629. The Virginia Company arrived in 1606, and the Dutch West Indies Company appeared in 1621 to establish the trading post called New Amsterdam, which became New York City (see Wilkins 2004).
principles prematurely, then it might well destroy its economy in the name of saving it. Further, what if China's arrival as global direct investor is a harbinger of a more liberal China to come? Will not Chinese firms be profoundly changed by the experience of being legal stakeholders and residents of the global world, just as first- and second-generation Chinese were when they have settled abroad in the past? If so, then the risk to the United States lies in insufficient action to attract Chinese investment to America, not in insufficient efforts to keep it out. This is the complex test the United States confronts today: whether it has the ability to discern its own interests in light of China's rising direct investment.

In this report, we explore the implications of Chinese direct investment for the United States. In doing so, our goal is to inform a review of U.S. interests by taking into account the new realities of a rapidly changing world. We assess the value of investment flows, describe what motivates Chinese firms to venture so far from home, and ask why, after focusing on less-developed places for the past decade, they are now knocking at America's doors. We draw conclusions that we believe are uncontroversial in the face of the evidence we present. Finally, we offer a brief set of recommendations for American policy makers that flow logically from those conclusions.

We believe that a well-informed American response to China's rise can lead to tremendous benefits not only for the United States, but for China and the rest of the world as well. A poorly conceived response, on the other hand, will push economic benefits to other countries without appreciably advancing U.S. national security.

The study is organized as follows:

Section I looks at trends in China's global outward investment and explores the motives behind China's new forays abroad so that Americans can see more clearly the nature of both the risks and the opportunities that this rapidly rising flow of Chinese FDI presents.

Section II turns specifically to the patterns in Chinese direct investment in the United States, and introduces an alternative methodology for capturing the quantity and quality of investment now taking place.

Section III analyzes how Chinese investment impacts the United States, in terms of such factors as employment, competitiveness, innovation, and national security.

Section IV examines U.S. inward direct investment policies and politics, both in general and in the case of investment flows from China.

Section V draws conclusions from our new approach to the data and our discussion of the history and current political economy of Chinese outward investment. Then, we offer eight recommendations to better maximize American benefits from China's foreign direct investment in the United States.
I. Motives: China is Driven to Invest Abroad

Until recently, China was a trivial outward direct investor. Opening to inward FDI was a critical aspect of China’s post-1978 reform, but for the first 25 years, few Chinese firms had the motivation or ability to go abroad. That situation changed in the mid-2000s, and China is now an important overseas investor. At first, outflows were concentrated on natural resources and trade facilitation. But macroeconomic adjustment (such as exchange rate appreciation) and firm-level competition in China are changing the way Chinese firms view the future, compelling them to look abroad for deeper market penetration, service provision opportunities, and technology and skills that can give them a competitive edge. These new motives are propelling Chinese firms to the United States and elsewhere in the industrialized world with greater vigor; if China follows the typical pattern of an emerging economy, it will ship $1 trillion to $2 trillion in direct investment abroad by 2020.

The Emergence of China as a Direct Investor

Foreign investment was critical to China’s post-1978 economic miracle. Foreign investors brought much-needed capital, along with the technology and managerial know-how that were necessary to knit the Chinese economy into efficient regional production chains.4 At first, Beijing tried to control these inflows strictly, limiting them to a few coastal Special Economic Zones in restrictive legal forms and in selected industries. Not surprisingly, foreign interest was modest during these early years (see Figure 1.1).

But as confidence in reform deepened and Chinese firms working with foreigners prospered throughout the 1980s, Beijing broadened the scope for inward FDI. Indeed, in order to restart growth after the 1989 Tiananmen Square debacle, Deng Xiaoping made the bold decision to open China even further to FDI. Annual inflows exploded from $4 billion in 1990 to nearly $40 billion in 2000, most notably from Taiwanese and Hong Kong investors. The pool of foreign investors grew to include other Asian manufacturers (especially from Japan) that needed to control costs in response to steep exchange rate gains against the U.S. dollar, as well as multinational enterprises from Europe and North America.

4 See, e.g., Rosen (1999); and Naughton (1995).
After joining the World Trade Organization (WTO) in 2001, China saw inward FDI jump even further, reaching more than $100 billion before the global financial crisis, which precipitated a sharp drop in FDI in 2009 before bouncing back in 2010. In recent years, China has become the world’s second-largest recipient of foreign direct investment (after the United States), amassing an inward FDI stock of nearly $1 trillion by 2009.

The story of China’s outward FDI could not be more different. Short on capital and fearing the asset stripping and capital flight that had wrecked their communist cousins after the breakup of the Soviet Union, China maintained strict controls on financial outflows throughout the 1990s, even after capital was no longer scarce. Outward FDI, which was virtually zero in the 1980s, remained inconsequential through 2004, averaging $2 billion annually, with the exception of spikes in 1993 and 2002 resulting from early oil company ventures abroad.

**Figure 1.1: Chinese FDI Flows, 1982–2009**

Billions of U.S. dollars, balance of payments data

The mid-2000s marked a turning point as the nation’s growth surpassed expectations, sending commodity import prices soaring and dependence on foreign resources to an all-time high. As China tried to branch upstream from its manufacturing capabilities into raw materials, outward FDI rose from less than $2 billion in 2004 to more than $20 billion in 2006. It more than doubled again in 2008, exceeding $50 billion. The average annual compound growth

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5 According to preliminary data from the People’s Bank of China, inward FDI in the first three quarters of 2010 already had surpassed $120 billion, so the full-year number should return to the precrisis level.

6 The FDI figures in this paragraph refer to balance of payments data collected by the People’s Bank of China, which differ somewhat from the data released by the Chinese Ministry of Commerce, especially in the past three to four years.
rate of China’s outward FDI in 2004–2008 exceeded 130%. In 2009, outflows declined slightly amid the global financial panic, but they were remarkably stable compared to a 40% drop in global FDI flows.7 By the end of 2009, China’s OFDI stock stood at roughly $230 billion, about one-fifth the stock of inward investment.

Continuing high OFDI growth rates in China and sensationalist headlines about multibillion-dollar Chinese takeover bids around the world have led many to believe that the era of Chinese FDI dominance is upon us. But this is not yet the reality. Although China has become a significant direct investor in certain countries and particular industries, it is still far from dominating the global direct investment space. Because China started from such a low base, almost any increase would have given the country double-digit growth.8

China’s current outward FDI stock of $230 billion still accounts for a mere 1.2% of the global FDI stock, on a par with Denmark and only slightly above that of Taiwan.9 It is, of course, higher than that of other emerging markets, including Brazil and India, but vastly lower than that of every advanced economy. Japan, for instance, has a stock three times that of China, while the United States has $4 trillion, or 20 times, the OFDI assets of China. A comparison to China’s 8% share of global trade and 9% share of global gross domestic product (GDP) (see Figure 1.2) reveals the modesty of China’s outward investments to date. An OFDI stock of $230 billion and $5 trillion in GDP give China an OFDI-to-GDP ratio of only 5%. This compares with a global average of 33% and a transitional economy average of 16%. In per capita terms, each Chinese citizen corresponded to $175 in FDI abroad in 2009, while the figure for Americans was $13,500, and the global average was $2,900.

Historical stock figures, of course, are weighed down by the past, and China’s weight is definitely more impressive in annual flow terms. From less than 1% of global flows in 2007, China reached 3% in 2008 and almost 4% in 2009 (see Figure 1.3). This brought a jump in China’s world ranking from twentieth to sixth place in just two years. Given further acceleration in outflows and a global investment environment still not fully recovered from the financial crisis, China maintained a top-10 spot in 2010.10

**Drivers of Outward Investment**

Many observers assume that the recent surge in Chinese outward FDI is attributable to a government campaign to promote overseas investment. China’s outward FDI regime has indeed loosened up, and a “Going Out” campaign has been promulgated since 2000.11 Analysts have

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7 According to UNCTAD, global FDI flows dropped from $1.77 trillion in 2008 to $1.11 trillion in 2009.
8 Adding 1 to 1, to make 2, is a 100% increase; adding the same 1 to 100 to make 101 is only a 1% increase.
9 All global FDI comparators in this paragraph are based on data from UNCTAD.
10 UNCTAD estimates that the level of global FDI flows did not change much in 2010 compared to 2009, while Chinese OFDI should have surpassed the $60 billion mark. See “UN: Developing Econs Claim Largest Share of Foreign Investment,” Wall Street Journal, January 17, 2011, http://online.wsj.com/article/BT-CO-20110117-706020.html.
11 For an overview of China’s outward FDI framework and its liberalization, see Rosen and Hanemann (2009).
Figure 1.2: China in the Global Economy, 2009
China’s share of the global total (percent)

![Chart showing China's share of the global total in various categories including Population, Tourists, GDP, Exports of Goods & Services, Imports of Goods & Services, Accumulation of Reserves, Inward FDI Flows, Outward FDI Flows, Inward Portfolio Flows, and Outward Portfolio Flows.]


Figure 1.3: Still Early Days: China’s Share of Global OFDI Flows, 1981–2009
Percentage of global OFDI flows

![Chart showing the percentage of global OFDI flows from various countries including the United States, United Kingdom, Japan, Germany, China, and India.]

sought a strategic rationale in the patterns of outbound Chinese investment for a decade. For instance, the initial wave of outward FDI centered on energy and resources, in the second, services firms followed those resource pioneers, and the most recent wave has moved on to target technology and customers in more advanced markets. The campaigns that unfolded concurrently with these waves were important political preconditions, but we believe that the real drivers of outward FDI growth are the changing commercial realities in the marketplace that are forcing firms to look overseas to remain competitive. After three decades of immiserizing socialism, Chinese businesses—such as existed—entered the postreform era of the 1980s at a frightful disadvantage compared to global competitors. The attraction of growth at home obviously overshadowed the lure of overseas opportunities. Only now is this reality receding—and it is changing rapidly.12

Microeconomic work on direct investment (i.e., studies of why firms decide to do what they do) describes numerous reasons why firms go abroad. Of course, they go abroad to make money, but the key question is, why it is not easier for them to make more money at home? Academic explanations of outward FDI focus on four motives: securing natural resources, exploring new markets, buying strategic assets, and improving the efficiency of operations across borders.13 All of these motives apply to China’s companies in recent years, and they will intensify in the decade ahead.

**Resource-seeking** investments by state-owned enterprises marked the beginning of China’s outward investment spree, and today still account for a large share of the country’s outward FDI. Rapid urbanization and the expansion of heavy industry capacity have put an end to China’s autarky in oil, iron ore, copper, and other key commodities. Chinese firms now are acquiring equity stakes around the world to diversify supply risks, counter foreign bargaining power, and gain a foothold in highly profitable overseas upstream businesses.

The level of **market-seeking** FDI has been rather low to date because Chinese firms could grow sales relatively easily by expanding the domestic consumer base and shipping goods to foreigners. Until recently, distribution inside China was primitive. Outside of “tier 1” cities, potential consumers barely were considered, so there was vast opportunity to broaden the scale of operations through the simple expansion of distribution networks. By protecting exports from arbitrary barriers, China’s 2001 WTO accession allowed its firms to sell abroad without investments other than logistics operations and representative offices. However, China’s firms will not be able to rely on this model forever. In their traditional export markets, Chinese firms increasingly face trade barriers and competition from newly emerging low-cost producers. For many Chinese exports, the solution will include greater outward FDI.

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12 In Rosen and Hanemann (2009), we describe the macro- and microeconomic factors propelling Chinese firms abroad in greater detail.
13 See, e.g., Dunning and Lundan (2008).
Exporting higher-quality goods requires a presence in retail, for instance, and competitive Chinese capabilities in construction and infrastructure do not work without operations on the ground. The expansion of exports also increasingly faces political obstacles, which leads to “tariff-jumping” FDI. More stringent enforcement of trade remedies, for example, already is giving Chinese steelmakers incentives to “hop over” border barriers.

The reorientation of business strategies also brings the strategic asset-seeking motive into play like never before. Chinese firms need to catch up with other multinationals by purchasing brands, technology, and other assets that will bring them closer to their markets and allow them to better compete with foreigners at home and abroad.

**Efficiency-seeking** investments aimed at streamlining global operations have led Chinese multinationals to invest in Hong Kong and similar places that allow them to optimize the legal and financial structures of their international operations. Overseas investments to disciple firms’ production bases at home are not a part of the story for Chinese firms at this early stage, but with wages rising 10% to 25% per year in China, it will not be long.

Moving up from the company level to the macroeconomic level, several forces are combining to encourage outward direct investment and to advance the aforementioned motives at the firm level. Most importantly, the capital scarcity that constrained Chinese action in the past has ceased to be a limitation on many firms—and for the nation as a whole. Many Chinese firms now have both motive and opportunity, by virtue of strong cash positions. What is more, it is well known that quality investment opportunities to put that capital to work inside China are increasingly hard to find. This has led to overinvestment in already “bubbly” classes of assets, including property developments.

In addition, China’s economy has entered a process of **“rebalancing”** that will further change many firms’ incentive structure in favor of overseas expansion. China’s old model relied on excessive investment in export industries, which created large trade surpluses. Rebalanced growth is focused on increasing household income and domestic consumption. Future growth in the manufacturing sector will be driven more by value-added services and technological upgrades than by expansion of the scale of production.14 As Beijing gradually says good-bye to long-maintained industrial policies, artificial pricing conditions are changing: capital costs, labor rates, raw materials and utilities prices, compliance costs, exchange

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14 See Lardy (2007); He and Kujis (2007); and Rosen and Hanemann (2009).
rates, and tax regimes are all in flux. The competitive pressures arising from this rebalancing process will provide further incentives to managers to seek greater internationalization and reorientation of global business strategies.

Another important feature of this economic rebalancing process is a correction of China’s undervalued exchange rate, a trend that is already under way. A stronger renminbi makes overseas acquisitions cheaper for Chinese firms, which is another incentive to make the step abroad. If Beijing persists in resisting rebalancing, trade barriers erected abroad will provide an equally powerful incentive to invest directly in order to circumvent tariffs, as happened with Japan in the United States during the 1980s.

While China’s rebalancing challenge has unique aspects, other emerging nations have gone through similar experiences. The development pattern of China’s FDI—inward and outward—matches that of other nations. Early in the development process, as with China before 1978, most countries experience little cross-border investment. Foreign investment starts flowing from developed countries once domestic growth takes off, a stage that China reached in the late 1980s. As domestic firms build up their competitive advantages and become able to make acquisitions to further increase their competitiveness, they begin to look for overseas investment opportunities. The next stage of their development centers around outward FDI. This is the stage that China’s eastern commercial hubs have entered: inward FDI remains high, while outward investment is starting to take off.

**Outlook**

If China follows the typical pattern, the world will see hundreds of billions of dollars in Chinese overseas investment in the decade ahead, balanced between mature markets and natural resource hosts. China soon will become a net exporter of FDI: China’s Ministry of Commerce expects this crossover to occur around 2015, while the International Monetary Fund (IMF) thinks that it could happen as early as 2011. By 2020, China’s GDP probably will have surpassed $20 trillion, or GDP per capita around $14,000. If the traditional relationship between GDP growth and FDI flows holds, outbound investment over these 10 years will grow quickly, even under conservative assumptions. The current low OFDI-to-GDP ratio of 5% would yield $1 trillion in new OFDI through 2020 ($100 billion per year on average). If China’s ratio rises to the transitional economy average of 15%, outflows would amount to roughly $3 trillion, or approximately $300 billion annually. Based on those projections, we place our bet between these two figures, at $1 trillion to $2 trillion by 2020.

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15 See Dunning (1981) for the foundations of the investment development path (IDP) theory for explaining countries’ international direct investment position; see Dunning, Kim, and Park (2008) for a review of the applicability of the IDP theory in explaining the FDI position of today’s emerging economies. 
Box 1: Foreign Direct Investment: Definition and Data Sources

In national accounting statistics, cross-border investment flows are separated into five categories: direct investment, portfolio investment, derivatives, other investment, and reserves. 17

1. By common definition, direct investment entails cross-border capital flows that achieve significant influence over the management of an invested entity and a long-term investment relationship. The threshold for a direct investment is 10% of voting shares.

2. Portfolio investment is described as a typically shorter-term investment in liquid (easily bought and sold) securities, which might include holdings of equity shares with less than 10% of voting rights, or corporate debt instruments (neither of which convey control or, in the case of debt, ownership).

3. The derivatives category includes financial instruments such as swaps, futures, and options, which are only contractually related to the underlying value of real assets such as firms or commodities. 18

4. The residual category of other investment captures all flows that do not fall under the previous categories, such as foreign bank deposits, currency holdings, cross-border loans, or trade credits.

5. Reserves held by governments in the form of gold, foreign exchange, or special drawing rights at the IMF represent another category in international financial statistics.

Foreign direct investment (FDI) flows can include three components: equity investment, reinvested earnings, and other capital flows. A direct investment relationship starts with an equity injection into an overseas subsidiary, either for the establishment of a new overseas subsidiary (greenfield investments) or to acquire a significant stake (greater than 10%) in an existing company (mergers and acquisitions). Once such a direct investment relationship begins, subsequent capital flows between the parent company and foreign subsidiary are counted as direct investment. In addition to potential additional equity injections, this can include profits that are not sent home, but rather are reinvested in the company (reinvested earnings) and other capital flows between the two firms—for example, when the overseas parent lends money to its overseas subsidiary, or vice versa (intracompany debt). 19

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17 See the IMF’s Balance of Payments and International Investment Position Manual; the IMF definitions also are used by other international organizations such as the OECD and UNCTAD.

18 The new category of derivatives was introduced in the sixth edition of the IMF’s Balance of Payments and International Investment Position Manual, released in 2009; most countries’ statistics still are based on earlier versions and thus do not yet show derivatives as separate category.

19 Detailed information on the nature of direct investment and its measurement can be found in the OECD’s “Benchmark Definition of Foreign Direct Investment” (OECD 2008a).
A range of different measures and sources are available for tracking FDI flows and stocks. Most countries compile balance of payments statistics that include information on annual inflows and outflows for each type of cross-border investment and related income flows. The corresponding numbers for the inward and outward stock of each category, which is the accumulated flows adjusted for exchange rate and valuation changes, are recorded in countries’ international investment position statistics. The IMF uses these figures reported by its member states to compile global financial statistics.

In addition to such national accounting statistics that capture aggregate flows with the rest of the world based on IMF standard definitions, many countries publish additional data sets that provide a more disaggregated view of their investment relationship with other economies. Several international organizations, such as the United Nations Conference on Trade and Development (UNCTAD) or the Organisation for Economic Co-operation and Development (OECD), also collect data on FDI and other cross-border investment flows. However, the accuracy and quality of official statistics on cross-border investment flows suffers from the increasingly complicated structures of the underlying financial transactions. In the case of FDI, the tax optimization strategies of multinational corporations, as well as related practices such as transfer pricing and the use of shell companies in offshore financial centers, complicate the compilation of statistics. In light of such distortions, alternative approaches to data collection can be helpful to complement the official balance of payments statistics. Online-based research opportunities, commercial databases for certain types of cross-border investment flows, and specialized research products nowadays provide a fertile ground for such alternative data collection strategies.
II. Patterns: Chinese Direct Investment in the United States

China and the United States have a long history of economic interaction, but the early years of China’s post-2004 outward FDI boom centered on minerals, energy, and other sectors—characteristic of developing countries—rather than investment in the United States. After painting the big picture with conventional investment data, we apply a more timely methodology to show that this situation is changing dramatically: the value of China’s direct investment assets in the United States has grown 130% annually for two years—albeit from a low base. We disaggregate the patterns in these flows in terms of sector, ownership of Chinese firms arriving in the United States, which U.S. states are seeing the greatest inflows, and other factors. We also discuss the outlook for future investment growth if these patterns are sustained.

