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China's Path to Financial Reform

Looking Beyond the Market

By Adam S. Hersh October 2014

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Introduction and summary

Last year, China's political leaders set forth an ambitious and unfolding agenda for financial reform as part of a broader national economic strategy of structural rebalancing toward more domestic demand and innovation, as well as a more environmentally friendly and more equitable economy.

These goals are not new for China but rather have persisted across decades of China's five-year plans. What is new is China's political leadership, and new leaders have offered a sweeping vision that sets an ambitious agenda to advance the next wave of reform in China's long evolution from a centrally planned economy that began in 1978. In the November 2013 18th Party Congress Third Plenum Decision—which is at once both a governing policy document and a political statement similar to the State of the Union address—the party's Central Committee called for reforms across virtually all aspects of society and pledged that the economy should embrace "a decisive role for the market."[1] Nearly one year later, the scope and intention of these reforms are starting to come into focus.

Central to the reform agenda, and at the heart of its unbalanced economy, is China's state-dominated financial system. An economy's financial institutions are fundamental to its economic success, facilitating the investments that yield the higher productivity and innovation that lead to economic growth and rising living standards. At the most basic level, financial institutions do two things that determine the quantity and quality of investment: They provide a means for collecting savings and selecting the projects in which to invest those savings, and they provide corporate governance and legal systems to make sure those investments are being effectively used.

Unfortunately, China's financial institutions are falling short on both these fronts, and the pervasive role of the state in these core functions creates considerable structural inertia that is likely to keep things this way for China's foreseeable future. State-owned banks control 57 percent of China's banking-sector assets, and state-owned enterprises account for more than 90 percent of the capital raised in China's

corporate bond market.[2] The legacy financial institutions inherited by China's leaders create "distortions [in] the system at every level" that pose daunting challenges for reform.[3] What's more, even as the state may be seen to pull back, because of its compulsive power over those people and businesses within the country, Beijing still has substantial freedom to set policies that affect how virtually all other social institutions function.[4]

To understand the challenges China faces in approaching financial reform, this report first considers China's position with respect to the international financial trilemma. Economic theory suggests that a country can attain at most two of the following three economic policy goals: macroeconomic policy autonomy; a stable, fixed exchange rate; and open, deregulated international capital flows.[5]

China presently forgoes the third option—free capital movement—and instead opts to have the ability to conduct its economic development strategy and maintain a fixed exchange rate for its currency, the renminbi, or RMB, which provides financial stability and promotes exports. In many ways, this formulation of the trilemma provided the foundation for China's historic economic transformation. But it also created costs and now constrains China's future economic development and limits its ability to escape the middle-income trap.[6] Realizing these problems, the Chinese government last year pledged to open the domestic economy to international capital flows and to shift toward market-determined interest rates and other financial prices—but gradually and with significant limitations and constraints.

Given the trilemma, by choosing to adopt the third option, economic theory suggests China will also need to choose to give up either independent monetary policy or a fixed exchange rate. Leaders and top economic policymakers have set clear intentions to open China's capital account and to halt direct policy interventions in setting interest rates, the exchange rate, and prices for other assets and financial services. But Beijing established that changes will take place gradually over the next decade, and policymakers do not yet have a clear path to that end.[7]

A decisive role for the market in China's financial system will be difficult to achieve given the pervasive reach of China's one-party political structure and extensive state ownership across the economy's financial and nonfinancial sectors. As Nobel Prize-winning economist Joseph Stiglitz writes, "Market Socialists were misled into thinking that they could get all the advantages of the market economy simply by using the price system."[8] The ubiquity of the party-state's roots throughout the economy creates a decision-making mechanism that exists in parallel to market

mechanisms for deciding investments' worth. These competing nonmarket institutions disrupt market-price discovery by corrupting the economy's micro-level choices about which investment projects to choose and on what terms financial resources will flow.

In other words, Stiglitz's observation is that a market-based financial system needs more than just interest and exchange rates that float with supply and demand, as nonmarket mechanisms will skew not only interest rates but also who gets to borrow, lend, and control the investments that amount to fully half of China's gross domestic product, or GDP.[9] To work effectively, a market-based financial system also requires open, transparent public and corporate governance systems and robust prudential regulations to referee competition and to keep the system from crashing. Instituting these and broader changes are necessary to address structural problems in China's financial system that stand in the way of economic rebalancing and attaining China's next stage of economic growth. Skipping over these steps will pose problems for China.

Capital account opening and interest rate liberalization without corporate governance and regulatory reforms in China's state and private sectors will not lead to market-determined interest rates in either bank lending or China's corporate bond markets. Rather than reflecting supply and demand conditions, decisions about how much to lend, how much to borrow, and the perceived risk of an investment are made through discrete units of China's existing state-owned financial and nonfinancial enterprises.

For China's exchange rate, too, it is not clear that marketization will bring the desired effects of economic rebalancing. In fact, capital account opening is likely to move China's exchange rate in the wrong direction—depreciating against the U.S. dollar rather than appreciating toward a balanced level—even if monetary authorities were to refrain from using their resources and ongoing capacity to manage China's exchange rate. Increasing capital flows into and out of China's economy will strain the financial system's ability to channel capital into productive investments. It will also limit policymakers' ability to manage systemic and macroeconomic stability, exposing China and the global economy to real risk of banking and financial crises—like so many other developing countries.

Whether China is ready for such a market financial system, leaders have chosen to move ahead with financial liberalization and capital account opening. The question now is how and at what pace China will do this. This report provides a survey of the challenges in China's financial system and explores China's ambitious and

unfolding agenda for financial reform and structural rebalancing toward an economy that is more domestic-demand driven, fueled by innovation, more environmentally sustainable, and more equitable.

The report concludes by offering a series of steps both Chinese policymakers and global leaders can take to shepherd China along the path to the economic rebalancing and reform needed for China to develop and integrate further into the world economy. These recommendations include:

- Building China's foundation for inclusive growth
- Prioritizing corporate governance reform
- Rebalancing global exchange rates
- Setting a high standard for China's reform efforts and global commercial norms

Key economic concepts

International balance of payments: a system of national accounts that measures all of an economy's international monetary transactions in a given time period, usually quarterly. The accounts include all transactions conducted by private- and public-sector entities and are traditionally divided into:[10]

- **Current account transactions** for the sale of exported and imported goods and services and the transfers and payments of incomes outside the jurisdiction where they are earned.

- **Capital account transactions**—now designated as the financial account in official statistics—which measure the flows of cross-border investments and liabilities divided among the following three classifications of flows:

- **Direct investment flows,** which involve the acquisition of a controlling interest in foreign businesses. The Organisation for Economic Co-Operation and Development and the International Monetary Fund, or IMF, define direct investment as ownership equal to or exceeding 10 percent; China's statistics define direct investment as ownership equal to or exceeding 25 percent.[11]

- **Portfolio investment flows,** which include share ownership not exceeding the direct investment threshold and investment in other financial assets including bonds, derivatives, and direct lending and borrowing.