The Aggregate Picture
The U.S.–China economic relationship predates American independence: it was Chinese tea—British owned and taxed—that the Sons of Liberty threw into Boston Harbor in December 1773. In other words, Chinese goods and firms are not arriving in the United States for the first time. In the 1920s, Chinese banks already had direct banking operations in New York. On the eve of World War II, 47 U.S. enterprises were controlled by Chinese parties. Burgeoning two-way investment ties were shattered first by World War II, and then by China’s self-imposed isolation from the capitalist world for 30 years following Mao Zedong’s Communist victory. After Mao’s death in 1976 and Deng Xiaoping’s rise to power, even though a legal framework for OFDI was crafted in 1984 and cautious encouragement was offered in the 1990s, the imperative to hold on to foreign exchange reserves meant that for the first 20 years of China’s reform era, interest in investing abroad was limited.

China continued to attract huge capital inflows and ran massive trade surpluses in the 2000s, but Beijing persisted in forcing businesses that earned foreign exchange to hand it in for yuan (a “surrender requirement”) in order to tightly manage the value of its exchange rates. This left Beijing with the task of somehow reinvesting all of these dollars, and thus began the era of heavy Chinese purchases of U.S. government securities. By mid-2009, China was the

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21 See Wilkins (2004, 443, Table 8.2).
proud owner of at least $1.4 trillion in U.S. government obligations,\textsuperscript{22} as well as $80 billion in corporate equities and $16 billion in corporate debt.\textsuperscript{23} While making portfolio investments in stocks and bonds is as easy as calling a broker, China was ill prepared to invest directly in a regulated, advanced marketplace, which would mean operating real businesses, staffed by Americans. Operating direct investments presents unmanageable, if not unimaginable, challenges for most Chinese executives—matters such as employee discrimination lawsuits and sexual harassment law, which are unknown in China. The official estimates from the U.S. Bureau of Economic Analysis (BEA) put the accumulated stock of Chinese FDI in the United States at $2.3 billion at the end of 2009 (see Figure 2.1).\textsuperscript{24} Therefore, while America’s investment footprint in China consists of high-return FDI and equity portfolio investments, China’s portfolio in the United States consists of low-yield government debt securities, a small portion of equities and corporate debt, and very little direct investment.

**Figure 2.1: Chinese Portfolio Holdings versus Direct Investment in the United States, 2009***

Billions of U.S. dollars


* Portfolio investment data refers to June 2009; the FDI figure is year-end 2009 from the Bureau of Economic Analysis (ultimate beneficiary owner data).

** Direct holdings only.

\textsuperscript{22} Treasury securities are debt instruments issued by the U.S. Department of Treasury. Agency securities are debt instruments issued by government-sponsored corporations (such as Ginnie Mae or the Federal Home Loan Banks), and therefore enjoy an implicit or explicit government guarantee.

\textsuperscript{23} The composition of Chinese portfolio investment in the United States has changed quite a bit since 2009. For the newest monthly numbers of Chinese holdings of Treasury and other securities, see the Treasury Department’s Treasury International Capital system. Also, note that China’s actual holdings of U.S. government securities should be even higher than the direct numbers indicate because of indirect purchases through third countries; for a discussion of this phenomenon, see Setser and Pandey (2009).

\textsuperscript{24} For a detailed discussion of available data sources for Chinese investment in the United States, see the Appendix.
Is China’s current $2.3 billion of direct investment in the United States significant? No, not yet, especially compared with a total FDI stock in the United States in 2009 of $2.3 trillion. Developed economies account for more than 90% of that stock. Europe dominates with more than two-thirds of the total (see Figure 2.2). While the Asian share ranks second with 16%, China makes up only 0.1% of the total—a trivial amount compared to the United Kingdom ($454 billion), Japan ($272 billion), and Germany ($260 billion). China’s share is far lower than smaller countries, including Mexico ($34 billion), Saudi Arabia ($14 billion), Korea ($14 billion), and Brazil and India (both $6 billion). When it comes to direct investment in the United States, the world’s second-largest economy still plays in the same league as New Zealand and Austria.

**Figure 2.2: Composition of U.S. Inward FDI Stock by Source Country, 2009**

Percentage of total inward FDI stock ($2,319 billion), ultimate beneficiary owner principle

A Bottom-Up Assessment of Chinese FDI in the United States

The official statistics on China’s FDI do not tell the on-the-ground story well. They record flows on a balance of payments basis and suffer from several shortcomings: they fail to fully track flows moving through tax havens and other third countries; they record investment on a net-flow basis; and they suppress useful information to protect investor confidentiality. Official data from the Chinese side of the ledger are less reliable still.25 Left with these suboptimal choices, we have compiled our own picture by combining data from professional databases, media and press reports, and industry contacts with our own exhaustive due diligence and assessment of each potential instance of Chinese FDI in the United States.

Our data set reflects gross U.S. investment by ultimately Chinese-owned entities in both greenfield and acquisition projects. Thus, we neglect reverse intracompany flows, and we also

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25 See Rosen and Hanemann (2009) and the Appendix herein for a discussion of the weaknesses of Chinese outward FDI data.
count capital raised by Chinese investors outside of China—for example, in Hong Kong or the United States itself (e.g., if $20 million of a $50 million Chinese acquisition in St. Louis was financed with loans from Missouri banks.) Our approach also records deals run through third-party offshore financial centers typically used by Chinese firms, which the official data often miss. Our numbers are not directly comparable to the official data and have their own shortcomings, but they permit a more comprehensive, real-time evaluation of China’s presence in the United States. We find that the Chinese FDI takeoff is already under way, and Chinese investment in the United States is much greater than the official data suggest.

For the period 2003–2010, we record 230 Chinese investments, almost equally split between greenfield projects (109) and acquisitions (121) (see Figure 2.3). At around $11.7 billion, the accumulated value of these deals is significantly larger than the $2.3 billion stock reported in the official BEA statistics (see Appendix for an explanation of data differences). The takeoff in Chinese investments is clear: from 2003 to 2007, Chinese direct investment in the United States averaged well under $500 million, with the exception of 2005, when Lenovo’s $1.75 billion acquisition of IBM’s personal computer unit caused a spike. During this time, the number of deals was generally flat, with roughly only 5 greenfield projects and 10 acquisitions per year. After 2007, the trend increases in both number and value of deals. There were more than 30 new greenfield investments in 2009, while acquisitions climbed from 11 in 2007 to 22 in 2009. The gross deal value grew even more steeply, reflecting a steady increase in the scale of individual projects. For 2010, we record 25 greenfield projects and 34 acquisitions, together worth more than $5.3 billion. Chinese firms’ interest in working with foreign equity partners, and the breadth of industrial investment visible in our data and discussed later, both underscore the centrality of conventional commercial motivations.

With regard to preferred entry mode, our data set shows the number of Chinese investments split evenly between greenfield projects and acquisitions. In value terms, acquisitions account for 77% of the total—$9 billion as compared to $2.7 billion (see Table 2.2). The dominance of acquisitions in value terms reflects the high price tags on five major purchases. Chinese firms usually take a controlling stake (100 out of 121 acquisitions resulted in stakes of 50% or higher), but in many instances, Chinese firms team up with U.S. investment partners. In industries that are politically sensitive, Chinese buyers have been quite cautious, often restricting their purchases to stakes below the controlling interest threshold. Similarly, Chinese investors have refrained from hostile takeover bids for U.S. companies. Interestingly, the share of greenfields

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26 For a detailed description of our methodology, comparators, and the caveats, see the Appendix.
27 These include Tianjin Pipe’s $1 billion Texas steel plant (2009); CIC’s $1.58 billion 18.9% stake in AES; and CNOOC’s $1.08 billion investment in the Eagle Ford shale gas project in Texas (both in 2010).
29 For example, in the case of the Lenovo–IBM takeover or several acquisitions in the auto parts industry.
30 See, e.g., CIC’s 15% stake in utility AES or CNOOC’s 33% stake in Chesapeake’s shale gas assets in Texas. For a detailed overview of the sample and distribution of investment by stake, see Table A.1 in the Appendix.
in total Chinese investment flows has been higher recently than the U.S. average for other countries before 2009. These greenfield projects are mostly wholly owned by Chinese investors; there are few examples of greenfield joint ventures with domestic U.S. parties. Chinese investors have completed greenfield investments in sophisticated industries, including communications equipment, renewable energy, biotechnology, aerospace, and pharmaceuticals. While these forays are not yet in the high-tech cores of these advanced industries, it would be a mistake to underestimate the potential of Chinese firms to invest in sophisticated U.S. operations.

Figure 2.3: Chinese Investment in Greenfield Projects and Acquisitions in the United States, 2003–2010
Millions of U.S. dollars, number of deals

Our data set allows for an assessment of Chinese investment in the United States by industry, summarized in Figure 2.4. Clearly, Chinese firms are not concentrated in one or even a few strategic industries, but are making inroads across the spectrum of commercial America. In 11 industries, we find more than $200 million in Chinese deals completed. One third of these are services and two thirds are industrial: industrial machinery and equipment, electronics, coal, oil and gas, automotive, communications equipment, medical devices, renewable energy equipment and metals. The biggest-ticket sectors for China in America ($2 billion or more) are ones in which the Chinese already are known to have a comparative advantage at home,

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31 According to the most comparable BEA data set on new investments in the United States (a series that since has been abandoned), acquisitions accounted for the overwhelming share of new FDI in the United States. Anderson (2009) elaborates that around 80% of new investment in 2008 came in the form of mergers and acquisitions. In that year, the share of acquisitions in total Chinese U.S. investment was around 60%.

32 See, e.g., the 2010 coinvestment by Anshan Steel in an American-run slab steel facility, or the corporate structure of Haier America.

33 A more detailed overview can be found in Table A.2 in the Appendix.
such as appliances (Sany, Haier) and consumer electronics (Lenovo), and should be seen as movement down the value chain. The largest category by value is industrial machinery, equipment, and tools; this reflects a $1 billion Tianjin Pipe plant under construction in Gregory, Texas, and $1.5 billion in electrical equipment investments in Goss Industries of Illinois by the Shanghai Electric Group. These are plain vanilla industrial goods. The second-largest sector, electrical equipment and components, is dominated by the Lenovo–IBM transaction ($1.75 billion), and is an excellent example of a Chinese original equipment manufacturer moving sideways into downstream capabilities. In fact there are 16 industry clusters in which more than $100 million in Chinese direct investment is recorded. We see growth well distributed across the table, in manufacturing and services sectors, in higher-tech and lower-tech, in strategic areas, and in run-of-the-mill industries.

Several other patterns emerge from the data. First, unlike FDI in earlier years, most of the growth since 2008 has occurred in manufacturing. This includes technology-sector acquisitions of existing facilities, but also a growing number of greenfields. Chinese investors have financed new facilities in consumer electronics, machinery, auto parts, steel, processed food and supplements, and other products. And though there have been cases of acquisition for the purpose of transferring assets back to China, the majority of Chinese firms continue to expand the facilities they have purchased in the United States (see Box 2).

Second, earlier Chinese tertiary-industry direct investment was aimed at facilitating massive U.S.–China merchandise trade flows, such as wholesale services and trade finance. Today’s service sector investments target higher-value-added service activities such as software development. This trend coincides with changes in business strategy back home. With so much production overcapacity, Chinese firms are asset seeking for the nonmanufacturing profit centers they lack. Many are driven to capture more profit per unit, rather than simply churning out more units at an ever slimmer marginal profit. Those margins are to be found in upstream design and innovation and in downstream distribution, retail, and brand management—both of which are concentrated in the United States and other higher-income markets. This revolution in firm-level strategy is a critical driver of Chinese investment interests in advanced markets, including the United States.

One can see these phenomena at work in the acquisition of IBM’s business personal computer division by Lenovo and in numerous other deals—even, most recently, in finance. So far, Chinese investment in the U.S. financial services industry has been limited to portfolio stakes, but a recent attempt by the Industrial and Commercial Bank of China (ICBC) to purchase a controlling stake in the U.S. subsidiary of the Bank of East Asia indicates a rising

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34 Our database does not capture many smaller-scale trade-related representative offices and similar facilities, as these investments are too small to appear on the radar of media and data mining firms. Therefore, our list most likely underestimates the scope and scale of these investments (see the Appendix).
35 For example, CIC’s minority stakes in Morgan Stanley and Blackstone, China Life’s investment in Visa Inc., and Minsheng Bank’s stake in the now-bankrupt United Commercial Bank.
desire on the part of Chinese banks to support their traditional clients that have come to America. ICBC’s foray, if successful, likely would presage additional overtures by China’s banks—today the world’s largest—to enter the North American market.

Third, investment in real estate and infrastructure remains small, but interest is growing quickly. So far, Chinese firms have avoided major “trophy purchases,” such as Japanese investors made in the 1980s. However, interest in property has increased amid falling U.S. prices and skyrocketing home prices in China. Both official statistics and our database underreport Chinese investment in U.S. real estate, as large commercial buying programs can be camouflaged by myriad individual purchases. Chinese interest in infrastructure and utilities is also on the rise, as these sectors tend to offer stable investment returns. Chinese conglomerates have substantial experience in these construction-related sectors after 30 years of supercharged infrastructure growth at home. Examples of infrastructure plays, both passive and active, include the China Investment Corporation’s stake in the power company AES, the stake of the China Huaneng Group in Massachusetts-based InterGen, declared interest in joining high-speed rail consortia, and Chinese supplier and developer interest in U.S.-based renewable energy projects. Infrastructure services firms such as China State Construction (CSCE) are bidding on public tenders, although political sensitivities have slowed their progress. Tight state and municipal finances are making highly price-competitive Chinese participation all the more attractive. CSCE is already at work on New York City’s Second Avenue Subway, and it has several other contracts under way in the United States.

From 2003 to 2010, Chinese firms invested in at least 35 of 50 U.S. states. The location decision of Chinese firms reflects a mix of factors, including existing industry clusters, the competitive strengths of specific regions and their efforts to woo investment, and ethnic and cultural factors. Table 2.1 shows the top 20 destination states for Chinese investment in the United States. In light of the relatively low level of total investment, large-scale deals lifted Texas (Tianjin Pipe and China National Offshore Oil Corporation, or CNOOC), New York (IBM), and Virginia (AES) to the top of the list. New York also has attracted a large number of companies in the financial sector and other related high-value-added services, and it has become an attractive location for the North American headquarters of Chinese firms. Texas, South Carolina, and Georgia have established themselves as attractive locations for Chinese manufacturers. Because it is a common incorporation domicile, Delaware shows up as a leading target for smaller-scale takeovers. Not surprisingly, the state with the largest number of Chinese investments and the broadest portfolio is California, with projects including logistics, manufacturing, modern services, and retail.

36 During the period 2003–2010, we record investments in all U.S. states except Alaska, Arkansas, Kansas, Louisiana, Maine, Montana, Nebraska, North Dakota, Oklahoma, Rhode Island, South Dakota, Vermont, West Virginia, Wisconsin, and Wyoming. An excellent team of graduate students at Columbia University’s School of International and Public Affairs, including Jason Zhouqing Li, Chris Shinnerer, and Shuang Wu, contributed to the state-by-state assessment.
Figure 2.4: Chinese Direct Investment in the United States by Industry, 2003–2010
Number of deals, total investment, average deal size

Table 2.1: Top 20 Destinations for Chinese FDI, 2003–2010
Number of deals and total investment

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<th>Total Investment (USD mn)</th>
<th>Number of Deals</th>
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<th>Total Investment (USD mn)</th>
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Source: Authors’ compilation; see Appendix for details, sources, and methodology; see Table A.2 for detailed data; categories are based on SIC codes, see Table A.3.

*Calculations exclude deals with missing values.

Source: Authors’ compilation; see Appendix for sources and methodology.
Many Americans erroneously assume that all Chinese firms are state related. The reality is that ownership in China is diverse, and this is reflected in Chinese investment abroad. The range of investors in the United States includes China’s sovereign wealth fund (China Investment Corporation, or CIC), state-owned enterprises (e.g., Sinochem), firms with hybrid ownership structures (e.g., Lenovo), and wholly private firms (e.g., Sany). And though state-controlled firms are a big part of the U.S. story by value, private firms’ share in the United States is higher than for China globally.

According to China’s Ministry of Commerce, state-owned enterprises accounted for 70% of China’s global OFDI stock in 2009, reflecting the head start they had getting approval in past years. And because state-owned firms dominate natural resources in China, their percentage of overseas deals tends to be far larger than for private firms.37 These natural resource investors are less dominant in China’s U.S. investment footprint than elsewhere—say Brazil or Australia. So, in the United States, privately held Chinese businesses represent a greater share of the deals made. Table 2.2 shows that 170 of 230 recorded investments between 2003 and 2010 (74%) originated from private firms—which we define as having 80% or greater nongovernment ownership. However, in terms of total deal value, the picture is reversed: state-owned firms account for 65% of the total. This high share mostly can be attributed to three large-scale acquisitions and one big greenfield project by state-owned firms.38

**Table 2.2: Chinese Direct Investment by Ownership of Investing Company, 2003–2010**

Percentage of total, number of deals, millions of U.S. dollars

<table>
<thead>
<tr>
<th>Number of Deals</th>
<th>Greenfield Projects</th>
<th>% share</th>
<th>M&amp;A</th>
<th>% share</th>
<th>All Deals</th>
<th>% share</th>
</tr>
</thead>
<tbody>
<tr>
<td>Government Controlled</td>
<td>33</td>
<td>30%</td>
<td>27</td>
<td>22%</td>
<td>60</td>
<td>26%</td>
</tr>
<tr>
<td>Private and Public**</td>
<td>76</td>
<td>70%</td>
<td>94</td>
<td>78%</td>
<td>170</td>
<td>74%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>109</strong></td>
<td><strong>121</strong></td>
<td><strong>230</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Total Investment (USD mn)</th>
<th>Greenfield Projects</th>
<th>% share</th>
<th>M&amp;A</th>
<th>% share</th>
<th>All Deals</th>
<th>% share</th>
</tr>
</thead>
<tbody>
<tr>
<td>Government Controlled</td>
<td>1,740</td>
<td>66%</td>
<td>5,793</td>
<td>64%</td>
<td>7,533</td>
<td>65%</td>
</tr>
<tr>
<td>Private and Public**</td>
<td>913</td>
<td>34%</td>
<td>3,227</td>
<td>36%</td>
<td>4,140</td>
<td>35%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>2,653</strong></td>
<td><strong>9,020</strong></td>
<td><strong>11,673</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Authors’ compilation.