- **Official investment flows,** which include the purchase and sale of financial assets by state and quasi-state bodies, typically for official foreign reserve holdings.

Based on the accounting identities, the capital account balance will be equal to and opposite of the current account balance.[12]

Interest rate parity: In open, competitive markets, the price of capital in different economies—the interest rates at which one can borrow money in different markets—should tend toward one set of prices for assets depending on the loan's risk level and length. If price differences exist between markets, profit opportunities from arbitrage—taking advantage of small price differences across markets by borrowing in one market where prices are slightly lower to lend in another market where prices are slightly higher—will lead investors to jump into the market. Buying assets or borrowing money in the lower price market will drive up prices there, while selling or lending in the higher price market will drive down prices, with the effect that both markets converge to the same price. Thus, market forces will tend to drive interest rates and asset prices toward a common price, or parity, excepting for different

transaction costs across different markets. In practice, the parity condition may not always hold in day-to-day markets, but it tends to hold when considering interest rate forward and futures prices, a more specific condition known as covered interest parity. Consistent deviation from interest rate parity conditions indicates a financially closed economy.

Capital controls: Governments may institute a range of policies to regulate the cross-border flow of financial investment. Some of these may serve as part of an overall approach to prudential regulation of the financial system, but capital controls also enable policymakers to conduct development- and export-targeted macroeconomic policies. This provides favorable investment terms and exchange rates. The IMF's and World Trade Organization's Articles of Agreement require financial flows for trade transactions in the current account to be freely convertible.[13]

Exchange rate peg: This refers to a macroeconomic policy that fixes a currency's exchange rate to one or more other currencies. Fixing can be achieved through policy fiat—though this typically leads to black market trading. More commonly in the modern incarnation, monetary authorities achieve fixing by intervening in foreign exchange trading to buy and sell currency at levels sufficient to maintain a stable exchange rate. So long as monetary authorities control enough resources to be able to out buy, out sell, or at least out bluff other traders on the market, an exchange rate peg can be maintained. Countries can peg their currency's exchange rate to one currency or to a weighted average of other currency exchange rates, known as a basket exchange rate peg.

International financial trilemma: International economic theory establishes that countries can attain at most two of the following three goals of economic policy: (see Figure 1)[14]

1. Macroeconomic policy autonomy, which is the power to print money and the ability to shift interest rates for macroeconomic management or development purposes.

2. A stable, managed exchange rate set by policy interventions rather than by market forces of supply and demand.

3. Free capital movement, or the open movement of financial flows in the country's international capital account.

Context for China's financial reform

For President Xi Jinping and Premier Li Keqiang, managing China's economic reform agenda is a bit like flying a commercial jetliner while the engineers are still designing and building the critical engine upgrades. These reforms are, in the words of People's Bank of China Governor Zhou Xiaochuan, carried out as "online repairs" to the complex web of social and economic relationships that make up the engines that power China's economy.[15] Perhaps the most daunting item on the list of their reform agenda is reforming China's state-led financial system—a system that University of California, San Diego, economist Barry Naughton says "introduces distortions into the system at every level."[16]

China's leaders pledged in November 2013 to open the domestic economy to international capital flows and to shift toward market-determined interest rates and other financial prices—gradually. But in order to retool the legacy, state-led economic model to one where the market plays "a decisive role," true financial reform must do more than just open China's capital account—the collection of international investments into and out of a national economy—and erect facades of a modern financial system. China's leaders must tackle a broad array of issues as part and parcel of a comprehensive approach to rebalancing toward domestic, demand-led growth.[17]

China's financial system has come a long way since financial reforms began in the mid-1980s. These reforms broke up the monobank People's Bank of China, or PBOC, into a central bank with responsibility to manage monetary policy, and they created a system of separately administered state-owned commercial banking entities.[18] Nonetheless, China's financial system still operates under a rather different set of institutions, principles, and norms than those in developed economies.

The exchange rate mechanism for China's currency, the renminbi, is currently hard pegged to the U.S. dollar, though authorities have allowed the level of the peg to crawl gradually upward. While reforms are poised to experiment with relaxing existing interest rate controls, both the level of savings and the demand for credit are driven by forces other than interest rates, including:

- Households in China, which exhibit the highest savings rate in the world despite earning a negative interest rate on their savings after inflation[19]

- State-owned financial institutions that comprise more than 92 percent of China's banking system and disperse credit through fulfilling policy-guided lending, rather than by weighing potential risks and rewards[20]

- State financial institutions, which also dominate China's developing capital markets, lending directly through bond markets largely to state-owned and quasi-state enterprises in China, which amounts to more than 90 enterprises

- State-owned and quasi-state enterprises that similarly dominate China's corporate sector and also save too much—earning profits from their often monopolistic positions and privileged access to economic resources but unobligated to distribute earnings to shareholders due to weak corporate governance systems

Simple liberalization of interest rates and the exchange rate will not address the fundamental distortions nor, on their own, lead to a decisive role for markets in China's financial economy. Most financial institutions' balance sheets ultimately tie back to the Ministry of Finance—which simultaneously plays the roles of primary owner, regulator, and ultimate guarantor of China's financial system. Additionally, most of the lending in China's financial system flows to state, quasi-state, and other relational transactions. Without deeper reform, China will remain mired in the cycle of inefficient investments, rising inequality, and the need for policymakers to walk a razor's edge between inflationary and systemic stability pressures.

China's leaders are all too aware of the massive distortions created by the country's rigid financial system, the widespread costs it creates, and the need to reform to rebalance the economy overall. Reports from the National Development and Reform Commission, or NDRC, have sought to motivate reform by highlighting China's multidimensional imbalances, driven by the country's national approach to economic development. These severe imbalances exist, according to the NDRC, between man and nature, economy and society, the coastal and interior regions of China, urban

and rural China, and China and the rest of the world.[21] And the caustic potential of these combined imbalances underscores why President Xi and Premier Li are swinging for the fences with their reform ambitions.

Economic reform is good for China and good for the world. But stark incongruities exist between the urgency for reform, the pace at which China's leaders are willing and able to move reforms through domestic political constraints, and the urgency with which other countries view China's current economic growth model. There is reason for prudence on both sides. From the perspective of the United States and other advanced-economy countries, it is imperative that as China reforms and integrates further into the world economy, it meets the high expectations for openness and transparency in commercial conduct established by the global community and follows a high road to sustainable and inclusive economic growth. Hence the alphabet soup of bilateral and multilateral trade and investment agreements that the United States, the European Union, and other groups of countries are racing to negotiate with China.

But from China's perspective—where the 1839 Opium War and resulting Treaty of Nanjing pass for recent trade policy history—the experience of the 1997 Asian Financial Crisis understandably looms large for Chinese policymakers. China's leaders would not readily accept the loss of policy autonomy to foreign elements, financial turmoil, and prolonged economic stasis that engulfed neighbors such as Thailand, South Korea, and Indonesia during the crisis. And the history of other countries that have walked China's current path toward financial opening is replete with those that have been dashed on the shoals of global financial markets.[22]

China's neighbors and many other small countries had financial systems that proved ill equipped to handle the wave of short-term, often highly speculative money inflows from overseas investors, leading to misallocating finance heavily into investments that fuel financial bubbles. This inevitably caused a sudden stop of capital and a wave of hot outflows when market expectations or global conditions shifted—an outcome for which China is also a prime candidate and that it should seek to avoid as it approaches financial reform.

To institute a decisive role for China's financial markets, PBOC Vice Governor Yi Gang, a member of the top-level Central Leading Group for Financial and Economic Affairs, explained policymakers' intended approach to sequence financial reforms. First, he says, "You have to, in a bold fashion, liberalize the exchange rate … [Then] [y]ou can do some cautious, step-by-step interest rate liberalization."[23] In May, a

senior PBOC researcher outlined plans to make China's currency fully convertible by the end of 2015, though elsewhere leaders suggested full capital account opening might happen by 2020.[24] Not only is this a bit optimistic on timing, but more importantly, the plan reverses the prudent sequencing of reforms. As Stanford economist Ronald McKinnon explains, "When future exchange rates are unknown, an efficient international capital market cannot exist because certain key risks cannot be hedged."[25] This condition, McKinnon demonstrates, means that governments are compelled to manage the exchange rate in order to ensure macroeconomic stability, despite the fact that this disrupts market-based functions in the financial system.

By sheer gravitational force, given China's size and growth rate, dreams for Shanghai to become a major international financial center—where it rivals others of the world in scale and scope—will surely soon come to pass. This, like other milestones, will transpire well before China qualitatively approaches international norms of transparency in financial accounting and corporate governance.

China's leaders need to pursue reforms simultaneously on multiple fronts, many steps of which will be difficult to discern from the outside. But several specific outcomes will indicate real markers of whether financial reforms are succeeding in rebalancing China. These include:

- If the financial system can redirect new investment flows away from areas where overinvestment already exists in China's economy and toward productive, sustainable investment

- If China can contain its systemically important financial institutions while opening credit to small and medium-sized enterprises, or SMEs

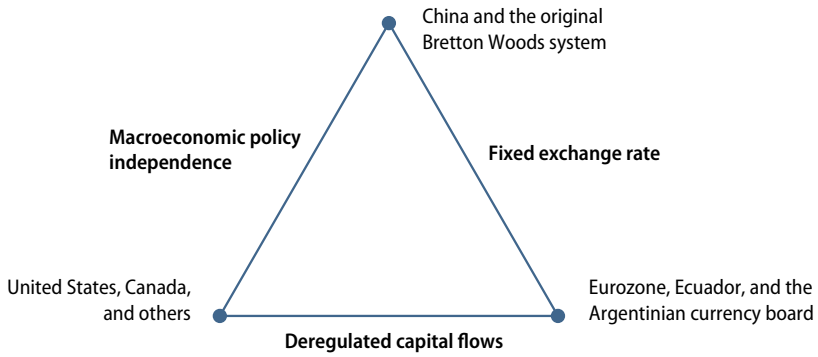
- If China can build institutions to ease the financial squeeze on households and start growing the economy on an environmentally cleaner, more economically inclusive path[26]

China's financial trilemma

FIGURE 1

The international trilemma forces policy choices

Economic theory: Countries can achieve only two of the following three goals



Source: Adapted from Joshua Aizenman, Menzie D. Chinn, and Hiro Ito, "Assessing the Emerging Global Financial Architecture: Measuring the Trilemma's Configurations Over Time." Working Paper 14533 (National Bureau of Economic Research, 2008), available at http://web.pdx.edu/~ito/w14533.pdf.

In the early 1960s, economists Robert Mundell and J. Marcus Fleming first showed that countries could attain at most two of the following three goals of economic policy: (see Figure 1)[27]

1. Macroeconomic policy autonomy, meaning the power to print money and the ability to shift interest rates for macroeconomic management or development purposes

2. A stable, managed exchange rate, meaning a nation's exchange rate set by policy interventions rather than by market supply and demand forces

3. Free capital movement, meaning open movement of financial flows in the country's international capital account without restrictions, taxes, or other capital controls

All countries fall into one corner of this trilemma. For example, the United States and most advanced economies currently forego the second goal: a stable exchange rate. Eurozone countries, in effect, have chosen to forgo the first goal, macroeconomic policy autonomy, by linking together in a common currency that together achieves the first and third goals. Countries that adopt outright pegs or index to a foreign currency—such as Argentina in the 1990s or Ecuador today—forego the first goal. China foregoes the third goal—an open capital account—opting for policy autonomy and a fixed exchange rate instead. Historically, countries that attempted to achieve all three policy goals often fell into financial crisis, shown by the 1997 Asian Financial Crisis and Argentina's financial crisis in 2001.

To understand how countries are bound by this trilemma, consider this economic theory: Under open international money markets, international arbitrage among investors will push each country's interest rate—the price of capital in each respective economy—to the world interest rate, allowing for specific risk factors that exist in different countries. Here, global forces of supply and demand and investors' assessment of the various risks drive the price of investment capital—the interest rate—around the world.

Policies that disrupt the flow of capital into and out of national economies, or capital controls—forgoing the third option—can drive a wedge between the national and international prices of capital that creates a space to make the first option possible. Here, policymakers can subsidize the cost of investment and conduct what former World Bank Chief Economist Justin Yifu Lin describes as a critical role for public policies to "facilitate industrial upgrading and diversification" to quickly develop new domestic and internationally competitive industries.[28] This likely contributes to the mispricing of capital in China, but the effects are negligible relative to the problem of investment-project selection and management arising from corporate governance problems in China's major financial and nonfinancial enterprises.[29]

Internationally competitive industries also bring the virtue of earning hard-currency foreign exchange that can be used to manage a stable exchange rate, fixing it relative to other world currencies and defending this peg from the pressures of international financial traders—the second option. Mechanically speaking, monetary authorities achieve such a peg by managing the volume of buying and selling their currency in foreign exchange markets and having sufficient resources to be able to out buy—or at least out bluff—all other traders in the market. These things allow monetary authorities to maintain a stable market price for the exchange rate and therefore to maintain their ability to tip the scales on interest rates too.[30]

Part of this equation entails regulating which players—including private investors, companies, and public bodies—can bring money into and out of China, how much they can bring, and under what conditions they can bring it. Another part entails how well the regulations bind on the supply and demand for capital. While China's economy is relatively open in terms of financial transactions for trade, China ranges from restricted to fully closed in terms of financial transactions for financial purposes. For inward portfolio investment, China's leaders intend to fully open between now and 2020. Meanwhile, policymakers are already opening the floodgates on outflows of direct and portfolio investments overseas.