*Ownership of ultimate parent company.

** Might include listed firms with minority stakes by government-owned firms or related entities (<20% as of March 2011).

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37 According to the Chinese version of the Ministry of Commerce’s 2009 report on Outward Foreign Direct Investment, state-owned enterprises accounted for around 70% of total Chinese OFDI stock in 2009. The authors’ interviews with economists and researchers at China’s State-Owned Assets Supervision and Administration Commission suggest that the share of state-owned enterprises in total OFDI stock could be higher.

38 CIC’s stake in AES ($2.5 billion), the Tianjin Pipe steel plant ($1 billion), CNOOC’s stake in the Ford Eagle Shale project ($1 billion), and Pacific Century’s acquisition of Nexteer Automotive ($450 million).
Outlook
We estimate that Chinese firms will place some $1 trillion to $2 trillion in direct investments around the world over the coming decade. The absolute value of investment destined for the United States – all else being equal – will grow strongly as the share of nonresource investments in China’s total OFDI is gradually catching up. These new investments will spread across a wide range of industries, including manufacturing and high-value-added services. Such investments already are taking place across the United States. Both macroeconomic factors and on-the-ground competition in China will fuel this newfound appetite for U.S. exposure.

It is tempting, therefore, to conclude that the future will be ever brighter for both partners in this equation. But the surprising new volume of direct investment from China is giving rise to as much consternation as clapping. It is far from obvious to many Americans that these Chinese investment flows should be welcome. Some are simply afraid of competition, or do not know what to make of Chinese ethics and culture; but serious questions about national security and the pernicious effect of nonmarket subsidies distorting competition must be considered as well. In the next section, we will assess the potential economic, commercial, and security impacts of China’s FDI, and in the conclusion, we will consider how to maximize the benefits for Americans.
III. Impacts: Benefits and Risks of Direct Investment from China

Should Americans roll out a red carpet for Chinese direct investment, or put up flood-gates to hold it back? Americans are debating this question, with strong emotions on both sides, but it is valuable and possible to approach the question analytically. At the level of aggregate American interests, there is literature on the traditional economic benefits that arise from inward investment, and similar reviews of potential costs.

Many Americans will be more interested in the local, or microeconomic, implications of Chinese direct investment—the impacts on jobs, communities, and local competitiveness. Because China is just beginning to invest in the United States, an economic assessment must rely heavily on past patterns from other countries. We look at China through this traditional lens, but ask whether the peculiar mix of size, state intervention, and markets in China changes the math. Some believe that China presents a nontraditional threat, and that U.S. open-market principles should be compromised to quarantine the United States from China. National security impacts are a separate area that we consider. To date, the United States has concluded that a strong national security screen and an open direct investment regime are not mutually exclusive, and America’s openness to competitive economic pressure from abroad has strengthened our security rather than weakened it.

We conclude that China’s impacts can be managed under existing U.S. FDI doctrine: welcome the economic benefits and competition from foreign direct investment (they are often the same thing!); screen out all deals with specific negative security implications; and handle more general concerns about Chinese behavior under domestic law rather than expecting the inward investment review process to carry that weight.

The Macro View: Global Integration and Economic Efficiency

From a macroeconomic perspective, openness to foreign investment benefits the United States for the same reasons that open trade does: it allows firms to operate more efficiently across borders, reducing production costs and consumer prices. Global integration increases U.S. welfare as it promotes specialization, allows greater economies of scale, and increases competition in the marketplace. Direct investment across borders is an important precursor for many of these benefits. For some products, foreign trade alone keeps competition healthy. But for most, whether manufacturers or service providers, local operations are needed in order to be competitive.
The results of increased competition are typically lower prices and better value for U.S. consumers, as well as a wider selection of options to select from. Just think of the value that IKEA has brought to the American home furnishings market by introducing a different style of retailing. Openness to foreign direct investment means better prices for American sellers, too, as the competition for the assets they own is greater. Economists tabulate other categories of positive impact from direct investment as well, such as specialization and increased economies of scale.

Inward FDI from China has the same positive macroeconomic effects as FDI from other countries. Examples of the benefits of increased competition are abundant. For instance, the market entrance of Haier America fostered greater competition in U.S. white goods markets, bringing American consumers lower prices and more innovative products. Haier’s mini-fridges are now standard items in American college dorms and hotel mini-bars. Even the failed CNOOC–Unocal takeover helped increase competition in the bidding process. Unocal attracted an acquisition bid of $18.5 billion from CNOOC in mid-2005, compared to an initial bid of just $16.5 billion from Chevron; although the Chinese bid ultimately was scuttled by U.S. politics (more about this later), Chevron’s winning bid ended up being raised by $600 million (which, in turn, increased the profit for pension funds and other holders of Unocal shares).

A good example of inward FDI facilitating beneficial specialization is Lenovo’s purchase of IBM’s poorly performing personal computer division, maker of its ThinkPad laptops. By shedding an unpromising area of its business, IBM was better able to marshal resources to focus on more promising areas and, at the same time, cement goodwill in China. Finally, Chinese firms operating under lean conditions are developing their own manufacturing insights, and in the future, “knowledge spillovers” will flow to Americans from their interaction with multinational Chinese firms. 39

What negative economic impacts can we imagine from foreign firms bringing money and managers to America and investing them in unmovable, long-term operations here? Before addressing that, remember that the U.S. FDI screening regime looks for national security threats only, not negative economic news: the Committee on Foreign Investment in the United States (CFIUS) does not exist to shield the United States from Chinese economic competition. But we discuss the potential economic negatives from inward FDI anyway.

39 Freeman (2009) offers an excellent discussion of the benefits and costs of globalization for the United States in the example of a specific Chinese acquisition and the reactions to it.
First, “tariff-jumping” FDI could have negative effects, although, on net, those effects might be offset. When foreign exporters are blocked by a protective U.S. tariff, for example, they might establish or purchase U.S. operations, sell unblocked inputs to the United States, and process them for sale there in their new facilities. There is considerable evidence that anti-dumping duties confer economic benefits on U.S. firms that petition for them; however, if those duties induce FDI by the targeted foreign exporters, those benefits disappear. But it may be that U.S. consumers benefit from a new entrant in the market, and in setting up U.S. operations, the foreign firm is investing in America and becoming a taxpayer, and it is hiring Americans to do things that previously were done abroad. On net, it is not at all clear that the United States is worse off even when tariff jumping is at work. In fact, such foreign firm behavior is often what U.S. officials have had in mind in the past in increasing border tariffs: incentivizing foreign firms to bring work to America. Such was the case with Japanese firms, not least in automobiles, in the 1980s. It is widely conjectured that the recent spate of inward investment by Chinese steel firms reflects an effort to get over the new tariff walls. Economically, the tariff-jumping argument is really no different in the case of China than it has been in the past with other economies.

Second are worries that foreigners might reorganize U.S. operations so as to move “good” jobs home and leave less desirable work to Americans. In the 1980s, there was great concern about core–periphery relationships between home and host nations, in which technologically advanced and high-value work would be migrated to home facilities where it could be protected, leaving jobs entailing less know-how and wage growth potential to foreign operations. It is nearly universal, for example, to hear American multinationals in China claim that they are keeping their “crown jewels” in the United States for fear of losing core competencies to Chinese competitors. The logic of this argument breaks down, however, when it is applied to Chinese acquisitions in the United States. Certainly, Chinese firms would benefit from the intellectual property and sophisticated operations of firms they might buy in the United States. However, unlike the U.S. firm that originated these capabilities, the Chinese acquirer would have little prospect of relegating skilled American workers to low-skilled positions—most likely, workers simply would take those skills to local competitors.

Today, the notion of core–periphery dynamics appears increasingly outdated. Jobs and even whole business functions are moved around the world by global firms constantly nowadays, and those tasks are often more mobile than the individuals and families who do them. But firms are distributing more of their high-skilled operations, not less, in an effort to be more agile and responsive to local market realities. The U.S. economy traditionally has attracted a lot of foreign investment in higher-skilled activities, creating “good jobs” that pay wages higher than the U.S. average. Although Chinese firms do not have a long track record, the available data

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40 On the impact of anti-dumping petitions on firms, see Blonigen, Tomlin, and Wilson (2002).
and anecdotal evidence suggest that they follow the same patterns. They pay higher wages on average, and firms such as Lenovo, Wanxiang, Huawei, and Haier have increased, not reduced, their payrolls in high-value-added activities after making the move to the United States. If the United States and its workforce remain competitive in such high-skilled activities, there are few incentives for Chinese and other foreign firms to deviate from these patterns.

Finally, there are concerns that foreign investors will vacuum technological know-how out of the United States and take it back home. These fears are heightened in the case of China, which has intervened heavily in its home market for decades in order to exploit foreign technology for the benefit of Chinese firms. China has stated its intention to bolster national champions through interventions to promote indigenous innovation. China clearly does not play by the same rules on its home court as we do on ours, and that complicates the FDI picture. As a national security matter, the transfer of technologies to China may be a serious concern. For purposes of our economic tally, if the concern is the inappropriate acquisition of intellectual property, then normal U.S. law, and not the decision to allow inward investment, is the answer. Moreover, if, as an economic matter, the owners of a U.S. technology wish to sell it, they can take it to international markets as readily as they can sell it at home; preventing inward investment changes nothing (except, again, in national security cases, in which export controls apply).

None of these concerns is novel: all have come up with regard to other nations in the past, and, after much argument, economists and policy makers concluded that the negatives were manageable in light of the benefits of FDI. However, another question remains: is China different? The country’s sheer scale (more than four times the U.S. population), the extent of state intervention and manipulation of prices, and the distorting effect of financial transfers within the Chinese system leave many wondering whether this case is different. Ordinarily, countries are price takers internationally: even if they distort their home markets, they will not affect world prices. However, there are concerns that China is so large and influential that its state interventions will distort world prices and markets. Until recently, Western economists comforted themselves with the belief that industrial policy and state intervention were doomed to prove inefficient, fail, and thus halt. If China’s size, momentum, and developmental success using a statist model are more effective for China than for others, or even if it simply takes 10 more years for the weaknesses in China’s statism to show up, then our traditional laissez-faire assumptions may be hazardous.

This is a general concern about economic engagement with China; in the direct investment context, the chief concern is that with lower capital discipline (thanks to cheap loans at home for overseas expansion), China’s state-owned firms will be able to buy up economically important firms and behave recklessly with them (either intentionally or because of a lack of managerial capacity and careful planning), threatening the otherwise healthy growth of U.S. industries.
This was the central argument in congressional objections to CNOOC’s proposed acquisition of Unocal. It has entered into the debate over wind power investments by Cielo and A-Power, has come up in congressional hearings in the context of capital subsidies for Chinese CT scanner manufacturers, and invariably casts a shadow over Chinese overtures. Artificially low capital costs were also at the heart of the far-reaching United Steelworkers Section 301 petition on China’s Policies Affecting Trade and Investment in Green Technology, filed in September 2010. That case sought goods imports trade policy relief, of course, not protection from the competitive impact of direct investment. But concerns that Chinese investors with access to subsidized loan facilities from state-owned banks have an unfair advantage in global competition for assets, distorting the efficient allocation of capital globally, are perfectly analogous. Such fears have been a major issue in the ongoing debate on Chinese investment in the United States.  

In the traditional analysis, if U.S. sellers are overpaid by Chinese firms that enjoy subsidies, then good for them—even if there were a nonmarket intent, as long as there is no specific threat to U.S. national security, there should be no case for blocking a direct investment. But does the prospect of a China with an industrial policy on steroids, fed by a trade surplus with the United States for a decade or more to come, lead us to a different conclusion? In fact, we believe that as Chinese capital becomes more globally mobile, the financial repression at home that reduces borrowing costs for some firms will become a matter of significant international concern. Domestic subsidies affecting trade are actionable under the WTO; domestic subsidies affecting direct investment, however, are not disciplined by a multilateral regime: that is a lacuna in the international economy that has concerned policy makers for some time.

For the time being, China’s FDI outflows are not nearly large enough to distort global asset prices, but this will change in the years ahead. Ideally, the potential distortion of global direct investment flows by domestic subsidies should be disciplined by a multilateral competition policy regime rather than by inward FDI screening. However, we recognize that if outflows from a state-interventionist economy such as China become large enough to be systematically troublesome before a regime to discipline such outcomes is developed, then national FDI approvals almost inevitably will be drafted into service to address them.

Finally, it is important to consider the possible impact of China’s outward FDI on the U.S.–China balance of payments in the years ahead. Although the United States runs trade deficits and borrows money from foreigners to finance its government budget (the “twin deficits”), the net international investment position (NIIP) of the United States today is fairly strong.

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41 See the debates surrounding the attempted acquisition of Unocal by CNOOC or the investment of Chinese steelmaker Anshan in a slab steel factory in Mississippi. For an in-depth academic discussion of capital subsidies in cross-border mergers and acquisitions, see Hufbauer, Moll, and Rubini (2008).
42 International investment, however, is disciplined in part by a vast web of reciprocal bilateral investment treaties, agreements, and WTO free trade agreements between pairs of economies and among groups, and long-standing codicils among OECD members. The WTO covers some trade- and services-related aspects of investment, but not FDI per se. Karl Savant of Columbia University says that although it is inferior to a global regime, this hodge-podge of agreements provides better international discipline than has ever existed. The United States and China do not have a bilateral investment treaty.
43 Of course, such a regime would be complicated by the tricky task of agreeing on what capital subsidies are (see Hufbauer, Moll, and Rubini 2008).
because of the difference between U.S. investments abroad and U.S. liabilities to foreigners. U.S. investments abroad pay high returns, while foreigners have accepted lower returns on U.S. assets because of their safety. This is especially true for the U.S. position with respect to China: the United States has lucrative FDI and other equity assets in China, while China mostly holds low-yield government debt in the United States. As the income flows in Figure 3.1 illustrate, China earns significant income from its U.S. Treasury holdings, but practically none for high-return FDI. As China’s outbound portfolio evolves, this asymmetry in NIIP performance will change.\(^4\) As China’s current account surplus from trade in goods moderates in the coming years, reducing a source of tension in U.S.–China relations, investment income flows will increase, inflating the current account surplus.\(^5\)

For the time being, both portfolio investment in U.S. government debt and China’s direct investments in the United States are increasing. But it is important to recognize that the two are not ready substitutes. The central government accountants in Beijing tasked with husbarding the mother lode of U.S. dollars that China has amassed are in no position to channel that foreign exchange into direct investments abroad. They can put those dollars into Chinese firms that know how to make such investments, but in doing so, they necessarily allow their currency, the renminbi, to find its proper, higher value, and that, in turn, is likely to reduce the U.S. deficits that must be financed.

**Figure 3.1: U.S. Investment Income Payments to China, 1999–2009**

Billions of U.S. dollars, balance of payments

\(^4\) This is only the case if the Chinese FDI assets perform well, and this is not a given.

\(^5\) For a careful discussion of the NIIP and its implications for future U.S. sustainability, see Mann (2009).
To summarize, although we can identify several areas that, in the context of growing Chinese FDI in the United States, are important to discuss, we find no convincing arguments that the past verdict on the beneficial nature of FDI should not apply to China. Rather than recapitulate the traditional literature on analyzing the aggregate costs and benefits of foreign investment, or even take an econometric approach to the China-specific concerns, we prefer to make a different argument.

It is pointless to assert that Chinese direct investment in the United States is either beneficial or detrimental in the aggregate in the future, because it depends on whether the United States is getting stronger or weaker. If higher taxes and austerity are required because the United States becomes unable to finance its debt as a result of anemic GDP growth, then Chinese mergers and acquisitions could be something of a fire sale instead of investments that contribute to U.S. economic success. Such distressed investments likely would seek to acquire portable assets such as patents and brands that can be taken home to growing economies to China, and less likely to create U.S. jobs.

On the other hand, if the United States can sustain its fiscal health and continue to outpace the rest of the industrialized world in GDP growth, then foreign firms will continue to invest here—as they have in the past—in a way that will enhance U.S. consumption, efficiency, innovation, and job creation. In brief, the beneficial effects of a substantial growth of Chinese FDI in the United States will, in some significant measure, depend on how Americans are able to manage their own economy.

Before we look at Chinese investment from the perspective of local communities, it is important to remember that the balance sheet needs to be assessed not only from the perspective of letting Chinese FDI into the United States, but also from the perspective of the consequences abroad of keeping it out. Representing one-quarter of the world’s GDP, the United States traditionally has had the luxury of being able to think in terms of whether to allow others access to our market. But with future global growth destined to come from new and emerging markets rather than the “developed world,” Americans must change their perspective and put a higher value on ensuring openness and access abroad. Were the United States to single out China for restrictive FDI treatment, it should expect the same treatment for U.S. firms in China. What is more, if the world’s two largest economies began to engage in exclusionary practices toward one another’s FDI, it likely would create a draft that would pull other countries into a dangerous economic storm system.
Local Effects: Employment, Supplier Networks, and Spillovers

One should never forget the joke about the economist who drowns in a river that was only one inch deep . . . on average! This is simply to say that measurement of aggregate effects can obscure the local implications. Many working Americans believe that globalization has put them at a disadvantage, especially when it comes to ties with China. Therefore, it is critical to look at the impact of FDI from China on local economies. In general, U.S. localities now embrace the benefits of inward FDI because of its beneficial impact on employment, tax bases, and competitiveness. This is why so many states, counties, and municipalities in the United States have set up investment promotion agencies to court foreign investors. In the following paragraphs, we review the evidence on the local impacts of Chinese FDI with a particular focus on whether Chinese investment is equally beneficial as investment from other countries.

First, inward FDI can affect local employment. Affiliates of foreign firms employed 6.3 million people in the United States, according to the most recent data from 2008 (about 40% of them in manufacturing), out of a total workforce of 143 million (i.e., 4.4% of U.S. employment). Another important characteristic is that foreign investors tend to pay higher wages on average: in 2008, foreign affiliate payrolls were $452 billion, and the implied annual average of $72,000 was significantly higher than the median U.S. compensation. Investment in new greenfield facilities generally is seen as more beneficial in terms of job creation than acquisitions. But takeovers also can generate or save jobs if the new investors revitalize ailing firms or if the postmerger integration leads to an expansion of local capacities. However, postacquisition restructuring also can reduce employment—for example, if a foreign investor buys a company only to transfer technology and other productive assets overseas, or if management is not competent enough to achieve a turnaround. The same effect can happen if the new owner cuts off local suppliers and replaces them with imports from abroad. Such outcomes are part of the adjustment process that increases aggregate efficiency in an economy, but they can mean painful losses in local communities.

Chinese firms remain marginal employers in the United States today. According to the BEA, Chinese firms employed around 2,500 people in the United States in 2008. The actual total today is markedly higher, as the official statistics miss some investments; Chinese investment has boomed in the past two years, and recent deals have added a significant number of employees to the payrolls. Chinese investments have a higher propensity to be greenfields, and our deal database suggests that most Chinese manufacturing investment is focused on

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46 This is average income extrapolated from 2008 BEA data on the operations of multinationals. Data on compensation in the United States can be found at: http://data.bls.gov/. A certain selection bias might also contribute to the significant gap between average compensation in the United States and the wages paid by subsidiaries of foreign multinationals; see Graham and Krugman (1995).
establishing long-term operations that will create jobs locally (see Box 2). The "insourcing" of production to better serve U.S. consumers and to benefit from local know-how and technology presents a significant opportunity for the United States to bring back jobs that have migrated abroad. Table 3.1 illustrates job creation as Japanese firms evolved from purely exporters to the United States to direct investors. From zero in the 1960s and 1970s, Japanese firms employed more than 300,000 Americans by the end of the 1980s, and by 1997, that figure had grown to more than 800,000, with a total payroll of $39 billion.