On the direct investment side, China plans to shift control of inward foreign investment from a positive-list regime—that indicates which areas are acceptable for investment—to a negative-list regime that indicates which areas are prohibited or restricted for investment.[31] Already, reform toward a negative list on foreign direct investment, or FDI, is taking effect in the Shanghai Pilot Free Trade Zone, which is considered a test for nationwide adoption. But as yet, there seems to be little practical difference between China's positive- and negative-list approaches.[32] Examples of restricted areas include investments in the manufacturing of construction equipment, which remain off limits to foreigners not operating in a joint venture with a domestic partner. Meanwhile, investments in movie theaters are restricted to foreigners other than Hong Kong and Macao residents.[33] As explored in other research, this policy and the drive to invest in China's economy can disadvantage foreign investors in business relationships when it comes to compelling investment and transfer of technological advantages to Chinese partners.[34]

And while establishing an entry into China's economy may be a priority for foreign investors, foreign investment plays a relatively minor role in China's total investment. Although China was the world's top FDI destination in 2013, the total amounted to a mere 2.9 percent of China's overall investment.[35] Of China's FDI figures, economists estimate as much as one-third is actually domestic capital that investors launder through Hong Kong, Macao, and Taiwan to pose as foreign investment in order to gain preferential tax treatment and legal protections. Hong Kong, Macao, and Taiwan are consistently the source of more than 60 percent of China's FDI inflows. Of the small overall amount of FDI in China's investment, investments from the United States, Canada, and the European Union combined total less than 10 percent.[36]

Whether China can maintain a handle on the exchange rate as such two-way capital flows grow depends on whether it can continue to sway a deeper pool of foreign exchange trading. Pressure on the capital control regime can be measured by the

degree of violation of the interest parity condition—the proposition that interest rate differentials between countries will be driven toward equivalent returns by investment arbitrage. Economists at the Hong Kong Institute for Monetary Research and the Bank of Finland measure this pressure in China's covered interest differential, where "covered" means an arbitrage trader would hedge exchange rate risk between the renminbi and the U.S. dollar.[37] The researchers found that for China, "the RMB covered interest differential is not shrinking but widening over time." Bank for International Settlements economists Guonan Ma and Robert McCauley concur, finding that—despite some leakage through illicit capital flight—China's ability to control capital flows "remains substantially binding."[38]

Shifting trilemmas? Moving China's exchange rate and interest rates

Presently, China opts for macroeconomic policy autonomy and a stable exchange rate in the international trilemma. But leaders and top economic policymakers have made clear the intention to gradually open China's capital account, as is now being tested in the Shanghai Pilot Free Trade Zone that launched in September 2013.[39] Presumably, this would mean that China must pick a new corner in the international trilemma—either economic policy autonomy or a stable exchange rate.

Contrary to the Mundell-Fleming trilemma hypothesis, recent empirical research by economists Joshua Aizenman, Menzie Chinn, and Hiro Ito shows that some developing-economy countries have been able to pursue a balanced approach to all three goals of the trilemma at the same time—if they can also maintain sufficient levels of foreign exchange reserves.[40] In other words, just opening an economy to capital flows itself is not a sufficient condition for financial reform and economic rebalancing. Looking more closely at how financial prices are set in China reveals how this can be the case with interest rates and the exchange rate.

Interest rates and capital markets

It is not clear that simply opening the capital account to foreign borrowing and relaxing domestic interest rate controls will achieve the market-price discovery of interest rates that China's financial system now lacks. The sequencing of proposed reforms in effect gets the order backward. Effective pricing of the exchange rate by market mechanisms requires that investors formulate clear expectations about the term structure of interest rates—that is, what interest rates are charged for different levels of risk and for different lengths of time. The interest rate term structure defines the price of money, and therefore the level at which it should exchange with other national currencies given the interest rate term structure and price levels in those other monies. In China, however, the majority of financing for investment—whether through traditional banking or direct lending or through the shadow-banking

system—remains in the hands of state-owned and state-inflected parties. In these relations, financial decisions are not necessarily based on the price of capital, and the price of capital is not necessarily set by supply and demand in a competitive market.

As a result, it is no surprise that China's financial markets also remain notably underdeveloped by international comparison. China's stock market capitalization amounted to just 59 percent of gross domestic product in 2011; this is in contrast to South Africa, where stock market capitalization reached 145 percent of GDP in 2011.[41] China's financial authorities would love nothing more than to wean state-owned enterprises off of reliance on state-sector financing and onto private sources of funds for investment, particularly from overseas. This is especially true of foreign interest to finance Chinese companies through public share offerings, which are restricted to shares that do not carry voting rights or pay dividends, essentially providing free money to Chinese companies. While Chinese shares—in both domestic and offshore markets—attract a substantial pool of capital, limited investor rights mean that shareholders cannot fulfill their role in setting the price of capital and shaping firm governance through the mechanism of share prices. Credible information for guiding investor decisions is also scarce in China. In January 2014, state pressures on accounting and auditing firms to falsify financial records led the U.S. Securities and Exchange Commission to bar Chinese units of major international accounting firms from conducting business for six months.[42]

The corporate governance issues extend to the private sector as well. To take one recent example, the leading Chinese online direct sales company JD.com recently raised $25 billion in a NASDAQ initial public offering. But founder Richard Liu, who serves both in the role of chairman and CEO, kept 83.7 percent of the voting power despite owning only 18 percent of the company's equity.[43] In the state-owned sector, only a minority of shares for listed firms are available on the open market, meaning that the state—despite raising money from the market—stays in control. And in China's corporate bond market, it is actually local governments that are mopping up more than 90 percent of all capital borrowed.[44] Rather than reflecting supply and demand conditions, interest rates in bank lending or in China's corporate bond markets factor little into decisions about how much to lend, how much to borrow, or the perceived risk of an investment. The banking and direct finance channels provide mechanisms for moving capital between discrete units of China's extant state-owned financial and nonfinancial enterprises. Corporate governance issues in both China's state-owned and private financial and nonfinancial corporations will remain fuzzy. Even as the state may be seen to be letting go, economist Lin reminds us, "Because of [the state's] compulsive power, the government has substantial freedom to adopt policies that affect the functioning of other institutions in society."[45]

In April 2014, new People's Bank of China Chief Economist Ma Jun laid out an unofficial plan for China to liberalize interest rates in steps: first by establishing a central-bank-blessed benchmark interest rate for interbank lending and then by eventually liberalizing deposit and lending rates.[46] But this vision for reform does not deal with the fundamental problems of intertwined policymaking, regulatory oversight, and profit-maximization goals reflected in the predominance of state-owned financial institutions on both the buying and selling sides in Chinese financial markets. The individual balance sheets of these financial institutions ultimately tie back to the Ministry of Finance—through ownership relations as well as through its role as ultimate guarantor of China's financial system. It is therefore inappropriate to interpret the buying and selling as open competition that yields a price through forces of supply and demand. As Peterson Institute for International Economics economist Nicholas Lardy observed, "The strange thing about China's bond market now is that most of the bonds are actually purchased by the banks, so it's a little bit difficult to differentiate between bond financing and bank lending."[47]

New capital will start flowing in and out of China's financial system as China begins experimenting with several test cases for nonstate financial institutions. China's leaders pledged to open up to private banking, but initial steps will be limited to four different models targeted to test the waters in segments of the banking system underserved by current institutions, though all the private investors approved for new ventures all exhibit strong state ties.[48] The first pronouncement on the private banking experiments indicated that new ventures would be required to draw up "living wills"—plans for unwinding an institution's financial commitments in the event it becomes insolvent. The focus on creating a mechanism to insulate public exposure to private risk-taking was ostensibly a lesson that China's leaders and financial regulators drew from watching their U.S. counterparts scramble in 2008 to cope with the collapse of Lehman Brothers investment bank and insurer American International Group. But the China Banking Regulatory Commission's most recent announcement in July indicated that, rather than pledging living wills, new bank owners might be required to enter contingent capital arrangements—which is a way of ensuring that the owners have sufficient skin in the game and specifying the proportional losses investors will take if the bank goes belly up.[49]

This handful of banking projects presents an interesting array of experiments that reveal how China's policymakers are thinking about tackling the microeconomic problems in their financial system. But these new financial institutions and widening competition between existing domestic and international financial institutions, when considered with the expectations of rising gross, two-way capital flows, raise further considerations for China's financial reform agenda.

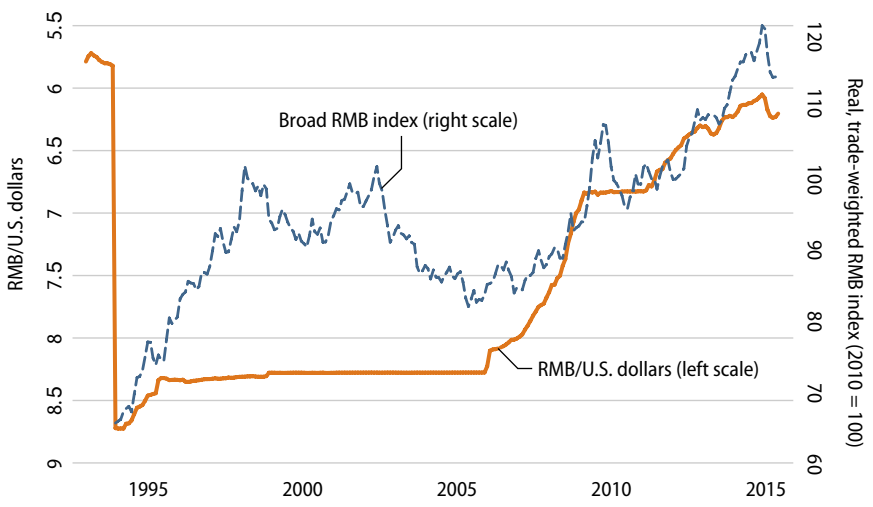
The exchange rate

To manage the exchange rate, monetary authorities strive to own a portfolio of assets of different currencies, or official foreign exchange reserves. The International Monetary Fund estimates that 64 percent of China's $4 trillion in official reserves is cash dollars and U.S.-dollar-denominated financial assets, primarily bonds from the U.S. Treasury and other U.S. government agencies.[50] The more reserves a country accumulates, the more freedom it has to manage the exchange rate and to defend against currency speculators' attempts to dislodge an exchange rate peg.[51] Historically, China's monetary authority was party to more than 90 percent of trades in its foreign exchange markets.[52] With the fragmentation of state-owned financial institutions into more organizations, it is no longer as easy to identify which entity is doing the service of intervening in foreign exchange markets. In a briefing following the July 2014 Strategic and Economic Dialogue, Finance Minister Lou Jiwei said, "It is very difficult for us to completely refrain from foreign exchange market intervention."[53]

PBOC Governor Xiaochuan has said that "the central bank will basically exit from normal foreign-exchange market intervention," but he also stressed that China would retain the authority to contain capital flows and to intervene in the foreign exchange market as it saw necessary.[54] China may not need to get out of the business of managing its exchange rate: Official policymaking has referred more narrowly to allowing capital account "convertibility"—the freedom to convert the renminbi into another currency, or vice versa—however the exchange rate may be set.

FIGURE 2

China's exchange rate evolves from fixed to crawling peg



Source: Federal Reserve Bank of St. Louis, FRED Database (EXCHUS, RBCNBIS), available at http://research.stlouisfed.org/fred2/ (last accessed July 2014).

To understand where China's exchange rate mechanism may be going, it is useful to look at how the current one works in practice. In 1994, China did away with its dual currency system—a legacy from central economic planning. As part of this change to the exchange rate mechanism, policymakers sharply devalued the RMB against the U.S. dollar, the drop in the red line seen in Figure 2. After that, China pegged its exchange rate at 8.28 RMB to the dollar and held it there for the next decade. Although the RMB remained nominally fixed to the dollar, higher inflation and productivity growth in China relative to its trading partners over this time clawed back some of the initial depreciation in China's real broad exchange rate through 1998. The RMB then held stable following the Asian Financial Crisis.

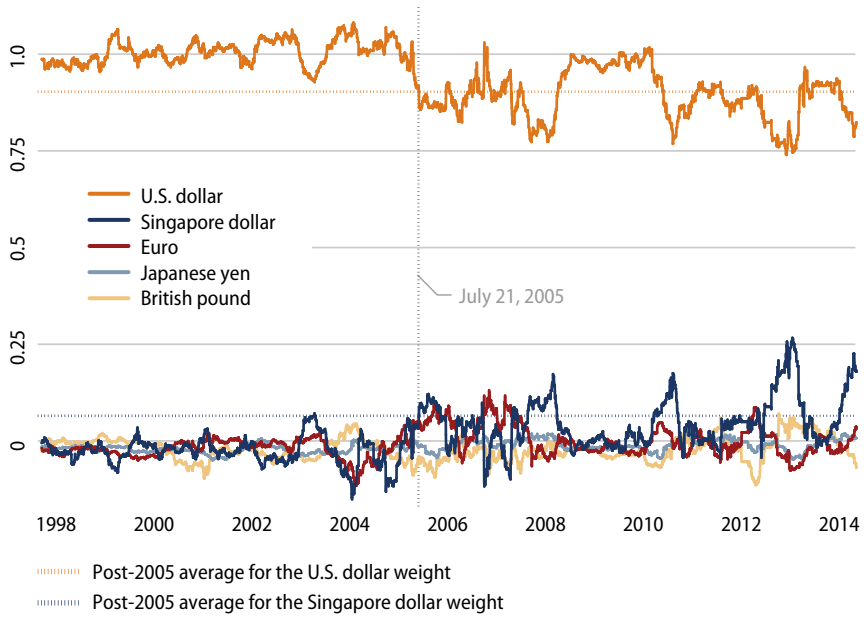
In June 2005, China's policymakers set the RMB-U.S. dollar exchange rate on a gradually crawling appreciation—both in nominal and inflation-adjusted terms. While disrupted by the 2008 financial collapse and ensuing global recession, the RMB climbed some 37 percent against the dollar. While RMB appreciation is key to China's economic rebalancing, appreciation alone does not change China's exchange rate mechanism. Today, as it did before 2005, China still chooses to maintain an exchange rate pegged almost exclusively to the U.S. dollar, though policymakers have let the level of this peg gradually crawl higher. In other words, China still chooses the second option in the trilemma.