Downside examples of Chinese firms acquiring U.S. assets to extract technology and shut down local operations are few.\textsuperscript{47} This makes sense, as China’s weakness as an innovation center is a major factor pushing Chinese firms to the United States in the first place. Nor is there evidence that Chinese firms are aggressively changing the sourcing strategies or import propensity of acquired firms.\textsuperscript{48} The argument can be made that most U.S. firms targeted by foreign investors already are deeply integrated in global production networks, so if it made sense to source from China or any other place abroad, the company would have already done so before the takeover. We can find no evidence—so far—that Chinese firms are more likely to evince such predatory behavior than multinational corporations from other countries.

How about the quality of jobs that China creates in the United States? Though Chinese firms are not famous for their treatment of workers at home, it is highly unlikely that they would export low labor standards to the United States. After entering the United States, they not only must comply with local regulations, but also are under public scrutiny and wary of bad press about employee treatment. In 2008, Chinese firms reported a total payroll of $166 million, implying an average annual salary of $66,400—similar to the average compensation of workers of other foreign multinationals.\textsuperscript{49} And though Chinese firms are hugely challenged by the human resources function when entering advanced economies such as the United States (see Section IV), we are not aware of any case of systematic labor rights violations by Chinese firms in the United States.

\textsuperscript{47} One example of “asset-stripping” behavior that has been mentioned frequently in public debates is the 1995 acquisition of Indiana-based Magnequench; see “Hoosier Responsible? Clinton Decrees China’s Acquisition of Indiana Company—Ignoring Her Husband’s Role in the Sale,” ABC News, April 20 2008, http://abcnews.go.com/Politics/Vote2008/story?id=4757257&page=1.

\textsuperscript{48} Of course, this is attributable to limited data availability.

\textsuperscript{49} Data from BEA (2008); see note 55 for caveats.
Another upside FDI impact on local economies comes in the form of positive spillovers—the side effects of firms’ investment in research and development (R&D), training of local workers, and introduction of new management methods. In 2008, the R&D spending of foreign invested firms in the United States reached $45 billion. These and other innovation expenditures not only improve the products of the investing companies, but also increase the innovative potential of local workers and suppliers. Those local spillovers are here to stay, and cannot be transferred back home by a foreign firm. Japan’s investments in the U.S. auto sector during the 1980s and 1990s offer an excellent example: carmakers trained local workers, and their interactions with customers, suppliers, dealers, and researchers introduced new manufacturing concepts and organizational knowledge such as just-in-time inventory management and other practices. In addition, Japanese multinationals constantly increased their spending on technology development. Today, they spend around $5 billion each year for R&D in the United States (see Table 3.1).

Are Chinese firms less likely to have such positive effects on productivity, given their lower level of starting technology and more modest management skills? In 2008, Chinese firms spent just $8 million on R&D in the United States, a trivial share of the total. It might be too early to expect Chinese firms to bring technology or business know-how to the United States. Studies of business innovation in China generally conclude that manufacturers take low-tech approaches, reverse-engineer foreign innovation rather than making breakthroughs, and rely on foreign talent and inputs for a high share of advanced capabilities. However,
what is “generally” true in a nation of 1.4 billion people leaves plenty of room for exceptions. Our deal sample shows growing Chinese investment in U.S. high-tech industries. And keep in mind that when Japanese auto firms arrived in the United States—the Datsun era of the 1960s and 70s—they were dismissed as primitive, too, but by the 1980s, they were teaching American competitors hard lessons.

In sum, local communities have as much to gain or lose from Chinese FDI as they do from other nations’ FDI: so far, there is no evidence that the effects will be qualitatively different. Like Japan, the emergence of China as an investor offers opportunities for cities and regions to attract capital to their local economies, as well as associated jobs, taxes, and spillover effects.

Box 2: Chinese Manufacturing Investment in the United States

For the past three decades, U.S. multinationals have invested in manufacturing in China. Now, investment is flowing in the other direction as China’s manufacturers establish a U.S. presence. One of the first Chinese investments in a U.S. greenfield manufacturing facility dates to 1999, when the American affiliate of Qingdao-based appliance maker Haier invested $30 million in a refrigerator plant in Camden, South Carolina. Today, Haier America employs nearly 600 people in assembly, R&D, and administration. Haier’s presence in the United States helped shape its evolution from a domestic Chinese original equipment manufacturer to a global brand. Haier is now the world’s largest white goods producer, exporting its luxury refrigerators made in the United States to China and other markets.

Another example of a Chinese manufacturer using a U.S. investment to establish itself as a global brand is Lenovo’s (Legend Holdings) 2005 takeover of IBM’s personal computer division. In addition to an initial $1.75 billion acquisition, Lenovo invested $10 million in an R&D facility and a fulfillment center in Greensboro, North Carolina. Today, Haier and Lenovo are two of the very few Chinese household brand names in the United States, and other Chinese firms that started out as low-cost suppliers in labor-intensive manufacturing are following their example. For example, in 2009, U.S. furniture maker Schnadig was taken over by its former supplier Markor International Furniture, which now is using Schnadig’s brand, local logistics operations, and distribution network to sell its products directly in the United States and capture the associated higher margins.

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53 This conclusion only applies to the United States and other developed OECD economies; things might be fundamentally different if a developing country is on the recipient side.


Chinese automakers and parts producers are also eager to invest in the United States to serve American customers, acquire know-how and technology, and enhance their competitiveness at home in the booming Chinese auto market. Auto parts supplier Wanxiang started out as an auto parts importer with offices in Chicago in 1994. It gradually expanded its scope to include after-sales service, invested in several local joint ventures, and acquired smaller local manufacturing firms. Today, Wanxiang America is also active in solar, real estate, and financial services; it has annual revenues of $1.3 billion and claims to employ 4,500 people in the United States. In late 2010, Pacific Century Motors finalized the $450 million acquisition of Michigan-based Nexteer, General Motor’s former steering parts operation. Nexteer runs 22 manufacturing plants around the globe and employs 8,300 people worldwide.57

Similarly, Chinese machinery makers are coming to America to acquire know-how and technology and to provide after-sales services, a necessary step toward capturing more profits down the value chain. In two transactions in 2009 and 2010, Shanghai Electric acquired Bolingbrook, Illinois–based Goss International, a producer of web-offset printing presses and finishing systems for newspapers, magazines, catalogues, and other print media.58 Goss has development and manufacturing operations in the United States, Europe, Japan, and China, employing more than 4,000 people in nine nations. Sany, one of China’s largest makers of heavy machinery, currently is establishing local facilities to serve the U.S. market with locally made products. Its new $30 million factory in Peachtree, Georgia, is slated to open in 2011 with an initial staff of 200. The company plans to add another 400 people in R&D and manufacturing at a later stage.59

Several recent deals in other manufacturing sectors show that the United States is competitive in attracting Chinese manufacturers, with states offering a combination of low-cost land, local tax credits, and highly qualified workforces. In 2010, the city of Moberly, Missouri, announced that Chinese-owned Mamtek International, a producer of sugar substitutes and the owner of the Sweet-O brand, would build a $46 million plant that will create more than 600 jobs in 2011. Mamtek has been promised $17 million in state aid and $37 million in city bonds for the new plant.60 The world’s largest manufacturer of gravure printing cylinders, Yuncheng Plate Making, invested in a 30,000-square-foot facility in Spartanburg, South Carolina. Key factors for locating the new plant in the United States were the well-educated workforce, cheap land, and stable and affordable electricity.61

Several Chinese manufacturers also have decided to invest in the United States to clear hurdles imposed by U.S. trade policy. Examples of “tariff-jumping FDI” can be found in Chinese steelmakers’ investments in the United States. After the United States imposed hefty countervailing duties on Chinese steel pipes in 2010, the Tianjin Pipe Corporation announced a $1 billion outlay for a new plant near Corpus Christi, Texas. The 1.6 million-square-foot facility will open in 2012, creating 600 direct jobs with an estimated annual payroll of $18 million. Together with construction and other related activities, the total economic impact over the next decade is estimated to be more than $2.7 billion. The plant will serve the U.S. market but also ship to Latin America and West Africa. Another large steel producer, Anshan Steel, is co-investing $175 million in a steel rebar plant in Mississippi that will create 500 local jobs.

Clean energy firms and manufacturers of solar panels and wind turbines are investing in local manufacturing in order to qualify for stimulus projects that require local content. In October 2010, Suntech, one of China’s largest solar panel producers, opened its $30 million factory for the final assembly of solar panels in Goodyear, Arizona. It currently employs 75 people and is expected to double employment by the end of 2011. An important factor in the choice of Goodyear was Arizona’s 2009 renewable energy manufacturing tax credit, which makes the plant eligible for federal and state tax breaks.

National Security

Foreign ownership of domestic assets is a deeper form of global economic integration than simply importing and exporting, and it has deeper implications for national security. There are concerns about FDI and American security that must be taken seriously, which is why the United States has a stringent inward investment screening regime. On the other hand, deepening FDI integration can have positive impacts on national security as well.

In the liberal worldview, FDI fosters economic interdependence between countries and, by aligning economic interests, makes conflict less likely. Firms can stop trading with one another, and short-term portfolio investments can be withdrawn, but direct investments in factories and warehouses cannot be moved quickly. From this perspective, the likelihood of conflict between two countries is lower if there are high cross-border holdings of FDI. Exchange between firms and people in one another’s economies, instead of through trade relations, fosters

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63 “American Made... Chinese Owned.”
66 See Mansfield and Pollins (2003) for an overview of liberal and realist arguments on economic interdependence and conflict.
trust and understanding. Perceptions of Japan in the United States morphed from “yellow peril” to reliable long-term partner as Toyota, Sony, and many other companies invested in communities instead of just exporting to U.S. households. In this sense, Chinese investment in the United States has great potential to promote better bilateral relations. Consider the efforts of American multinationals with operations in China in lobbying Washington for moderate China policies, and imagine a future in which Chinese multinationals do the same in Beijing to protect the value of their U.S. operations.

The problem with this complex interdependence school of international relations is that nations sometimes come into conflict despite their mutual economic interest in not doing so. Information is not evenly shared, disruptive new trends and technologies destabilize assumptions about mutual interests, the benefits of the status quo are not evenly distributed, grandiose political aspirations override material betterment, or leaders simply make irrational choices. Reality places the burden on governments to identify and mitigate the national security risks potentially arising from FDI.

Assessments of potential national security threats from foreign investment tend to emphasize four concerns: control over strategic assets (ports, pipelines); control over the production of critical defense inputs (such as military semiconductors); the transfer of sensitive technology or know-how to a foreign power with hostile intent; and espionage, sabotage, or other disruptive action. These concerns are real and legitimate. Each has threatened the United States in the past, and each remains an issue today.

In his analytical framework for assessing such risks, Moran (2009) finds three legitimate threats from foreign ownership. The first threat is that an acquisition could give a foreign firm the opportunity to deny the provision of goods and services that are critical for the functioning of the U.S. economy, in particular the defense industrial base. This mostly applies to highly concentrated industries with a limited number of close substitutes and high switching costs. The second threat is that an acquisition could allow the transfer of technology or expertise to a foreign-controlled entity that might be deployed in a manner harmful to U.S. interests. The availability of the technology or expertise involved and whether the acquisition would make a difference are important factors to consider in assessing this risk. The third threat is that an acquisition could provide foreign governments with additional channels for infiltration, surveillance, and sabotage.

The United States has evolved an FDI screening regime over many decades, but China’s rise is rekindling the flames of old debates because it is perceived to be different. At least five factors contribute to this anxiety. **First**, no nation has been on track to surpass American GDP for a century; China likely will do so in one to two decades. This is a bilateral concern, and it

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67 Ibid.
68 See Graham and Marchick (2006) for an extensive discussion of national security risks from FDI.
69 This paragraph draws heavily from Graham and Marchick (2006), chapter 4.
means that Chinese norms will shape global economic norms. It is not just that China will be larger, but also that it is a one-party authoritarian state with values and commercial norms that are at odds with those of the United States. **Second**, unlike other significant sources of FDI for the United States, China is not an ally. Beijing is modernizing its military with the **stated goal of balancing American hegemony**. **Third**, there is a high degree of state ownership and intervention in the Chinese system. Concerns about state intervention and industrial policy surfaced in the Japanese context, leading to a higher level of scrutiny of transactions involving foreign government-controlled entities under the 1992 Byrd Amendment. These special concerns about government-driven, noncommercial motives were elaborated under the Foreign Investment and National Security Act (FINSA) regulations in 2007, and still are more applicable to today’s authoritarian China than to the democratic (if industrial-policy-oriented) Japan of the 1980s. **Fourth**, China has a troubled record on export control rules, and it is regarded as a major proliferator of sensitive technologies to rogue regimes (such as Iran and North Korea). **Finally**, China is considered a heightened threat for espionage by the Federal Bureau of Investigation and other U.S. agencies, not without reason.\(^{70}\)

As with the economic impact assessment, the national security verdict on Chinese FDI turns not on the question of whether our traditional views are right, but on whether China’s exceptional characteristics change the conclusion—there is no use pretending that China is not different in important ways. First, regarding the GDP size and value of China in the future, it is not a given that China will outsize the United States soon. The growth formula that has worked since 1980 is not applicable to the next 30 years, and it may not get China past another five. This is why China urgently has embarked on an effort to “rebalance,” but most Chinese economists foresee severe challenges to achieving that goal. And how soon, if ever, China passes the United States has as much to do with how well the United States performs as what Beijing does.

And Chinese values are changing dramatically, too—not necessarily in the direction of perfect harmony with American culture, but at least in a more liberal way. What if China does surpass the United States in GDP? Are Americans willing to pull the plug on the international economy unless the first rule of the game is that they must be the biggest? We do not adhere to the view that we should not do business with China if our doing so promotes their growth: we see no legitimate national security concern in growth per se, and we do see real concerns from economic stagnation in the world’s most populous nation.

Second, the more pointed concern is that not only is China uniquely large, it is not an ally (unlike Japan), and, in fact, it is an active geostrategic rival, not just an economic one. We have several reactions to this concern. While there is an aspect of rivalry in China’s ascent to regional,

\(^{70}\) See Graham and Marchick (2006, 111).
if not global, power status, there are aspects of mutual interest that go beyond what we have shared with other commercial rivals. Beijing already foresees an obligation to be mindful not just of local conditions, but also the global scene; like the United States, China is destined to play a worldwide role. Analysts in both China and the United States have dismissed the notion of a “G2” between Beijing and Washington, but the reality is that on almost every major policy issue today, the dependent variables are what the United States thinks, what China thinks, and whether they agree. U.S.–China concord is not a guarantee of global action, but U.S.–China discord assures a stalemate. In his 2010 book *Playing Our Game*, Edward S. Steinfeld points out that the institutions supporting China’s rise, like poles supporting bean vines in a garden, are American-style regimes. Though China is different, it shares more with its hegemonic rival than Nazi Germany, imperial Japan, or Communist Russia did.

Third, the degree of state intervention in China is exceptional. However, a funny thing happens when China’s state enterprises go abroad: they start behaving like nonstate enterprises. In Africa and Venezuela, for example, China’s oil majors get cheap oil but then sell it to other nations when they can get better prices than in China. In the United States, Canada, and Europe, they invest in the whole range of sectors regardless of strategic significance. It is difficult to identify examples of Chinese state firms making acquisitions that private firms would not have been interested in making. That said, the United States has discretion in its screening regime to take an especially fine-tooth comb to state-related firms, and it does and should do so to ensure that U.S. security is not affected.

Fourth, it is also true that China has a troubled record on weapons proliferation, including with regard to radiological weapons and regimes, such as Iran, North Korea, and Pakistan, known to be illicitly pursuing nuclear weapons capabilities. We are as concerned about the spread of such technologies as anyone. However, as with other objectives, we believe that this one can be met by stringent application of existing U.S. screening processes and does not argue for some general exception against Chinese investment in the United States.

Finally, the unclassified and classified records of Chinese espionage in the United States are voluminous. Foiling the use of direct investments as a staging ground for espionage and other “fifth column” activities is an ancient and urgent justification for direct investment screening. The United States currently places a high priority on such concerns in reviewing Chinese investment overtures, and it will continue to do so. Once again, however, we think it is important when talking about foreign direct investment to bear in mind that U.S. law enforcement
does not end with an approval to invest—it only begins there. Once past CFIUS, Chinese investors are subject to the full body of national, state, and local law and regulation governing illegal activity, including espionage. In many ways, it is much easier to monitor the behavior of a known Chinese investor that has been subjected to the screening process than it is detect the presence of Chinese espionage elsewhere. We are sympathetic to each of these “special” concerns about national security in the context of Chinese direct investment, but ultimately find no basis for abandoning the regime that has been developed to addressing them. As we note in the next chapter, the challenge is to protect that process rather than to replace it.

**Bottom Line**

After reviewing the ways in which FDI from China is capable of affecting the United States economically and in national security terms, and taking into consideration the patterns of increasing Chinese investment discussed in the previous section, we conclude that China’s impact on the United States will be highly beneficial economically, and that the downsides can be managed under existing U.S. investment doctrine and policy. The traditional policy of welcoming the economic benefits and competition from foreign direct investment remains sound in the case of China. Despite the special economic arguments raised as a result of China’s statist character, the pattern of its FDI in the United States to date is “normal,” and predatory or other anti-competitive behavior is better confronted with normal domestic law rather than foreign investment screening regimes that cannot adequately foresee future actions.

In terms of the nontraditional, special concerns about the economics in the case of China, we see less that is special about China than others when we look at our more comprehensive data. The exception is the concern that China could be large enough in the future to be a *price maker* instead of a *price taker*. If China’s sheer size, combined with its artificial pricing structures (e.g., the cost of capital arising from financial repression), threatens to “poison” global markets in the future when Chinese outflows make up a more influential share of world totals, then a subsidy-disciplining regime for global direct investment, akin to that for trade, probably will be necessary. We *suspect* that China’s statist preferences will break down prior to that point, but we cannot be sure. Analytically, there is no consensus on how one should define, measure, or observe an *unfair* influence of one nation’s domestic capital costs on world prices. This question is not unique to China: the worldwide impact of the second round of quantitative easing of U.S. dollar liquidity in 2010 (referred to as QE2) was hotly debated for exactly this reason, with China stridently criticizing the United States for domestic policies that affected others. There should be no objection from Beijing on principle, therefore, to a multilateral research initiative to develop a consensus on this topic. We recommend in our conclusion that such an initiative be launched now so that clear thinking will be available when and if it is needed.
In terms of national security, we also conclude that, on net, the U.S. interest is served by maintaining our fidelity to capitalism and openness to international trade and investment. There are threats to U.S. national security from the failure to screen inward investment, but these can be managed under existing U.S. doctrine and policy rather than requiring some separate discriminatory regime for China. We should continue to screen out all deals with specific negative national security implications. We should handle more general concerns about the behavior of firms from China under U.S. domestic law once they have sunk their dollars into the United States and have something to lose, rather than expecting the inward investment review process to carry that burden.
Despite occasional flare-ups of xenophobia, the United States for decades has remained open to inward investment, with a narrow and well-defined framework for identifying national security threats. China’s emergence as a significant investor is the latest test of U.S. openness. China’s nature has reopened old arguments about national interest and provoked new ones because of its unique characteristics.