Economists Jeffrey Frankel and Shang-Jin Wei developed a widely used method for measuring the relative flexibility of a currency and how heavily an exchange rate is pegged to other international currencies.[55] This is accomplished by evaluating how China's and other countries' exchange rates co-vary relative to another benchmark rate—in this case, to the International Monetary Fund currency known as Special Drawing Rights, or SDRs.[56] Frankel and Wei's method also allows the analysis to account for monetary pressure building up in the financial system due to an exchange rate peg. Figure 3 shows the results from updating and extending Frankel and Wei's approach and extending its estimates into a time-series dimension. Estimating the currency weights at the higher-frequency daily data in rolling 180-day windows provides a clearer picture of how China's exchange rate peg has evolved over time—which is to say, not too much.[57]

FIGURE 3

Currencies in China's exchange rate basket

Percent weight in China's exchange rate basket



Source: Author's analysis of International Monetary Fund data. Estimated weights (coefficients) for 180-day rolling regressions based on model (4) in Jeffrey Frankel and Shang-jin Wei, "Estimation of De Facto Exchange Rate Regimes: Synthesis of the Techniques for Inferring Flexibility and Basket Weights," (NBER Working Paper No. 14016) available at http://www.nber.org/papers/w14016.

Surging exchange market pressures create small spikes and valleys in the estimated basket weights—most notably for the speculative bubble years that preceded the 2007–2008 global financial crisis. When the crisis hit, capital controls bound tighter, and China reverted back to a near-100 percent peg to the U.S. dollar. This worked for a while, but China's capital controls soon saw more pressure. This was due to a rising tide of capital in international financial markets—enabled in part by successive rounds of quantitative easing of monetary policy from the Federal Reserve, as well as by the large gap between potential returns on dollar and RMB assets.[58]

Figure 3 suggests the weight of the U.S. dollar in China's RMB exchange rate basket is trending lower, though it is still pegged overwhelmingly to the dollar. Between 1999 and June 2005, policymakers pegged the RMB 100 percent to the U.S. dollar. But after 2005, the RMB basket broadened slightly from the dollar as China began to accumulate a larger share of reserves denominated in other currencies. On average since 2005, China has pegged the RMB to the Singapore dollar at 6.5 percent, the euro at 2.4 percent, and the yen and Australian dollar at 1 percent each. The British pound does not feature significantly in China's exchange rate basket. Despite this diversification in the exchange rate basket, the RMB still remains more than 90 percent pegged to the U.S. dollar, even through the RMB's crawling period of appreciation.

Despite the risks and China's grievances with U.S. fiscal policy politics and expansionary monetary policy, it is understandable why China's policymakers would not seek to stray too far from the dollar anchor. In addition to playing a central role in China's overall economic growth model, the reality is that the choices for alternative international hard currencies—namely, the euro—are less appealing. This is partly because of systemic inertia and partly because both political and economic confidence factor heavily into the choice of international reserve currencies.[59] Over the longer term, China's leaders aim to see the RMB play a more pivotal role in international finance—the offshore trading of financial assets, borrowing, and lending denominated in RMB. The path to this goal poses a number of formidable obstacles. Most notably, the lack of transparency in monetary policymaking, the rule of law in China, and China's structurally higher inflation and inflation uncertainty are likely to hinder China's goal to promote the international role of the RMB. But key market segments such as trade financing will develop rapidly in RMB-denominated assets. In fact, the majority of the steps taken so far toward capital account opening in the Shanghai Pilot Free Trade Zone aim to develop demand for offshore RMB use in this way.[60]

Increased offshore use of the RMB through trade finance letters of credit is a positive step toward recycling capital from China's economy back out into the global economy. More money flowing out will put downward pressure on China's current account surplus, though the PBOC and regulators will need to keep a careful eye on this area of credit notorious for creating credit bubbles. It is common that the collateral on which these financial obligations are made is actually nonexistent or already pledged as collateral to other counterparties. Additionally, trade finance often provides a vehicle for capital flight and international tax avoidance through the deliberately incorrect invoicing of trade transactions.[61]

In July 2014, Brazil, Russia, India, China, and South Africa launched the New Development Bank, also known as the BRICS Bank after the group of founding countries, to provide development financing—like the World Bank and other multilateral development banks. This is a positive step toward recycling China's surpluses back out into the world to be put to use where much investment is needed to boost demand, generate employment and productivity growth, and raise living standards across the developing world. However, the BRICS Bank will also—like the IMF—provide contingent credit facilities for emergency responses to exchange market pressure. The motivation to seek alternative institutions for the management of financial risks in international foreign exchange markets signals clear disaffection with the existing arrangements of international monetary relations in China.[62]

While the RMB's market segment as an international currency will certainly grow in trade finance, it is a small share of the overall pie. China's two-way share of the international trade finance market amounted to $11 billion in 2013, compared with an estimated global market of $11.5 trillion.[63] As global foreign exchange trading grew to more than $5.3 trillion per day in 2013 from $1.5 trillion in 1998, the share of this overall trading in U.S. dollars held steady at 87 percent and has been increasing since the start of the U.S. and global economic recovery, according to the most recent Bank for International Settlements data.[64]

Given the expected time horizon for achieving capital account convertibility and the substantial means at policymakers' disposal for managing the exchange rate, the current system will be in force for some time. What is less certain is whether the RMB exchange rate will go up or down once China opens. Economic models notoriously fail at predicting exchange rate movements, which may stray far from expected equilibrium values over long periods of time.[65] Although the level of the RMB exchange rate today remains undervalued, history shows that market forces may not necessarily drive it up. The future direction of the RMB will be determined by the net balance of two-way capital flows and the stability of the ensuing financial integration, as discussed below, and this could well be in the wrong direction for rebalancing.

Financial reform versus financial stability and rebalancing

China's choice of a fixed exchange rate with macroeconomic policy autonomy has been part and parcel of its economic development success. But it also clearly distorts prices for capital and other inputs, as well as real incomes, by suppressing the returns to labor relative to the returns to capital and by inducing a higher-than-normal inflation rate.[66] In particular, the mispricing of capital has grossly distorted China's pattern of investment and has conveyed a disequalizing effect on the country's wealth distribution.[67] With nearly 50 percent of China's gross domestic product devoted to investment, not all of this investment is going to be productive. Economists Il Houng Lee, Murtaza Syed, and Liu Xueyan estimate that distortions in China's financial system culminate in a total resource transfer to favored industries from households and small and medium-sized enterprises, and other unprivileged sectors amount to 4 percent of GDP, or an estimated $585 billion in 2013.[68] This situation can go on for some time, though the longer leaders prolong change, the steeper the costs of not changing will be.

But it does not necessarily follow that opening and floating will lead to better pricing, allocation, or systemic stability outcomes. The world in which China's leaders are making policy is second best—a situation that economists identify as one in which introducing more marketization where market failures already exist can create even worse outcomes.[69] Paradoxically, the solution often lies in introducing other interventions. The changes in the gross flows of capital in and out of China—how productively that capital is used and the associated income flows—will determine the future path of the exchange rate and therefore the competitiveness of China's domestic producers relative to other producers in global markets, as well as the value of the real assets that underlie the webs of financial positions integrated across the global financial system.

After decades of growth, a tremendous stock of capital is pent up inside China's before-now closed financial system. Limited in the instruments to save and store wealth and with profits made from earlier investments in China's development, big shares of capital are waiting to flow out of the country. Certainly, many investors

will be equally eager to get a foot in the door of China's investment market, propelled forward not just by the track record of extraordinary gains but by the expectations of potentially larger gains in the future as China progresses with economic reform.

Federal Reserve Bank of St. Louis economist Yi Wen estimates that opening the current account will unleash torrents of capital outflows from China as wealth holders seek to diversify their portfolios out of renminbi assets, leading to a "significant depreciation" of the exchange rate.[70] Separate research from the International Monetary Fund came to the same conclusion, finding that net outflows would amount to between 11 percent and 18 percent of GDP, or about $1.6 trillion, from both China's bond and equity markets.[71] These results provide a cautionary tale that opening the capital account may not necessarily work in favor of adjusting China's exchange rate to ease its current account surplus.

Notably, China's economists are not unified in this plan to implement capital account convertibility. Yu Yongding of the Chinese Academy of Social Sciences, among a group of esteemed international economists, recommended that leaders maintain active management of cross-border capital flows.[72] In a 2013 speech, economist Lin enumerated a list of reasons why he opposes capital account opening.[73]

The broader economics research resoundingly shows no economic growth benefits from widespread capital account liberalization but does show severe potential economic risks. Economists Olivier Jeanne, Arvind Subramanian, and John Williamson surveyed the empirical evidence and concluded that "free capital mobility seems to have little benefit in terms of long run growth."[74] Capital account opening is associated with increased frequencies of banking crises and twin banking and financial crises across a broad range of countries.[75] What's more, capital account opening is associated with sharp rises in income and wealth inequality within countries, which adds to the distributional problems in China's financial imbalances.[76] Financial crises compound the rise in inequality, as the wealthy tend to have access to more ways to ride out the storm. But the rise occurs both in capital-opening countries that experience crises and those that do not.

Economic history shows that financial opening follows a rather predictable cycle of speculation-led economic boom, bubble, and bust—a process already underway in China.[77] Opening provides the opportunity for domestic companies and financial institutions to increase their overseas and foreign-currency-denominated borrowing. Foreign borrowing incurs additional financial risks of exchange rate movements

and often does not match the time horizon over which an investment yields returns and a loan or bond matures. This makes such borrowing a key ingredient in most international financial crises. It is easy to imagine such foreign liabilities piling up quickly in China—particularly in an environment where regulators will be straining to keep up with the pace of innovation as China imports and adapts the same kind of complex financial instruments, trading practices, and cozy relations with regulators that were pioneered by Western financial institutions. Such foreign risk exposures feature prominently in creating conditions ripe for financial instability in crisis after crisis.[78]

Corporate governance and investment misallocation problems already exist in China, resulting in a formidable pile of nonperforming real fixed and financial assets. China's existing stock of nonperforming assets—as well as those likely to become nonperforming as growth moderates—creates fragile financial conditions in China's economy. China's policymakers will be challenged to maintain prudential regulation of the system—prevention of fraud, protection of investor rights, and maintenance of a stable, transparent financial system. Adding to this challenge is China's evolving shadow-banking industry—the group of trusts, hedge funds, private wealth management, and other nonbank financial institutions that operate outside the purview of bank and market financial regulators that regulators already strain to manage.

Already, China's local governments alone have racked up more than $3 trillion in debts through such channels.[79] Being able to prudently regulate these emerging areas of China's financial system is central to achieving both China's inflation goals and to maintaining systemic stability to ensure that financial institutions do not expand credit in unhealthy ways. Reforms in this area are complicated by the conflicts of interest apparent when policymakers are simultaneously the owner, regulator, and policymaker in the financial arena. As financial institutions in China learn to adapt and innovate financial practices, they will expand lending across the financial system—and with an even more explicit guarantee of sovereign backing than in other countries that have recently undergone bank bailouts and restructurings. These guarantees create the potential for moral hazard problems—unscrupulous lending made with the expectation of a publicly financed bailout—on an unprecedented scale.

China holds some $4 trillion of foreign exchange reserves and enjoys low foreign borrowing exposure and current account surpluses today.[80] While international capital flows into and out of China's economy and gross total of capital inflows and outflows will surely rise, the evidence suggests that the net effect of these flows will be substantial outflows. What we do know is that not all of China's $4 trillion

reserve holdings are in readily transferable assets. Political scientist Victor Shih of the University of California, San Diego, estimates that monetary policymakers could weather a good bit of exchange rate pressure from outflows for a while. But eventually, policymakers managing the exchange rate and foreign reserves would draw down to where the remaining assets—though denominated by U.S. dollar or another hard currency—are in shares and bonds issued by Chinese institutions in offshore markets, comprising roughly one-third of all reserve assets, according to estimates from Shih.[81]

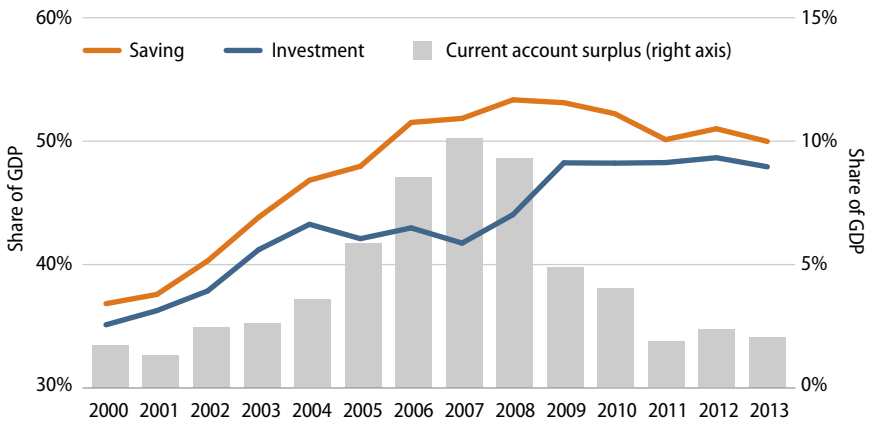
Even though there appears to be a lot of reserves on hand for China, the IMF estimates of plausible net capital outflows could bring China's reserve holdings down near this fuzzy threshold identified by Shih. Of course, the balance of net flows presents just the tip of the iceberg in terms of systemic risks in deals where short-term debt is used to finance projects with long-term expected returns or where income is earned in different currencies than that in which debt payments are due. Given the speed with which capital flows can stop and reverse, often due to global conditions outside the economy, balancing international capital flows and avoiding the risk of financial fragility will only be achieved through rigorous prudential regulation. For China's regulators, this will be a race to develop regulatory and corporate governance standards at least as fast as an opening financial system can increase financial leverage across the economy.