Until recently, it was assumed that time would reduce our differences with China, but lately, there are significant doubts. From President Richard Nixon’s visit to Beijing, the narrative of U.S.–China relations for 20 years was one of joint opposition to Soviet hegemony. China spent the decade after the fall of the Berlin Wall reformed its markets, culminating in WTO accession. American China watchers were enthusiastic about the future, and the United States’ goal was—on balance—to deepen engagement. Right up to the Barack Obama administration, the logic of the relationship has been that time and contact would allay strategic differences. But misgivings about the direction of China’s evolution have emerged, and the tone of forecasting has, in truth, darkened.

This is the historical context of the American investment policies and politics that we examine in this section. Our approach is to look at the two “doormen” of U.S. FDI approvals separately—the policy process as distinct from the political forces that seek to influence that process case by case. We find U.S. policy to be generally well crafted, effective, and fair to foreign investors: the record shows that the United States is, by and large, open to Chinese investment, and most deals proceed unhindered. However, in a democracy, policy regimes cannot be separated entirely from political interference, well intended or otherwise. We find that in addition to interventions that are narrowly conceived to strengthen national security, the inward investment approval process is prone to two forms of problematic interference: from vested commercial interests and politicians who capitalize on sinophobia, and from security hawks who are bent on excluding Chinese firms without reference to specific threats. Interference in deals already is influencing the decisions of Chinese businesses, and it has fostered negative perceptions in China about U.S. investment openness.

**U.S. Inward Direct Investment Policy**

The United States has been host to FDI since its earliest days—it was, to a considerable extent, the product of foreign direct investment, as Dutch and British chartered corporations set up early North American colonies as commercial ventures. In its first hundred years, the United States
had a somewhat checkered record of fairness toward foreign investors, but during the twentieth century, as an ascendant power with competitive firms, the United States championed FDI openness at home and abroad. While there have been intense domestic debates about foreign investment, these have been settled in favor of openness.

At the end of World War II, the United States was the sole economic superpower. Populated by immigrants from around the globe and newly victorious in a global struggle, the United States had little to worry about from foreign investment and much to gain. Until the 1970s, the American investment presence around the world outgrew FDI at home, and the United States accounted for more than half of global FDI flows (see Figure 1.3). However, by the late 1970s, the momentum was shifting. Europe and Japan had recovered, and they were becoming more formidable competitors; the OPEC nations controlled oil prices and amassed U.S. dollars—while twice embargoing the United States.

The prospect of hostile nations “recycling” dollars earned through mercantilist ploys into U.S. investments rekindled old concerns about national security and inward investment and, in particular, whether “economic security” should be taken into consideration alongside traditional national security concerns in screening inward investments. The Jimmy Carter administration drew the opposite conclusion and endorsed foreign investment, with traditional national security the sole basis for exception. In 1983, President Ronald Reagan upgraded this stance from neutral to welcoming, and this has remained the centerpiece of investment policy. Investment promotion efforts largely were left to state and local authorities until 2007, when the George W. Bush administration created the “Invest in America” program under the U.S. Commerce Department’s International Trade Administration to better coordinate investment promotion efforts in the United States.

Internationally, the United States actively promoted investment liberalism. Since 1948, the United States has concluded 47 bilateral investment treaties and 154 double-taxation treaties with other countries to govern investment relations and related taxation issues (see Figure 4.1). On the multilateral level, there is no global regime for investment akin to the WTO for trade. However, other multilateral initiatives and agreements are relevant for cross-border investment, and the United States has played an important role in creating them. Since 1961, the United States has driven the OECD’s Code of Liberalization of Capital Movements, which commits member states to reciprocal capital flow openness and disciplines.

In the 1990s, the Bill Clinton administration supported efforts to multilateralize investment liberalism in a proposed OECD Multilateral Agreement on Investment, but the negotiations

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71 See Wilkins (2004).
72 See http://www.investamerica.gov/.
failed in 1998. Clinton oversaw the insertion of important investment provisions in agreements under the newly created WTO (1996), such as the most-favored-nation rule for subsidiaries providing services under the General Agreement on Trade in Services and the Agreement on Trade Related Investment Measures, which prohibits investment-related performance measures. Some regional free trade agreements initiated by the United States also include investment provisions, such as the North American Free Trade Agreement.

**Figure 4.1: Bilateral Investment and Double-Taxation Treaties Concluded by the United States, 1948–2010**

Cumulative number of treaties

There are three limitations on inward investment in the United States today: (1) there is a small set of off-limits industries; (2) natural security screening of acquisitions is applicable regardless of sector; and (3) foreign investors must demonstrate the same capacity to comply with ordinary domestic laws and regulations that any American firm must.74

First, foreign investment is explicitly restricted by national law in a few industries: certain types of power generation, civil aviation, broadcasting, coastal shipping, mining, and fishing.75 With these prohibitions, the United States ranks near the OECD average in terms of formal restrictiveness (see Figure 4.2).

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74 For a comprehensive overview, see Fagan (2010).
75 For a summary of U.S. reservations to FDI liberalization, see OECD (2010, 139).
Second, foreign investment may be rejected if it is judged to threaten national security, a feature common to most countries.\textsuperscript{76} CFIUS is responsible for such reviews (when other more specific laws do not apply, which they do in a few instances, such as banking) and reports national security objections to the president (see Box 3).\textsuperscript{77} Submitting an acquisition for national security review is voluntary, but CFIUS also can initiate an investigation and demand a dissolution on security grounds if a tie-up is not reviewed successfully. For a handful of specific materials (e.g., titanium) and intermediates, special regulations restrict FDI in order to ensure reliable supplies or suppliers, or to address other defense-related considerations.\textsuperscript{78}

Finally, foreign investors must comply with the same federal and local regulations that apply to domestic firms. These may include foreign trade controls, securities regulations, antitrust regulations, environmental compliance, industry-specific requirements, and state or local rules. Importantly, in terms of foreign financial institutions, this means appropriate sharing of sensitive prudential data on operations with foreign home-country regulators.

\textbf{Figure 4.2: Formal FDI Openness in Global Comparison, 2010}
OECD FDI Restrictiveness Index 2010, selected countries and country groups

\begin{figure}
\centering
\includegraphics[width=\textwidth]{figure4.2.png}
\caption{OECD FDI Restrictiveness Index 2010, selected countries and country groups.}
\end{figure}

Source: Organisation for Economic Co-operation and Development; for methodology and details, see Kalinova, Palerm, and Thomsen (2010).

\textsuperscript{76} For an international comparison of investment review practices, see OECD (2008d).
\textsuperscript{77} A seminal review of national security and FDI in the United States can be found in Graham and Marchick (2006).
\textsuperscript{78} See the section on foreign ownership and control in U.S. Department of Defense (2006).
Liberal U.S. policy on inward investment survived the recovery of European powerhouses in the 1960s, the hostility of OPEC in the 1970s, the Japanese “threat” of the 1980s, and the emergence of sovereign wealth funds and other state-owned investors from the Middle East and Asia in the 2000s. However, this was not uncontested, and today’s system reflects the struggles and tensions among and between policy makers and domestic special interest groups about the right balance between openness and national security interests.

Key developments in the domestic debate about the right approach to investment review since the mid-1980s include the Exon-Florio provision of the 1988 Omnibus Trade and Competitiveness Act, which gave the president broad authority to intercede in foreign investments judged to threaten U.S. national security. President Reagan delegated this authority to CFIUS, which had been marginally important until then. The post-9/11 political economy opened the door to a more restrictive attitude toward inward foreign investment.

Several high-profile deals fired up these debates, such as the takeover of Peninsular and Oriental Steam Navigation Company by Dubai Ports World in 2005–2006, and the failed acquisition of California-based Unocal by CNOOC in 2005. These transactions provoked negative public reaction, congressional pressure, and, ultimately, legislative action that compelled the firms involved to withdraw. In 2007, FINSA updated and elaborated the CFIUS process and, for the first time, provided it with a legislative mandate. FINSA extended CFIUS review to cover “critical” U.S. infrastructure, added the director of national intelligence and secretary of labor to the CFIUS committee as nonvoting members, and required that all deals involving critical infrastructure or foreign-government-controlled entities be reviewed unless explicitly exempted by the Treasury Department or a lead agency from among the CFIUS members (with a high-level official—deputy secretary or higher—taking responsibility for the exemption).

It is important to emphasize that unlike many other countries, including China, Canada, and Australia, throughout these debates and permutations, the United States has resisted making national economic security a direct concern of the review process. Attention to investments in critical economic infrastructure has grown in recent years, but this reflects our growing dependence on technology rather than a backdoor way of inserting economic imperatives into U.S. policy. In fact, the evidence showing that the United States is not focusing on national economic security is so obvious that it is sometimes overlooked: the world’s largest trade deficit, trillions of dollars in approved foreign investment, regular efforts to break up successful American firms for the sake of fairness to consumers—these are not the hallmarks of economic nationalism.

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79 See OECD and UNCTAD (2010).
80 In the case of CNOOC–Unocal, Congress adopted an amendment to an energy bill that would have greatly extended the review period and thus increased the cost for CNOOC (see Nanto et al. 2005); in the case of Dubai Ports World, the House Appropriations Committee in March 2006 passed an amendment to block the acquisition, after which the company decided to resell its acquired U.S. port assets (see “DP World Abandons Effort to Take Over Port Operations,” Bloomberg, March 9, 2006, http://www.bloomberg.com/apps/news?pid=newsarchive&sid=ak85x2NB5Ywo&refer=home).
The expansion of CFIUS under FINSA, coupled with the increased appetite for investment as a
result of the financial crisis, moderated the U.S. debate somewhat from 2007 to 2009, but the
right balance in investment review was back at the center of discussion in 2010 in response to
investments by Chinese steelmakers and Chinese overtures in communications technology. The
future of U.S. inward FDI policy is more uncertain than it has been in some time, and this is
driven principally by the emergence of China as investor.

Box 3: The Committee on Foreign Investment in the United States (CFIUS)
The Committee on Foreign Investment in the United States is an interagency executive
branch body that screens foreign acquisitions in the United States for national
security risks. CFIUS was created by Executive Order no. 11858 by President Gerald
Ford in 1975, but it did not play a significant role until 1988. In that year, the Exon-
Florio provision of the Omnibus Trade and Competitiveness Act gave the president the
authority to block foreign takeovers on national security grounds, and delegated the
responsibility for screening takeovers to CFIUS.\(^{81}\) In 2007, the Foreign Investment and
National Security Act gave CFIUS a legislative mandate (previously, it had operated
solely under executive order), expanded its membership, specified required actions,
and strengthened congressional oversight.\(^ {82}\)

The scope of CFIUS reviews is explicitly limited to national security risks; therefore, the
review process does not include national economic security, protecting U.S. economic
strength as a general contribution to national power, or other considerations. Key areas
for assessing the national security implications of an investment are the impact on the
U.S. industrial base for defense, relevant technology, and resources; critical infrastruc-
ture such as communications, energy, and transportation; and the impact on homeland
security.\(^ {83}\) CFIUS allows a certain amount of discretion in defining national security in
the review process, depending on individual cases and current developments. There
is no definition of national security in the legislation, and some note that the addition
of critical national economic infrastructure systems as an area of special scrutiny is a
worrisome move toward protecting economic interests.

FINSA specifies nine members of CFIUS: the secretary of the treasury (chairman),
the attorney general, and the secretaries of homeland security, commerce, defense,
state, and energy. FINSA authorizes the president to specify additional members. The
executive order implementing FINSA designated the U.S. trade representative and the

\(^{82}\) See http://www.treasury.gov/resource-center/international/foreign-investment/Documents/CFIUS-Final-Regulations-new.pdf; for a summary of most impor-
tant changes, see U.S. Department of Treasury (2008).
\(^{83}\) FINSA explicitly expanded the understanding of national security from traditional areas to homeland security issues.
director of the Office of Science and Technology Policy as additional members, as well as certain White House officials as observers. FINSA also added the director of national intelligence and the secretary of labor as ex officio (nonvoting) members to provide national security assessment and other inputs as needed.84

CFIUS can initiate a review of any acquisition that leads to foreign ownership or control “of any person engaged in interstate commerce in the United States.” While, in practice, CFIUS mostly covers direct investment transactions, reviews theoretically are not limited to stakes above the 10% FDI threshold. However, CFIUS does not review investments in new greenfield operations. Any CFIUS member can recommend a self-initiated review, subject to the committee’s concurrence. However, the standard practice is for parties to a foreign investment to voluntarily apply for a review.

Once an application is filed, the Treasury Department starts an initial 30-day review and assigns a lead agency to coordinate. After this, CFIUS either approves the transaction, initiates a second 45-day review, or recommends that the parties withdraw their application (with little or no explanation). CFIUS works by consensus, and any agency can request a 45-day investigation if concerns cannot be resolved within the first 30 days. After the second review period, CFIUS either clears the deal, approves it with conditions (a mitigation agreement), or (rarely) sends it to the president for a decision. The president has another 15 days to make a decision, which brings the total maximum review period of the CFIUS process to 90 days from the date of formal application.

Once a transaction is cleared, in principle, it is not subject to future investigation as a national security risk, although a breach of a mitigation agreement or revelation of faulty information is grounds for reopening. However, in the Alcatel–Lucent case of 2006, the prospect of reopening the review because of unsatisfactory adherence to a mitigation agreement was introduced. FINSA also strengthens congressional oversight, with CFIUS now required to notify key congressional officials upon the completion of each review, outlining the decision and its basis. It is also required to submit an annual report to Congress with information on reviewed cases and key metrics.85

Beyond the Letter of the Law: Politics and Interference in the Process
The U.S. economy is governed by the rule of law: the state generally does not compete in the marketplace, and the policy-making process is contestable. Though informal, discretionary barriers beyond the nominal investment regime historically have not been a significant U.S. characteristic, interference in deal approvals not intended under our laws can and does enter

85 The public versions of these reports can be found at http://www.treasury.gov/resource-center/international/foreign-investment/Pages/cfius-reports.aspx.
the picture—in fact, with increasing frequency in recent years. When it comes to China, we see two such sets of interventions that merit concern.

First, commercial vested interests in the United States may seek to avoid competition from Chinese firms by prodding politicians to impede inward investments. Special interests have a history of invoking national security regimes to protect themselves from competition under the guise of protecting the nation from a foreign threat. Congressmen are not directly involved in the CFIUS process and do not have the authority to initiate CFIUS reviews, but they do have oversight authority, the power to hold hearings and issue subpoenas, the ability to pass resolutions and amendments, and, in the extreme, the power to change underlying legislation (e.g., FINSA). The executive branch, therefore, is not insensitive to congressional calls for CFIUS action. Executive branch officials toggle back and forth between private sector careers, of course, and any CFIUS executive branch member agency, or the president, can trigger a review, defining “national security” according to their particular departmental perspective.

An investigation potentially could create bad publicity; therefore, the discretionary ability of agencies to initiate review may be a concern to a potential investor. Under FINSA, investors are explicitly encouraged to “consult and engage” with CFIUS before filing a review application, even submitting draft filings to the members. Such “pre-screening” previously was common, but was not openly encouraged in regulatory guidance. In theory, this part of the process should help clarify needed information to make a determination; in practice, some potential investors may be scared off by investigators before even trying to invest in America. Similarly, the impulse of Congress to pursue intrusive hearings that might disrupt a deal may be earnestly motivated by a belief that national security is not being served—but it might just as well reflect the protectionist goals of a constituent or simple grandstanding to attract media attention.

CFIUS outcomes are almost never swayed by public political pressure once an investigation begins. But the threat of politicization can cause parties to abandon an investment before it is even proposed, and deals are killed not so much by CFIUS as by fear of it. Moreover, a firm’s reputation can be dragged through the mud by politicians regardless of CFIUS. Allegations may or may not have merit, but the court of public opinion provides little due process for finding out.

A second concern about the extralegal vulnerability of the foreign investment review process concerns security hawks within government and the role that classified assessments play in the screening process. Those parts of the U.S. government that are responsible for national security typically argue for a less permissive inward investment regime in general, and a more restrictive stance toward China in particular. Those views did not prevail in the shaping of FINSA, the
most recent retooling of the U.S. review process, which has remained more liberal than many in the U.S. security community counseled. However, classified intelligence information plays an increasingly critical role in the CFIUS process, for several reasons. First, complicated technologies are embedded ever more deeply in the commercial infrastructure around us, creating more vulnerability and thus a greater role for technical analysis of that risk (rather than, say, market concentration assessment by competition policy authorities). These analytical capabilities are in the civilian and defense intelligence collection agencies. Second, as the number of prospective China-related deals grows relative to other investments in the United States, the weight of classified appraisal grows because China is a strategic rival rather than an ally, and it is particularly nontransparent in terms of corporate governance and relationships to government, thus lifting the importance of classified evidence.

Neither the public nor the firms proposing to invest have access to classified assessments. The agencies assembling those assessments have a demonstrated preference for more restrictive treatment of Chinese firms. In other words, there is both motive and opportunity to inject a negative bias, and it is impossible for us to judge the extent of such bias. Anecdotes of unjustifiably negative arguments abound among the tight-knit group of former officials who have participated in the CFIUS process. But these stories cannot be authenticated and referenced. We find the open-source literature on the security risks associated with Chinese firms to be full of overgeneralizations, mischaracterizations, and weak evidence—oftentimes consisting in large part of newspaper citations of work by journalists that do not carry sufficient evidentiary weight. Should American policymakers’ views on China’s motives really be founded on the conjectures of the Wall Street Journal’s staff in Beijing?

**Chinese Investors and the U.S. Investment Environment**

The experience of Chinese investors in America, like the larger U.S.—China relationship, is complicated. On the one hand, the numbers speak for themselves: we record more than 200 Chinese investments in the United States in 2003–2010; the investment value is growing exponentially; and investments are going to a wide range of industries, including high-tech sectors, infrastructure, and natural resources. Half of the deals are greenfield investments, which do not require any national security screening through CFIUS, and the number of acquisitions reviewed by CFIUS is very low, given the high degree of state ownership among Chinese firms and other characteristics that might justify a national security review under the current CFIUS mandate (see Figure 4.3). And there is no indication that Chinese firms formally were discriminated against when their investments were subject to a CFIUS screening.

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88 Our favorite is the danger that if CNOOC had been permitted to purchase Unocal, it could have put telescopes on offshore Gulf oil platforms with which to monitor U.S. naval movements.

89 See, e.g., the preponderance of newspaper references on which USCC (2011) is based.

90 They are, of course, still subject to other U.S. laws concerning national security and the national interest.
While all of this suggests a healthy evolution, Chinese firms have encountered problems investing in the United States under the current policy framework. Numerous Chinese firms have seen their pioneering U.S. bids politicized in the larger debate over the right approach to national security. The modest number of completed CFIUS reviews obscures the large number of deals that never were proposed for fear of CFIUS, congressional outcry, media or general public hysteria, or some combination of these concerns. The list of controversial Chinese investments in the United States is long (see Table 3.1). While relatively few deals have been blocked by a negative CFIUS finding or a recommendation not to apply (such as Huawei’s failed bids for 3Com), almost all major deals were subject to politicization by the media, members of Congress, the security community, domestic industry incumbents, and groups generally critical of China.

Particularly worrisome is that such security anxieties and the politicization of the CFIUS process are unpredictable. In 2005, a coalition of congressmen, business interests, and media forced Chinese oil company CNOOC to drop an acquisition bid for Unocal. In 2010, CNOOC was back with a successful $1 billion investment in Texas shale gas extraction with little or no public comment. In 2009, investment plans by Chinese wind power manufacturer A-Power came under attack from unions and policy makers, but a $1.5 billion stake by China’s sovereign wealth fund in power utility AES went through with barely a peep, even though it theoretically raised more flags. The joint 2007 acquisition of 3Com by China’s Huawei ran into insurmountable difficulties aggravated by alleged connections to China’s People’s Liberation Army, while IBM’s sale of its personal computer division to Lenovo two years earlier was approved by CFIUS. In 2010, Chinese steelmaker Anshan Iron & Steel Group Corporation faced opposition by a coalition of congressmen and domestic steel lobby groups to its proposed investment in a new steel mill in Mississippi, while Tianjin Steel generally has been praised for making a big investment in Texas. This unpredictable politicization of national security considerations has become a real problem for Chinese firms in the U.S. market. A Chinese bidder for U.S. assets today must be excused for not knowing whether he will come under fire, which puts him in a disadvantaged position with respect to other potential acquirers in a competitive mergers and acquisitions market.

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91 The Congressional Research Service reports that half of the transactions investigated by CFIUS are withdrawn before a report is issued, and hence are not counted in the number of CFIUS cases (see Jackson 2010, 18).
92 See Pinto and Frye (2010) for an academic assessment of the politics of Chinese investment in the United States and a description of key interest groups and their concerns.
93 See CRS (Nanto et al., 18).
95 Some executives we interviewed emphasized that they would rather sell a firm for a lower price to a domestic bidder than enter into an agreement with a Chinese buyer, as the latter still would have to defend its investment in public and a CFIUS review. In 2010, Chinese communications equipment maker Huawei said that it had lost two bids for U.S. assets because of such concerns; see “Huawei Said to Lose Out on U.S. Assets Despite Higher Offers,” Bloomberg, August 3, 2010, http://www.bloomberg.com/news/2010-08-02/huawei-said-to-be-stymied-in-purchase-of-u-s-assets-on-security-concerns.html.
Beyond these entry barriers, Chinese firms face the usual hurdles that newcomers confront when operating in sophisticated economies. Formal regulatory barriers are few, and though the United States and China do not have a bilateral investment treaty, Chinese firms do not have great difficulties with regard to international legal protection and tax optimization, as they often use Hong Kong and other third countries that do have U.S. bilateral investment and tax treaties to invest in the United States. However, Chinese firms are challenged by the U.S. regulatory and business culture *in general*. Until recently, trade was the only form of Chinese global engagement, so the Chinese have little experience operating overseas. There is a large regulatory gap between the home market in China and mature OECD economies such as the United States. Running American operations requires Chinese managers to bridge cultural divides, acquire the necessary market knowledge, comply with sophisticated regulatory standards, manage local staff, negotiate with organized labor and other stakeholders not present in China, meet higher quality and safety standards, adhere to different tax and accounting rules, and develop suitable communications and public relations strategies.
Table 4.1: Controversial Chinese Investments in the United States, 1990–2011

<table>
<thead>
<tr>
<th>Year</th>
<th>Investor</th>
<th>Target</th>
<th>Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>1990</td>
<td>China National Aero Tech (CATIC)</td>
<td>Mamco Manufacturing Co.</td>
<td>The transaction was formally blocked by Presidential order after CFIUS found that an acquisition of Mamco's assets by CATIC would pose significant national security risks for the United States.</td>
</tr>
<tr>
<td>1995</td>
<td>China National Non-Ferrous Metals Import &amp; Export Corp (CNIEC), San Huan, Sextant</td>
<td>Magnequench Inc.</td>
<td>The initial takeover of Magnequench by a Chinese-led consortium and the following acquisition of Ugimag Inc. in 2000 received regulatory approval from the Clinton administration. However, the deal drew widespread criticism in the U.S. public for the leakage of technology and jobs to China when the firm's facilities in the United States were shut down in 2002 and 2006 respectively.</td>
</tr>
<tr>
<td>1999</td>
<td>China Ocean Shipping (Group) Company (COSCO)</td>
<td>Long-term lease of former Naval Base, Long Beach, CA*</td>
<td>Congress banned COSCO from leasing a formal Naval base in Long Beach through a provision in the 1998-1999 defense authorization bill. Legislators cited national security concerns as reason for blocking the deal through ad-hoc legislative action.</td>
</tr>
<tr>
<td>2005</td>
<td>Haier Group</td>
<td>Maytag Corp.</td>
<td>Chinese white goods maker Haier provoked intense criticism when it announced its intentions to acquire Maytag. Haier was portrayed as foreign predator keen to snatch an iconic US brand. Haier withdrew its bid for commercial reasons.</td>
</tr>
<tr>
<td>2005</td>
<td>China National Offshore Oil Corporation (CNOOC)</td>
<td>Unocal Corp.</td>
<td>CNOOC was forced to withdraw its bid for Unocal after it met significant resistance from domestic interest groups and members of Congress. Congress threatened to enact an amendment that would have imposed significant additional costs and risks on the buyer. Unocal was acquired by its U.S. competitor Chevron.</td>
</tr>
<tr>
<td>2005</td>
<td>Lenovo</td>
<td>IBM's personal computer division</td>
<td>Domestic interest groups, the security community and members of Congress voiced concerns after Lenovo's plans to purchase IBM's personal computer unit became public. The deal was cleared by CFIUS after the company signed extensive security agreements.</td>
</tr>
<tr>
<td>2009</td>
<td>China Minsheng Bank</td>
<td>United Commercial Bank (UCB)</td>
<td>China Minsheng's bid to take over troubled UCB was blocked by US banking regulators. The Federal Reserve said that the necessary investigation would have taken too much time but the bank's situation required quick action. UCB's assets were seized by the Federal Deposit Insurance Corporation (FDIC).</td>
</tr>
<tr>
<td>2009</td>
<td>Huawei, Bain Capital</td>
<td>3Com</td>
<td>A joint bid by Huawei and private equity firm Bain Capital for network gear maker 3Com was derailed by CFIUS concerns over national security risks. Huawei and Bain withdrew their offer after CFIUS signaled that a formal investigation would end up in a negative recommendation.</td>
</tr>
<tr>
<td>2009</td>
<td>Tengzhong</td>
<td>GM's Hummer brand and assets</td>
<td>Tengzhong's acquisition of GM's Hummer assets was portrayed as a threat to the American manufacturing base and national security by Members of Congress and commentators in media. The deal failed because of regulatory intervention from the Chinese side.</td>
</tr>
<tr>
<td>2009</td>
<td>Northwest Nonferrous International Investment Co.</td>
<td>Firstgold Corp.</td>
<td>China's Northwest Nonferrous International Investment pulled back its plans to acquire gold mining company Firstgold after CFIUS signaled national security concerns in an initial investigation. The proximity of Firstgold's properties to Fallon Naval Air Station was cited as major concern.</td>
</tr>
<tr>
<td>2010</td>
<td>Tangshan Caofeidian Investment Co Ltd (TOIC)</td>
<td>Emcore</td>
<td>Tangshan had to withdraw its bid for Emcore, a provider of solar photovoltaic and fibre optics technology, as CFIUS voiced national security concerns after an initial review of the transaction.</td>
</tr>
<tr>
<td>2010</td>
<td>Anshan Steel</td>
<td>Co-investment in a greenfield slab steel project in Mississippi</td>
<td>As a greenfield joint venture, Anshans investment was legally not subject to a CFIUS review. However, the deal came under intense fire by the Congressional Steel Caucus and domestic steel lobby groups. Anshan stuck to its investment plans despite the intense politicization.</td>
</tr>
<tr>
<td>2011</td>
<td>Huawei</td>
<td>3Leaf</td>
<td>CFIUS asked Huawei to retroactively submit its purchase of assets from bankrupt California startup 3Leaf for an investigation. After CFIUS said it would recommend the President to block the transaction, Huawei agreed to divest its 3Leaf patents and assets.</td>
</tr>
</tbody>
</table>

Source: Authors' compilation.

*We included this project although a lease would technically not be counted as direct investment.
Take labor relations as an example. The multicultural workforce of the United States is a culture shock for Chinese executives coming from overwhelmingly Han-ethnic China, where discrimination based on employees’ region of origin, gender, sexual preference, medical conditions, physical disabilities, and even height is common. Adding to these problems, many Chinese firms are still reluctant to hire consultancies and other value-added service firms to help set up and run operations abroad. Recently, many states, counties, and cities in the United States set up investment promotion programs to help Chinese investors overcome these difficulties, but these problems will take time and special efforts by Chinese executives and regulators to resolve.96

**Bottom Line**

The policy regime that screens inward direct investment in the United States is well designed, and it reflects a tradition of openness to both the economic benefits and enhanced competition from foreign firms that it entails. The process, which centers on CFIUS and the prevailing culture at the Treasury Department, is diligent in addressing national security concerns only, but not ill-defined notions of economic security that many have encouraged, even as it expands coverage to address the risks emerging from new vulnerabilities in modern economic infrastructure such as the Internet.

The other gatekeeper to approval for investing in America, however, is national politics more broadly, especially the Congress. Politicians’ power to threaten to impose unacceptably high costs on potential investments gives them an ability to almost veto specific deals for reasons not limited to true national security. Such politicization, in an era of general anxiety about China’s rise, presents a very serious threat to the functioning of the direct investment screening process. Chinese investors, though attracted by the United States’ wealthy consumer base, skilled labor, sound regulatory environment, and impressive technology and know-how, are confused and cynical about the relationship between policy and politics. The bulk of Chinese investments go through without a problem today; most obviously do not require a review for national security, or they are greenfields, and those that do require review almost always get a fair hearing. But the signals from Washington are mixed, and do not come just from CFIUS. Within the national security community, voices are advocating for a more onerous screening. The politicization in a handful of prominent cases has left the impression that Chinese investment is not welcome in the United States (see Box 4). The consequences of the mixed signals between our two American doormen are not so acute now, but they certainly will be in the future.

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96 According to the Council of American States in China, 28 states currently have offices in China to promote trade and investment relations (see http://www.casic.us). Many regions and cities have also set up special programs to attract Chinese investment, such as the California Bay Area, Gwinnett County in the Atlanta metropolitan area, and San Francisco; in addition, there are private initiatives to support Chinese firms in doing business in the United States, such as the New York China Center.
Box 4: The U.S. Investment Environment: The View from China

As in the United States, public perception in China is shaped by news headlines about large-scale deals. With regard to the U.S. investment environment, the iconic case that shaped public opinion certainly was the failed CNOOC–Unocal acquisition in 2005. Reactions to this deal in the United States were seen as unfair and outright protectionist. Another deal that received considerable media coverage was the investment by Chinese steelmaker Anshan in a greenfield slab steel project in Mississippi, announced in 2010. The mostly groundless allegations by steel lobbyists and the Congressional Steel Caucus drew strong reactions in the Chinese media, and commentators interpreted it as a sign of rising “ugly trade and investment protectionism” in the United States.

The Chinese business community has a much more nuanced view of the U.S. investment environment. Recent surveys show that privately owned firms and small and medium-sized businesses still perceive the United States as one of the most open and attractive countries for their investment. The verdict of private-sector executives, of course, is very different if their companies operate in sensitive industries such as mining and materials, communication infrastructure, and other high-technology sectors. Sovereign investment vehicles and state-owned enterprises have a very negative view of the U.S. investment environment. The special scrutiny of government-controlled entities under the Byrd Amendment and the 2007 Foreign Investment and National Security Act is perceived as systematic discrimination against Chinese firms.

Concerns about fairness toward state-owned enterprises and the transparency of the CFIUS process are at the heart of concerns in Chinese policy-making circles with regard to the U.S. investment environment. In 2008, China’s securities regulator and Ministry of Commerce complained in letters to the U.S. Treasury Department that U.S. investment review regulations left too much room for interpretation through CFIUS, and that special treatment of state-owned enterprises was discriminatory toward Chinese firms. In 2008, Chinese officials rejected the arguments of U.S. banking regulators to block an acquisition of the bankrupt United Commercial Bank by its Chinese minority shareholder, Minsheng Bank, as not very convincing.

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99 This assessment is based on the authors’ interviews with numerous executives in China between June 2008 and December 2010, and separate expert interviews conducted by the Monitor Group between August 2010 and January 2011.
100 See CCPIT (2010, 44–48).
Recent reactions from China indicate that investment openness has gained importance on China’s political agenda. After the politicization of Anshan’s steel investment, China’s Ministry of Commerce and Ministry of Foreign Affairs urged the United States to be fair toward Chinese companies and to keep its markets open to Chinese investment. After CFIUS in February 2011 ordered Huawei to divest the patents it had acquired from 3Leaf, China’s Ministry of Commerce accused the United States of using “national security and other excuses to obstruct and interfere in the trade and investment activities of Chinese businesses in the U.S.” In the run-up to President Hu Jintao’s 2011 visit to Washington, high-level officials urged the United States to open its markets to Chinese investment and to improve transparency in national security reviews. In March 2011, Chinese Prime Minister Wen Jiabao personally called on the U.S. government to foster Chinese investment in the U.S. economy and to “further ease its restrictions on market access.”

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V. Conclusions & Recommendations: An American Open Door?

Conclusions
China's FDI boom is just beginning: through 2020, we foresee $1 trillion to $2 trillion of Chinese FDI flowing globally. The United States has not been a major recipient of these flows to date—but the numbers show that we are at an inflection. The United States could be a leading beneficiary of Chinese direct investment in the years ahead if we do not turn these investors away.

The United States enjoys roughly 15% of global FDI today. If just 5% of China’s expected outflows target the United States over the coming decade, the numbers will be enormous. Exact prediction is impossible—there are too many factors that could shift the results, up or down. But the example of Japan is instructive: Japan’s first investments in the United States during the 1980s were almost as controversial as China’s, but in the following years, Japanese U.S. affiliates put hundreds of billions of dollars into America, and today employ nearly 700,000 Americans. Annually, these firms export $60 billion from America to the world, spend $4.6 billion on R&D, and pay more than $50 billion in compensation to U.S. workers.108 Now at the beginning of such a transformation, Chinese firms already have invested more than $11 billion in the United States and employ thousands of Americans—and the numbers are growing more than 100% per year.

While the benefits are large, there are national security concerns that cannot be ignored, today or tomorrow. Beijing officials sometimes argue that the United States is motivated by protectionism, prejudice, or competitive worries, and that FDI screening is unjustified. This is not helpful, nor is it accurate. What is more, by mislaying blame, such comments sour public opinion in China and exacerbate mutual mistrust. National security review is recognized as a legitimate process worldwide, and given China’s poor corporate governance and secretive politics, it is reasonable for Washington to screen Chinese investment with diligence. China has global strategic ambitions and defines the United States as an impediment to those ambitions. Chinese firms—government owned and otherwise—often are compelled to conform to state edicts to a much greater extent than corporations from other major U.S. direct investor nations. There is sufficient reason to be mindful of orchestrated Chinese efforts to obtain

108 All data points derive from the BEA’s latest survey (2008) on the operation of affiliates of foreign multinationals in the United States.
technology and to infiltrate foreign infrastructure abroad in a manner that could be harmful to U.S. national security interests.\footnote{While it is generally very difficult to attribute cyber attacks to specific groups or even governments, there is enough compelling open-source evidence of concerted Chinese infiltration of governmental, utility, and corporate information infrastructure assets abroad to warrant caution. See, e.g., USCC (2009); U.S. Department of Defense (2010); and Wortzel (2010).}

At the same time, the current policy process works well to screen out security risks, and most Chinese investments in the United States happen without drama. Popular Chinese fears that the United States is closed to their investment are simply wrong, as the evidence on growing Chinese FDI inflows makes clear. Those bids that have been impeded concerned specific threats, mostly falling under the category of preventing critical access to strategically important goods or services, new defense-related technologies, or fifth-column homeland security risks. As for concerns that CFIUS is not restrictive enough, we are aware of no damage to U.S. national security that can be attributed to a faulty investment approval process, and we see no evidence that the existing process cannot handle greater flows of Chinese FDI into the United States.

The current screening process is not perfect. Key definitions in U.S. regulations are ambiguous, such as those defining what constitutes a “critical industry” and “foreign-government control.” Determining whether a transaction is benign or threatening is an art, not a science, and the subjective discretion left open by these definitions is intentional, so as to give screeners sufficient leeway to adapt as technology and industries evolve. If every aspect of the system were defined in advance—for instance, a list of open and closed industries—it would necessarily be more restrictive. Understandable as such discretion may be, there have been outcomes that seem hard to justify in terms of specific national security concerns. Our general conclusion that CFIUS is admirably focused on the discreet national security concerns it is tasked with by law can only be maintained as long as it remains clear that no matter what its members discuss internally, its determinations are subject to due process and appropriate oversight. If faith that the Committee is not being used as a tool for protectionism slips, then the interests of the United States will be seriously damaged. In light of foreign and domestic misgivings, whether reasonable or not, the Committee will likely need to offer even better assurance in the future that it is keeping to its mandate.

The greater concern is not U.S. policy, but U.S. politics, which is prone to capriciousness and ends up diverting the benefits of Chinese direct investment to workers and communities in other nations if not corrected. Political interference in the FDI screening process, whether to protect special interests here from economic competition or to pursue a “fortress America” vision of national security, will have a toxic effect on even the most well-thought-out policy regimes. As shown in Section IV, it already has, as Chinese investments have been subject to serious politicization, an outgrowth of unfamiliarity, suspiciousness, lobbying efforts by vested interests, and the complexity of the overall U.S.–China relationship.
One cannot eliminate political interference in a participatory democracy, but the consequences must be recognized and moderated. We must always keep the pressure on CFIUS to catch threats to America. But while CFIUS reviews are predictable, random eruptions of protectionism masquerading as national security concerns are not. Even the modest level of Chinese direct investment to date has stoked political fires, though America’s door to China so far has remained open. Keeping it open in the future will take work, but it can be done. An open door is no guarantee that people will walk in, though. Doors are open to China all around the world—a world in which America is no longer the only place to set up shop. Here, we offer recommendations to promote each of these concluding imperatives: maintaining the best security screening process, keeping America’s door open to the benefits of China going global, and more actively attracting the right investments from China so the benefits for Americans are assured.