While financial risks certainly pose concerns for China's economy, the reality is that opening alone will not solve the problems that underlie China's multiple imbalances—nor does liberalization mean that China's financial system will set interest rates on a market basis through open price discovery.

Recommendations: How China can rebalance

FIGURE 4

International rebalancing calls for raising domestic demand



Source: Author's analysis of data from International Monetary Fund, "World Economic Outlook Database," available at http://www.imf.org/external/pubs/ft/weo/2014/01/weodata/index.aspx (last accessed July 2014)

Figure 4 illustrates that the gap between national savings and investment drives China's international economic imbalances. By accounting identity, these measures of the savings-investment gap and the current account balance will be equal, but policymakers can move saving relative to investment in a number of ways. China's economy has shown rebalancing since the start of the global economic recovery, though some of this adjustment can be attributed to short-term factors. China's current account surplus shrunk not because China was structurally rebalancing but because investment ramped up with stimulus spending, the rapid credit expansion in China's formal and shadow-banking systems, and the construction-bubble-fueled rise in global commodity prices.[82] This mode of growth is symbiotic with widening income and wealth inequality within China, and—as economists from Zhejiang University and the Chinese University of Hong Kong have warned—present the central barrier to market-oriented economic rebalancing.[83]

Such longer-term structural factors drive imbalances in China's economy that result in its domestic and international financial positions: persistently selling more goods and services to the world than it buys and undervaluing the exchange rate. In order to change this equation, China's leaders must first tackle the structural roots of China's unbalanced economy in the financial sector and the wider economy and society that affect incomes and savings of households critical to shifting growth toward China's domestic economy. Both Chinese policymakers and other global leaders can take concrete steps to shepherd China along the path to the economic rebalancing and reform necessary for it to continue developing and deepening integration into the world economy. These steps are discussed in the following sections.

Building China's foundation for inclusive growth

China needs to grow more inclusively to bring down saving rates and increase domestic consumption with greater financial security and more broadly inclusive income growth. Specifically, China needs to move quickly to build a comprehensive set of social insurance programs, which are now necessary in the more flexible economy. These programs will prevent people from getting caught in the gears of the economy's creative destruction, shift toward a more progressive tax structure, and accelerate reform to integrate migrant populations into the economic mainstream. By building institutions needed to strengthen and broaden China's middle class, China will bring down precautionary saving rates while maintaining the growth needed by raising disposable incomes and quality of life to fulfill China's transition to a domestic, demand-led growth model. Notably, China's policymakers are taking steps to implement a deposit insurance system much like the Federal Deposit Insurance Corporation, or FDIC, in the United States, though most savers already presume an implicit state guarantee. Finally, Chinese leaders can kill two birds with one stone by transforming overinvested private housing into social housing—a key priority for domestic and social rebalancing.

Prioritizing corporate governance reform

Corporate governance reform in China's state-owned financial institutions and state-owned enterprises should outpace financial opening. This is important for two reasons. First, it is a necessary condition for instituting a decisive role of the market. Second, China's bankers and financial regulators need to be ready to receive and direct capital inflows to productive uses that do not leave China's economy fragile to sudden stops or reversals of capital flows that could jeopardize China's growth successes. Reforming corporate governance is not only a necessary condition—economically speaking—of the market taking a leading role, but it is also critical for leaders to ensure they do not replicate the financial mistakes of the past as policies move the focus for investment to China's west and overseas.

Rebalancing global exchange rates

Bilateral negotiations with the United States and multilateral efforts through the G20 to get China—and other countries—to realign undervalued exchange rates have yielded little progress. Talk, it seems, is insufficient when bargaining is not matched with credible promises to take countervailing measures. Policymakers in the United States and other G20 countries should explore domestic measures for adjudicating trade remedies for distorted exchange rates and bringing exchange rate issues into international agreements on trade and investment.

China should forestall speculative expectations and move to raise its exchange rate against the U.S. dollar while also moving to an exchange rate regime built around a broader basket of countries than just the United States. For example, China could peg to a trade-weighted average of G20 country exchange rates or, theoretically, to an international currency. The United States, China, and other G20 member countries should open discussions on updating multilateral institutions for monetary relations before more fragmentation of the multilateral system, like that which occurred with the BRICS Bank, develops.

Setting a high standard for China's reform efforts and global commercial norms the United States and other countries must build an alliance for a high road to global integration based on open, transparent competition in the commercial marketplace that strengthens social inclusivity and deepens overall human development. Engagement should insist on widespread implementation of best practices in corporate governance, international accounting, and financial reporting standards, as well as a social protection agenda that encompasses labor rights, environmental sustainability, and community stakeholder engagement.[84]

The jury is still out on China's gradual experimentation with private financial institutions, but old issues of ensuring standards of national treatment and commercial cyberspying will be joined by an array of new issues in the openness of new payment systems and data and consumer privacy. China's policymakers are smart to approach this move on the principle that institutions should operate with incentives to align owners' incentives with prudent performance, while insulating the public from the costs of individual insolvencies.

Conclusion

China's leaders need to pursue reforms simultaneously on multiple fronts, many steps of which will be difficult to discern from the outside. In order to distinguish between real progress in China's existing, distorted financial system and superficial reforms that build seemingly impressive but actually lacking markets in China, China watchers should focus on several specific outcomes indicative of meaningful change:

- For the financial system to redirect new investment flows away from industries and localities already rife with overinvestment and high environmental costs toward productive, sustainable investment
- For the financial system to expand credit to small and medium-sized enterprises
- For regulators to contain the risks of China's too-big-to-fail systemically important financial institutions
- For policymakers to build social institutions that ease the financial squeeze on households, lowering savings and expanding domestic consumption

China is making progress on some of these reforms, but Beijing would benefit from moving faster and further in other areas critical to solving China's investment-allocation and efficiency problems. Progress and direction of reform remains less certain in corporate governance issues, transparency, and issues of regulation and regulatory capture, but two things are clear. First, getting financial reform right is critical to China's and to the world's economic future. Second, the problems facing China's financial reforms will not be solved by opening and floating alone but through deeper social changes that can only come if China's leaders make hard political choices and if China's global partners drive hard political bargains.

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