**Recommendations**

Our analysis indicates that most Chinese direct investment in the United States is profit motivated and benign, that inflows will increase if permitted with important local benefits, and that our policy for screening inflows for real security threats is sound. Therefore, our recommendations emphasize preserving and protecting the existing screening regime, addressing regulatory weaknesses, limiting the potential for abuse and misunderstandings, and beefing up investment promotion regimes.

1. **Send a clear and bipartisan message that Chinese investment is welcome.**

   A succession of U.S. presidents have publicly supported investment flows from China. In joint statements during President Hu’s state visit to the United States in January 2011, the two leaders “acknowledged the importance of fostering open, fair, and transparent investment environments to their domestic economies and to the global economy.” But because of the many past controversies, there is a growing perception in China that the United States is not open to Chinese investors. That is wrong, but in truth, the signals coming from Washington are mixed.

   The president makes high-minded statements about openness, but senior officials often express misgivings about doing business with Chinese firms. Critically, attitudes among congressional leaders range from skeptical to hostile, often leading to proposals to exclude Chinese interests. Business leaders endorse job-creating Chinese investment in the United States, but only when reciprocal concessions from China are available. Talk of a bilateral investment treaty began under the George W. Bush administration, but the effort now is in limbo while the United States revises its existing model bilateral investment treaty. Meanwhile, Chinese officials have suggested a “catalogue of guidance” delineating U.S. industries that are open and closed, and some U.S. analysts even endorse the wholesale cordoning off of industrial sectors such as telecommunications—but the United States does not operate that way (unlike China). In light

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of these mixed signals, Americans must ask whether they can blame the Chinese for being confused by U.S. investment climate intentions. Sowing such confusion is not in the U.S. interest.

To resolve this murkiness, we recommend that the president fashion a bipartisan congressional–executive statement supporting increased U.S. investment from China. This statement should support the CFIUS process and pledge to protect it from political grandstanding. Concrete measures to encourage inward investment should follow. Officials in practically every state will favor of such a message: most already are courting Chinese investors actively. Such an initiative will help change perceptions in China about the climate in the United States and greatly strengthen the hands of those working to promote Chinese investment in America.

2. Systematize the promotion of FDI from China and elsewhere.

We recommend a thorough review of efforts to attract foreign investment to the United States. The current laissez-faire approach dates to an era when the United States dominated global FDI flows; it is built on the assumption that the U.S. economy is unrivaled in its attractiveness to foreign investors, and it presumes that foreign investors come from countries with similar legal and commercial systems and do not need much on-the-ground assistance. This situation has changed, and American policy makers and local business leaders know far too little about what is important to Chinese firms in choosing an overseas investment destination.

To ensure that significant Chinese inflows of capital are not diverted to the economies of our competitors, we recommend that Chinese prospects for inward investment be assessed in the context of national competitiveness, and the most desirable from those should then be actively courted. Currently, the burden of attracting foreign investment falls on states and municipalities. Compared to other countries, federal efforts in the United States are negligible. America’s states and cities compete head to head with nations that have more financial firepower and high-level support for the removal of national investment impediments. Mundane bureaucratic hurdles are major obstacles for Chinese investors; during our interviews with Chinese executives, many related how difficult it is to obtain U.S. visas and then to battle bureaucratic procedures. The establishment of the Invest in America program in 2007 was a positive step, but its parent agency is minimally staffed and underfinanced compared to similar institutions in peer competitor nations. These efforts will not eliminate the challenges that Chinese firms face in operating in mature markets such as the United States, but experience shows that programs targeting Chinese investors can help pave the way for more investment to follow.

Many observers believe the best way to promote inflows is by improving formal mechanisms—particularly by concluding a bilateral investment treaty with China. It is true that such an

111 For example, we were told that visa applications often require firms to provide the equivalent of social security numbers for high level executives and government officials – sensitive information that most U.S. officials would not think of disclosing to Chinese bureaucrats.

112 See Weddle (2009) for relevant data and a comparative view on investment promotion efforts of the United States and its peer competitors.
agreement would send a powerful signal of our political commitment to boost bilateral FDI flows. However, the extent to which such an agreement would address the problems that Chinese investors confront in the United States is uncertain. Chinese investors already face few formal investment restrictions, after all, and their investments are protected by the robust U.S. legal system. Though a bilateral investment treaty might help calm the debate about Chinese investment, it would not change national security reviews or the CFIUS process in any way.

3. Protect the investment review process from interference.

After reviewing more than 200 inward FDI deals involving China, we have concluded that the U.S. investment screening process is generally well designed. However, we strongly recommend that efforts be made to better protect the screening process from politicization and further improve the transparency of the formal decision-making process. If politicization is not tempered, the benefits of increased inward investment increasingly will be diverted to our competitors.

Whatever steps are taken to protect the U.S. investment review process, they must be concrete. Alterations of the process in ways that would allow further interference—for example, by adding national economic security objectives to the review process, as China recently did in a new regime—should be rejected. The loosely defined terms in the U.S. process, including “national security,” “critical infrastructure,” and “foreign-government control” are not that way by accident. Such imprecision leaves room for judgment, and our interests lie not in eliminating space for judgment, but in ensuring that outcomes accord with the goal of openness. This does not mean revealing sources when a deal must be rejected for classified reasons; it does mean taking a more public stand when spurious arguments against an investment are made, rather than letting a deal twist in the wind.

Some in China have suggested clearer up-front U.S. guidance on what is sensitive and what is not, so that Chinese firms do not waste their time and money. That is understandable, especially in light of the arbitrary politicization in several cases discussed earlier, and would mirror China’s own use of such lists. However, such an approach is unsuited to the United States. Within a given industry, there are acceptable and unacceptable investments, and it is impossible to anticipate all eventualities in advance so as to fairly proscribe foreign investment in some industries and not others. We should ask not whether China has ambitions, or whether an industry can be sensitive, but whether a specific deal poses an actual threat; there are good analytical frameworks for making such judgments.

Finally, for the current policy framework to be defended from constant reproach, it must be

113 Moreover, the question of how big an impact such international investment agreements have on actual investment flows is subject to intense debate in academia. See, e.g., Yackee (2008).
114 See China’s Catalogue for the Guidance of Foreign Investment Industries (NDRC and MOFCOM 2007).
115 See Moran (2009).
dynamic enough to integrate new challenges as they emerge. The evolution of technology and geopolitics necessitate adjusting criteria and processes, as debates about Chinese investment in telecommunications infrastructure, for instance, make clear. Flexibility has been a core American strength in the past. But in addition to being timely, adaptation must be transparent and must not erode confidence in existing regimes. Ad hoc congressional interventions in reaction to perceived threats (see the cases of China Ocean Shipping in Long Beach, CNOOC–Unocal, Alcatel–Lucent, and Dubai Ports World) have damaged the U.S. reputation for openness and must be avoided.

4. Work to better understand Chinese motives.
Ask “Joe the Plumber”—the oracle of U.S. popular sentiment—what Chinese firms are doing in America, and chances are, the answer will reveal dark suspicions. The notion that most firms from China cross the Pacific not under government instruction, but in pursuit of profit, surprises most Americans. If you do not believe a firm is here in search of profit, then how could you not conclude it is here to advance some political objective?

There is no easy way to exclude incendiary views about China from the public debate. We recommend that the only way to reduce the effects of such prejudice is the hard way—through education. U.S. politicians and the general public require a better understanding of Chinese motives and fundamentals. Americans need better education about China, its strengths, its weaknesses, and what it means for the United States. Efforts to create a better understanding of the motives, identity, and behavior of Chinese investors, and especially the economic benefits of growing investment, are key.

How can this educational imperative be achieved? For one thing, the proponents and beneficiaries of Chinese investment in the United States, including deal makers, venture partners, sellers, and localities, can be far more active in presenting the facts. As recommended earlier, a bipartisan statement encouraging Chinese investment is important, and must be aimed at the U.S. domestic audience as much as potential investors in China. And, of course, economists and policy analyst like us should work harder to make the Chinese scene more accessible.

5. Communicate to China its share of the burden.
Suspicions about Chinese firms arise from the relationship between the state and the corporate sector in China. Americans hardly can be blamed for wondering what the bottom line is if the top executives of China’s state-owned enterprise are appointed by and beholden to the Communist Party, business decisions routinely are subjected to political considerations, and firms are larded with loans regardless of their business prospects.

If China wants a more straightforward hearing for its firms in Washington, it must make corporate governance in China more transparent.
The lack of transparency that shrouds China’s leading firms often has to do with protecting the privileged parties who enjoy the resulting profit streams, rather than providing cover for nefarious overseas intentions. Americans cannot be expected to intuit Chinese politics, however. If China wants a more straightforward hearing for its firms in Washington, it must make corporate governance in China more transparent. U.S. officials should call for this forthrightly, and take the upper hand with Chinese pundits complaining about investment barriers. Clearer separation between regulators and the firms they oversee would help. A consumer-oriented welfare test in China’s competition policy would help ensure that market performance, and not some other state objective, is the determinant of Chinese firm behavior. To put it plainly, if China dismantled its system of state capitalism, there would be less mystery about the possible predatory intent of the firms under Beijing’s influence, and hence an easier vetting.

However, we recommend realism in our expectations. Reform in China is not going to happen overnight, but it is important to understand that it has, in fact, happened over the decades. Similarly, China has opened much of its own economy to foreign investors, but there remains much to be done. We generally take the stance that the United States should not base its own investment review system on questions of reciprocity, but Chinese policy makers must be aware that such considerations play an important role in the domestic debate in the United States about openness to foreign investment, and that an acceleration of reforms would strengthen the position of those in the United States advocating investment openness.

Similarly, Chinese leaders must understand that it does not strengthen their call to U.S. policy makers to keep the U.S. investment screening narrow if China at the same time comes up with a domestic investment review regime that explicitly includes “national economic security” and even “social stability” as criteria to block foreign investment.116

6. Remain open to “what if” scenarios.
We recommend an initiative to more systematically explore the implications for the United States and the international economy should artificial input prices, especially for capital, distort world investment patterns significantly in the years ahead. In terms of the nontraditional, special concerns about the economics in the case of China, we see less that is special about China than others do when we look at our more comprehensive data. The exception is the concern that China could be large enough in the future to be a price maker instead of a price taker. If China’s sheer size, combined with its artificial pricing structures (e.g., the cost of capital arising from financial repression), threatens to “poison” global markets in the future when Chinese outflows make up a greater share of world totals, then a subsidy-disciplining regime for global direct investment, akin

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to that for trade, probably will be necessary. We suspect that the statist preferences of China seen at present will break down prior to that point, but we cannot be sure.

Analytically, there is no consensus on how one should define, measure, or observe an unfair influence of one nation’s domestic capital costs on world prices. As we noted in Section III, this question is not unique to China: the worldwide impact of the second round of quantitative easing of U.S. dollar liquidity in 2010 (referred to as QE2) was hotly debated for exactly this reason, with China stridently criticizing the United States for domestic policies that affected others. There should be no objection from Beijing on principle, therefore, to a multilateral research initiative to develop better consensus on this topic.

7. Do not play the reciprocity game.
The term “reciprocity” has been used too frequently in the context of Chinese investment—namely, if China is discriminatory against U.S. investment, the United States should reciprocate in kind. We recommend greater caution. It is true that China maintains significant inward investment restrictions. However, Beijing has been a leader in direct investment openness for decades, and it has grown stronger by opening its door wider to FDI irrespective of overseas openness.

Furthermore, the notion of withholding U.S. investment access for more access in China is foolish and against American interests. Yes, U.S. negotiators must press China to open wider still to U.S. investors. But it is emphatically in America’s interests to separate that effort from whether to permit cash to flow from China into the United States. The United States should welcome capital from China, regardless of what Beijing’s state planners have to say about foreign investment in China. Would the United States really prefer that Chinese firms set up plants in Ontario instead of Michigan, or Juarez instead of El Paso?

8. Get our own house in order.
Finally, and most importantly, we recommend that the United States get its own house in order to maximize the benefits of rising Chinese investment interests. Foreign investment, Chinese or otherwise, can come to the United States for multiple reasons. Investors will flock to a property in bankruptcy for bargain-basement deals and fire sale steals—after all, beggars cannot be choosers. On the other hand, nothing succeeds like success, and for a century and a half, investors have come to the United States because of its sound financial and commercial prospects. The single most important step in attracting foreign investment that creates long-term value in the economy is to address the current political and economic problems that the Unites States faces. Only a country with a healthy economy, political stability, and clear vision for the future will be able to attract foreign investors that contribute to its long-term prosperity.
References


Organisation for Economic Co-operation and Development (OECD). 2008a. Benchmark Definition of Foreign Direct Investment—4th Edition. [http://www.oecd.org/document/33/0,3343,en_2649_33763_33742497_1_1_1_1,00.html](http://www.oecd.org/document/33/0,3343,en_2649_33763_33742497_1_1_1_1,00.html).


For the analysis of direct investment flows from China to the United States, we rely on three sets of data: (1) official data from U.S. statistical authorities, (2) mirror data from the Chinese side, (3) and our own data set on Chinese investment in greenfield projects and acquisitions in the United States. The three data sets are not directly comparable with one another, as they differ with regard to compilation methods, underlying definitions, quality, and timeliness. But each is helpful for describing different aspects of Chinese investment in the United States. For our analysis, we rely primarily on official U.S. data for assessing the aggregate picture, and on our own data set to show the recent upward spike in inflows, map out the distribution of these flows by industry and state, and discuss other relevant characteristics such as ownership. In this Appendix, we describe the data sets, briefly discuss their advantages and disadvantages, and explain how to interpret them.

Chinese authorities publish two data sets that include information on outward FDI flows and stocks: first, the balance of payments and international investment position statistics compiled by the People’s Bank of China (China’s central bank) and its foreign exchange regulator, the State Administration of Foreign Exchange; second, the annual statistical bulletin on outward FDI published by the Chinese Ministry of Commerce.117 The balance of payments and international investment position statistics record annual outward FDI flows and stocks based on the principles outlined in the fifth edition of the IMF’s Balance of Payments and International Investment Position Manual. However, comparable Chinese statistics only provide aggregate numbers for outward FDI to the world, and do not contain any detailed breakdowns by

117 China’s balance of payments and international investment position statistics can be found at http://www.safe.gov.cn; the Ministry of Commerce’s 2009 OFDI report can be found at http://hzs.mofcom.gov.cn/accessory/201009/1284339625415.pdf (document is written in Mandarin but includes an English summary that starts at page 73).
country or industry. Such details can be found in the Ministry of Commerce’s annual OFDI report, which has been published since 2004. The reports provide OFDI flows and stocks in current cost terms, including breakdowns by industry and geographic distribution.

Although the collection and dissemination of data on OFDI have improved markedly in recent years, there are still significant concerns about the accuracy and reliability of the data from the Chinese side. Not surprisingly, Chinese authorities have very little experience in compiling statistics on outward investment flows. Furthermore, the Ministry of Commerce collects data based on information submitted by firms in the mandatory approval process instead of through surveys, which is the international standard. Firms often submit incomplete information or find ways to completely avoid bureaucratic screening, which distorts the statistics.118 Because of this and other problems with data collection, the Ministry of Commerce’s statistics on outward FDI are of questionable quality, with regard to both aggregate data and especially key metrics such as distribution by industry or country.

On the U.S. side, the Bureau of Economic Analysis is responsible for collecting and disseminating data on FDI.119 Based on surveys that firms are required to submit by law, the BEA publishes three distinct data sets that include relevant information for the analysis of direct investment: (1) international transactions and investment position data; (2) data on new foreign direct investment in the United States; and (3) data on the operations of multinational enterprises.120

The international transactions and investment position data track FDI flows and stocks to the world on a balance of payments basis, and to individual countries on a historical cost basis (meaning that the stock numbers might underestimate the current value of assets). Within this data set, the numbers for the geographic distribution of FDI are presented from two different perspectives: country of direct foreign parent, which attributes each investment to the direct parent company, and country of ultimate beneficiary owner (UBO), which tracks the investment to the country of the ultimate owner. The latter perspective generally is considered more accurate, as a large share of FDI transactions today are conducted through special-purpose vehicles in third countries for tax optimization and other reasons. The stark differences between the two measures for flows and stock of Chinese FDI in the United States illustrate that this is especially true for investment from places such as China, in which investors still face extensive capital control and restricted access to legal and financial services (see Figures A.1 and A.2). That said, it is very likely that even the UBO numbers do not fully capture the investment flows from certain regions, given the complicated deals structures and limited resources in track-

118 For a detailed discussion of some of the shortcomings and problems, see Rosen and Hanemann (2009).
119 For portfolio investment and other cross-border investment flows, the U.S. Treasury Department’s Treasury International Capital system can be a useful source of data. It can be found at http://www.treasury.gov/resource-center/data-chart-center/tic/Pages/index.aspx.
120 The data sets and documentation can be found at http://www.bea.gov/international/index.htm.
ing such deals. The data set on new direct investment captures the gross initial investment by foreigners for new greenfield establishments in the United States or the acquisition of existing U.S. companies. Compared to the international transactions data, this data set does not track flows on a balance of payments basis but in terms of actual investment outlays, regardless of the source of financing.\footnote{See Anderson (2009) for a summary of data on new direct investment of foreign investors in 2008 and corresponding technical notes.} Unfortunately, this series was discontinued after 2008 and will not be replaced by a similar data set any time soon. Finally, the data set on the operations of multinational enterprises provides the basic characteristics of foreign subsidiaries of U.S. firms and U.S. affiliates of foreign firms, including total assets, value added, jobs created, payroll, and exports and imports.

Given that the BEA has considerably more experience with compiling data on cross-border investment and that it relies on firm-level surveys to collect data, the quality of the BEA data must be considered as generally superior to the data from the Chinese side. However, there are also considerable weaknesses and shortcomings in the data provided by the BEA. First, the high-frequency data released every quarter are not compiled based on the UBO principle, so these data fail to capture flows from China that go through third countries (based on past patterns, those account for more than two-thirds of flows). And, as mentioned earlier, even the UBO data, which are published with a significant time lag, almost certainly do not catch all transactions. In addition, the BEA’s transactions statistics record flows on a balance of payments basis, which means that capital that does not originate in China (i.e., loans from a bank in Hong Kong or the United States) is not counted as FDI from China, and reverse flows such as intracompany loans from U.S. affiliates to Chinese parents or disinvestments are netted against the inflows. This is technically correct according to the principles outlined in the IMF’s Balance of Payments and International Investment Position Manual, but it deflates the aggregate number and is not helpful for some of the analytical work (for an American worker employed by a U.S. affiliate of a mainland company, it does not matter too much whether the capital comes from Hong Kong or the mainland). The series that circumvents some of these problems—direct investment outlays for establishment and acquisitions in the United States—was discontinued after 2008.

Another more general problem with the BEA data is that the agency is required to hide data points for confidentiality reasons, and in the case of Chinese FDI, a lot of data points are suppressed to protect investors. Finally, the BEA data also do not catch important metrics such as distribution of FDI from single countries by state, the choice of entry mode between greenfield projects and acquisitions, and important attributes of the investing parent firm such as ownership and other characteristics.

Thus, while the BEA data should be more reliable than those generated by China’s Ministry of Commerce to describe aggregate patterns of Chinese FDI in the United States, neither side’s data
are ideally suited for an in-depth, real-time analysis of Chinese investment patterns. Therefore, we compiled our own data set on Chinese direct investment in the United States based on a bottom-up collection of data from commercial databases, media reports, and industry contacts in China. Our data set captures investment expenses by ultimately Chinese-owned firms for mergers and acquisitions and greenfield projects in the United States that qualify as direct investment (i.e., a greenfield FDI project or the acquisition of a stake in an existing company that exceeds 10% of voting rights). However, compared to balance of payments data, it does not capture any other flows, such as reinvested earnings or intracompany transfers, and it does not exclude capital from non–mainland China sources. Therefore, it is probably closest to the BEA’s discontinued series on investment outlays for acquisitions and establishment.

First, we collected raw data on Chinese investment from various sources, including commercial databases, media reports, and lists of Chinese investment projects or firms in the United States that we obtained from other sources. We then separated completed deals that formally qualify as direct investment (following the generally accepted threshold of 10%) and did careful due diligence on each of the transactions. Pending and withdrawn deals were excluded, acquisitions were added to the list at the date of their completion, and greenfield projects were added at the date of their announcement. The deal values are based on either the officially announced investment volume or the most convincing analyst estimates; if no estimate was available, the deal was included in the database with a zero value.

In order to complete the database, we added additional variables such as target state or ownership of investing company, and coded each of the deals on the list accordingly. We also defined our own industry categories based on Standard Industrial Classification (SIC) codes and assigned one of these categories to each deal in the sample, based on the main activity of the greenfield facility or target firm. Using this methodology, we created a data set that is a useful alternative to existing balance of payments data for the real-time analysis of Chinese direct investment in the United States. Table A.1 provides a detailed overview of all deals in the period from January 2003 to December 2010 and their key characteristics.

What are the strengths and weaknesses of this approach? First, although we certainly captured a large number of deals, our data set is far from capturing all Chinese investments in the

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122 The authors are grateful to Jacob Funk Kirkegaard at the Peterson Institute for International Economics for numerous valuable discussions regarding global FDI data and our alternative compilation methodology.
123 Data from the Financial Times’s fDi Markets database (http://www.fdimarkets.com) served as a starting point for our analysis of Chinese greenfield investments in the United States. Several commercial firms provide data on cross-border mergers and acquisitions, among them Thomson Reuters, Dealogic, Mergermarket, ISI Emerging Markets, and CapitalIQ. We mostly relied on data from Thomson ONE (https://www.thomsonone.com) to analyze Chinese acquisitions in the United States.
124 For example, material from business associations, investment promotion agencies, and industry research firms.
125 For government ownership, we applied a threshold of 20% of total outstanding shares for listed companies.
126 See Table A.2 for a detailed breakdown of our categories and corresponding SIC codes.
United States. We were able to track only deals that were big enough to be captured by analysts and reporters. In general, our database should include most deals with an investment value of $500,000 or more. Our data set also includes deals below this threshold that received public coverage, but there are hundreds or even thousands of small-scale transactions every year that are impossible to follow—for example, investments in representative offices, real estate, and other assets. Furthermore, we had to rely on analyst estimates for certain deals with undisclosed value, and for a small number of deals, we could not find such estimates.

Second, given the compilation method, our data set is not directly comparable to the data from the BEA, State Administration of Foreign Exchange, or Ministry of Commerce, and it also is not compatible with existing international balance of payments norms for compiling direct investment data. As such, it cannot be used to analyze balance of payments–related problems and other issues based on the national accounting framework. However, by recording investment flows from a bottom-up perspective, we avoid the problems commonly related to balance of payments data. It is widely known that statistics on FDI and other cross-border capital flows are heavily distorted by transfer pricing and other tax optimization strategies and thus often do not reflect economic realities. By tracking gross investment expenses of firms based on sources outside firms and national statistics offices, we avoid such distortions and present a very useful alternative measure for investment flows. Furthermore, our data set offers more variables and a greater level of disaggregation, which makes it superior for analyzing certain aspects of Chinese investment in the United States that are very prominent in the current policy debate. Finally, our approach allows us to come up with an almost real-time assessment of investment flows as opposed to a significant time lag in the official data.

How do the numbers from these different data sources compare? Figure A.1 shows official BEA and Ministry of Commerce data for annual flows of Chinese FDI to the United States. The corresponding stock numbers for each of the three metrics is shown in Figure A.2.128 Not surprisingly, the BEA's number tracking investment by country of foreign parent on a balance of payments basis shows the lowest stock value, as it misses investment that is routed through third countries and nets reverse flows back to China such as intracompany loans against inflows. Using this measurement, Chinese FDI stock in the United States totals only $791 million in 2009. The BEA's figures under the UBO principle are significantly larger, indicating that Chinese firms indeed extensively use offshore locations to invest in the United States and elsewhere. Flows compiled using the UBO principle show a spike in 2008 and add up to $2.3 billion by year-end 2009.

The Ministry of Commerce data show a smoother slope, most likely because the data do not track reverse flows, evident in the breakdown of BEA flows during the crisis, and add up to a stock

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128 The BEA does not release data on annual FDI flows based on the UBO principle.
of around $3.3 billion by year-end 2009. The stark differences between the BEA and Ministry of Commerce data collection are also visible in the two agencies’ figures for the distribution of Chinese FDI in the United States by industry (see Figures A.3 and A.4). The BEA numbers show a greater share of FDI stock in 2009 in manufacturing than the Ministry of Commerce figures, while the Chinese data record much more investment in wholesale and retail operations. These deviations can be attributed to differences in underlying definitions (China still does not use internationally comparable industry classifications for its data), but also to fundamental differences in the samples that these numbers are based on.

Table A.1 presents a detailed overview of Chinese investment in greenfield projects and acquisitions in the United States based on our bottom-up assessment. For the period 2003–2010, our sample includes investments adding up to $11.6 billion. Both the level of investment and the number of deals were low in the years prior to 2009, with the exception of a spike in volume in 2005 (which can be attributed entirely to Lenovo’s acquisition of IBM’s personal computer division). Since 2009, we observe a clear inflection of Chinese investment in the United States, surging from just $1 billion in 2008 to $2.3 billion in 2009. For 2010, we record expenses of more than $5.3 billion, inflated by a couple of larger-scale investments in different industries. The detailed distribution of investment by industry can be found in Table A.2. The categories and the underlying SIC codes are summarized in Table A.3.

**Figure A.1: Annual Flows of Chinese FDI to the United States, 1999–2009**
Millions of U.S. dollars, various measures

Source: Ministry of Commerce, People’s Republic of China; U.S. Bureau of Economic Analysis (data for flows based on UBO principle are not available).
Figure A.2: Chinese FDI Stock in the United States, 2002–2009
Billions of U.S. dollars, various measures


Figure A.3: BEA: Chinese Direct Investment Stock in the United States by Industry, 2009
Percentage of total stock ($2,281 million), ultimate beneficiary owner principle

Source: U.S. Bureau of Economic Analysis.
Figure A.4: MOFCOM: Chinese Direct Investment Stock in the United States by Industry, 2009
Percentage of total stock ($3,338 million)

Table A.1: Chinese Investment in Greenfield Projects and Acquisitions in the United States, 2003–2010

<table>
<thead>
<tr>
<th></th>
<th>2003</th>
<th>2004</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
<th>2009</th>
<th>2010</th>
<th>All Years</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total number of transactions</td>
<td>No.</td>
<td>10</td>
<td>11</td>
<td>19</td>
<td>17</td>
<td>26</td>
<td>35</td>
<td>53</td>
<td>59</td>
</tr>
<tr>
<td>Number of transactions with missing value</td>
<td>No.</td>
<td>4</td>
<td>6</td>
<td>6</td>
<td>4</td>
<td>2</td>
<td>6</td>
<td>10</td>
<td>6</td>
</tr>
<tr>
<td>Total value of transactions</td>
<td>USD mn</td>
<td>83</td>
<td>209</td>
<td>1,859</td>
<td>208</td>
<td>590</td>
<td>1,062</td>
<td>2,307</td>
<td>5,355</td>
</tr>
<tr>
<td>Average value of transactions*</td>
<td>USD mn</td>
<td>14</td>
<td>42</td>
<td>143</td>
<td>16</td>
<td>25</td>
<td>37</td>
<td>54</td>
<td>101</td>
</tr>
<tr>
<td>Number of greenfield investments</td>
<td>No.</td>
<td>4</td>
<td>4</td>
<td>9</td>
<td>7</td>
<td>15</td>
<td>14</td>
<td>31</td>
<td>25</td>
</tr>
<tr>
<td>Total value of greenfield investments</td>
<td>USD mn</td>
<td>14</td>
<td>19</td>
<td>50</td>
<td>143</td>
<td>163</td>
<td>392</td>
<td>1,388</td>
<td>484</td>
</tr>
<tr>
<td>Average value of greenfield investments*</td>
<td>USD mn</td>
<td>5</td>
<td>6</td>
<td>6</td>
<td>20</td>
<td>11</td>
<td>28</td>
<td>45</td>
<td>19</td>
</tr>
<tr>
<td>Number of acquisitions</td>
<td>No.</td>
<td>6</td>
<td>7</td>
<td>10</td>
<td>10</td>
<td>11</td>
<td>21</td>
<td>22</td>
<td>34</td>
</tr>
<tr>
<td>Total value of acquisitions</td>
<td>USD mn</td>
<td>68</td>
<td>191</td>
<td>1,810</td>
<td>65</td>
<td>426</td>
<td>671</td>
<td>920</td>
<td>4,870</td>
</tr>
<tr>
<td>Average value of acquisitions*</td>
<td>USD mn</td>
<td>23</td>
<td>95</td>
<td>362</td>
<td>9</td>
<td>47</td>
<td>45</td>
<td>77</td>
<td>180</td>
</tr>
<tr>
<td>Number of acquisitions with &lt;50% stake</td>
<td>No.</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>3</td>
<td>1</td>
<td>4</td>
<td>2</td>
<td>11</td>
</tr>
<tr>
<td>Number of acquisitions with &gt;=50% stake</td>
<td>No.</td>
<td>6</td>
<td>7</td>
<td>10</td>
<td>7</td>
<td>10</td>
<td>17</td>
<td>20</td>
<td>23</td>
</tr>
<tr>
<td>Number of deals by government-controlled entities</td>
<td>No.</td>
<td>3</td>
<td>6</td>
<td>5</td>
<td>2</td>
<td>5</td>
<td>7</td>
<td>14</td>
<td>18</td>
</tr>
<tr>
<td>Value of deals by government-controlled entities</td>
<td>USD mn</td>
<td>64</td>
<td>164</td>
<td>39</td>
<td>0</td>
<td>261</td>
<td>276</td>
<td>2014</td>
<td>4,715</td>
</tr>
<tr>
<td>Number of deals by private and public firms**</td>
<td>No.</td>
<td>7</td>
<td>5</td>
<td>14</td>
<td>15</td>
<td>21</td>
<td>28</td>
<td>39</td>
<td>41</td>
</tr>
<tr>
<td>Value of deals by private and public firms**</td>
<td>USD mn</td>
<td>19</td>
<td>45</td>
<td>1820</td>
<td>208</td>
<td>329</td>
<td>786</td>
<td>294</td>
<td>640</td>
</tr>
</tbody>
</table>

Source: Authors’ compilation.

* Excludes deals with missing value.

** Might include listed firms with minority stakes by government-owned firms or related entities (<20% as of March 2011)
Table A.2: Chinese Direct Investment in the United States by Industry, 2003–2010

Number of deals and total investment

<table>
<thead>
<tr>
<th>Sector</th>
<th>Investment Expenses (USD mn)</th>
<th>Number of Projects</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Greenfield</td>
<td>Acquisitions</td>
</tr>
<tr>
<td>1 Industrial Machinery, Equipment &amp; Tools</td>
<td>1,175</td>
<td>1,688</td>
</tr>
<tr>
<td>2 Electronic Equipment and Components</td>
<td>43</td>
<td>1,963</td>
</tr>
<tr>
<td>3 Coal, Oil &amp; Gas</td>
<td>8</td>
<td>1,716</td>
</tr>
<tr>
<td>4 Utility and Sanitary Services</td>
<td>0</td>
<td>1,683</td>
</tr>
<tr>
<td>5 Automotive OEM and Components</td>
<td>38</td>
<td>583</td>
</tr>
<tr>
<td>6 Communications Equipment and Services</td>
<td>411</td>
<td>67</td>
</tr>
<tr>
<td>7 Healthcare and Medical Devices</td>
<td>0</td>
<td>360</td>
</tr>
<tr>
<td>8 Software &amp; IT Services</td>
<td>17</td>
<td>248</td>
</tr>
<tr>
<td>9 Alternative/Renewable Energy</td>
<td>192</td>
<td>62</td>
</tr>
<tr>
<td>10 Metals Mining and Processing</td>
<td>177</td>
<td>63</td>
</tr>
<tr>
<td>11 Leisure &amp; Entertainment</td>
<td>0</td>
<td>220</td>
</tr>
<tr>
<td>12 Textiles and Apparel</td>
<td>60</td>
<td>120</td>
</tr>
<tr>
<td>13 Financial Services and Insurance</td>
<td>67</td>
<td>92</td>
</tr>
<tr>
<td>14 Semiconductors</td>
<td>0</td>
<td>109</td>
</tr>
<tr>
<td>15 Warehousing &amp; Storage</td>
<td>106</td>
<td>0</td>
</tr>
<tr>
<td>16 Biotechnology</td>
<td>94</td>
<td>6</td>
</tr>
<tr>
<td>17 Food, Tobacco and Beverages</td>
<td>53</td>
<td>44</td>
</tr>
<tr>
<td>18 Furniture and Wood Products</td>
<td>46</td>
<td>10</td>
</tr>
<tr>
<td>19 Business Services</td>
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<td>17</td>
</tr>
<tr>
<td>20 Consumer Electronics</td>
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<td>15</td>
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<tr>
<td>21 Pharmaceuticals</td>
<td>6</td>
<td>30</td>
</tr>
<tr>
<td>22 Chemicals</td>
<td>16</td>
<td>12</td>
</tr>
<tr>
<td>23 Other Transport Equipment</td>
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<td>0</td>
</tr>
<tr>
<td>24 Aerospace, Space and Defense</td>
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<td>2</td>
</tr>
<tr>
<td>25 Rubber</td>
<td>23</td>
<td>0</td>
</tr>
<tr>
<td>26 Consumer Products and Services</td>
<td>15</td>
<td>6</td>
</tr>
<tr>
<td>27 Real Estate</td>
<td>0</td>
<td>10</td>
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<tr>
<td>28 Plastics</td>
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</tr>
<tr>
<td>31 Minerals Mining and Processing*</td>
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<td>0</td>
</tr>
<tr>
<td>32 Construction Services</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>33 Engines &amp; Turbines</td>
<td>0</td>
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Source: Authors’ compilation; categories are based on SIC codes, see Table A.3.

* No estimates for deal values available.
Table A.3: Industry Categories by SIC code

<table>
<thead>
<tr>
<th>Sector</th>
<th>SIC codes</th>
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<tbody>
<tr>
<td>1 Aerospace, Space and Defense</td>
<td>372, 376, 3812</td>
</tr>
<tr>
<td>2 Alternative/Renewable Energy</td>
<td>2819, 2869</td>
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<tr>
<td>3 Automotive OEM and Components</td>
<td>3711, 3713, 3714, 551, 552, 553, 501, 75</td>
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<tr>
<td>4 Biotechnology</td>
<td>2836, 8731</td>
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<tr>
<td>5 Business Services</td>
<td>731, 732, 733, 734, 735, 736, 738, 81, 82, 86, 871, 872, 8732, 8733, 874, 89</td>
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<tr>
<td>6 Construction Services</td>
<td>17</td>
</tr>
<tr>
<td>7 Chemicals</td>
<td>281, 2833, 284, 285, 286, 287, 289, 8731</td>
</tr>
<tr>
<td>8 Coal, Oil &amp; Gas</td>
<td>12, 13, 29, 517, 554,</td>
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<tr>
<td>9 Communications Equipment and Services</td>
<td>366, 481, 482, 483, 484, 489,</td>
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<tr>
<td>10 Consumer Electronics</td>
<td>363, 365, 386, 5045, 5064</td>
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<tr>
<td>11 Consumer Products and Services</td>
<td>387, 391, 393, 394, 395, 396, 399, 509, 523, 525, 526, 527, 53, 563, 569, 57, 59, 76</td>
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<tr>
<td>12 Electronic Equipment and Components</td>
<td>357, 362, 364, 3671, 3672, 3677, 3678, 3679, 369, 5063, 5065</td>
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<tr>
<td>13 Engines &amp; Turbines</td>
<td>351</td>
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<td>14 Financial Services and Insurance</td>
<td>60, 61, 62, 63, 64, 67</td>
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<tr>
<td>15 Food, Tobacco and Beverages</td>
<td>01, 02, 07, 08, 09, 201, 202, 203, 204, 205, 206, 207, 208, 209, 21, 54, 514, 515, 518</td>
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<tr>
<td>16 Healthcare and Medical Devices</td>
<td>80, 83, 384, 385</td>
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<tr>
<td>17 Industrial Machinery, Equipment &amp; Tools</td>
<td>352, 353, 354, 355, 356, 358, 359, 361, 382, 508 (except 5088)</td>
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<tr>
<td>18 Leisure &amp; Entertainment</td>
<td>58, 70, 78, 79, 84</td>
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<td>19 Metals Mining and Processing</td>
<td>10, 33, 34, 5051</td>
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<tr>
<td>20 Minerals Mining and Processing</td>
<td>14, 321, 322, 323, 324, 325, 326, 327, 328, 329, 5032, 5033, 5039, 5211</td>
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<tr>
<td>21 Other Transport Equipment</td>
<td>3715, 3716, 373, 374, 375, 379, 555, 556, 557, 558, 559, 5088</td>
</tr>
<tr>
<td>22 Paper, Printing &amp; Packaging</td>
<td>26, 27</td>
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<tr>
<td>23 Pharmaceuticals</td>
<td>2834, 2835, 5122, 5047, 8731, 8734,</td>
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<td>24 Plastics</td>
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<td>25 Real Estate</td>
<td>15, 16, 65</td>
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<td>26 Rubber</td>
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<td>27 Semiconductors</td>
<td>3674, 3675, 3676</td>
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<td>28 Software &amp; IT Services</td>
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<td>29 Textiles and Apparel</td>
<td>22, 23, 31, 513, 561, 562, 564, 565, 566,</td>
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<td>30 Transportation Services</td>
<td>40, 41, 4212, 4213, 4215, 43, 44, 45, 46, 47</td>
</tr>
<tr>
<td>31 Utility and Sanitary Services</td>
<td>49</td>
</tr>
<tr>
<td>32 Warehousing &amp; Storage</td>
<td>4214, 422, 423</td>
</tr>
<tr>
<td>33 Furniture and Wood Products</td>
<td>24, 25, 5031</td>
</tr>
</tbody>
</table>

Source: Authors' classification.
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