China Trip Report

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April 2005

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We spent almost two weeks in China in mid-March. Nothing quite substitutes for on-the-ground impressions, but at the same time, nothing provides an impetus to read widely like a trip. Our perceptions were shaped by our priors, by the reading we did in anticipation of the trip, and by the set of people who we spoke to. Unlike luminaries like Stephen Roach, we did not talk to the top echelon of China's leadership. Rather, we conversed with policy makers a couple of steps below the leadership, academics close to policy circles and financial market practitioners.

We learned a lot, but we did not find the Rosetta stone of renminbi revaluation either. We did hear many echo the themes that Guo Shuqing, the outgoing head of China's State Administration of Foreign Exchange, laid out in a March speech. Large trade surpluses, rapid export growth, large FDI inflows and large reserve increases are not always signs of economic health. China's economic expansion is increasingly unbalanced, with too much investment in already prosperous coastal regions and too little in the interior. The next stage of China's economic miracle will need to focus on developing domestic consumption, not just exports and investment.

This report tries to synthesize our impressions. Among other things, it touches on:

- The impact of the renminbi peg on monetary policy
- The management of China's reserve portfolio
- The internal tensions associated with a policy that over-emphasizes foreign direct investment and exports
- The possibility of a revaluation, and the debate over the appropriate size of the initial revaluation
- The health of the banking system
- Internal distortions created by controlled prices for credit, fuel and the Communist party's de facto monopoly on land use
- The possibility that China's policy toward FDI might change, with less emphasis placed on attracting FDI and more emphasis on using surplus Chinese savings to expand the overseas presence of Chinese firms.

It is clear that China's economic expansion continues at a very strong pace. It also clear that the expansion is still being fueled by the expansion of the already red hot export sector, and by continued growth in investment – raising real questions about the possible build-up of an investment bubble. An imbalanced global economy is matched, in our view, by an unbalanced domestic Chinese economy.

Evolving views on foreign exchange reserve accumulation

Trade surpluses, along with rising foreign exchange reserves, were once considered to be pure positives, signs of China's economic dynamism and evidence that China's economy rested on firmer footing than other Asian tigers. But the sheer scale of China's reserve accumulation and the difficulties managing those reserves are leading views to evolve.

Several Chinese economists noted that at some point in the middle of 2004, Chinese policy makers started to recognize that rapid reserve accumulation is making it more difficult to manage China's economy. Obviously, growing recognition of the cost of rapid reserve accumulation has not translated into a willingness to make the policy changes needed to slow China's reserve accumulation – but we suspect that, under the surface, views are in the process of changing.

Academic economists and policy makers alike are quite cognizant that the central bank will take capital losses on its dollar and euro reserves in the event of a revaluation. The use of these dollar assets to recapitalize the state owned banks, if nothing else, has forced policy makers to consider how a revaluation would impact the commercial banks' balance sheet. The renminbi value of the state banks' capital (now denominated in dollars) would fall, while the renminbi value of their assets and liabilities (mostly renminbi denominated loans and deposits) would remain constant. The net result: a fall in the bank capital to assets ratio. Some western economists who follow China think the government has promised the state banks that it will make up for any renminbi losses in the event of a change in the exchange rate. Chinese officials are certainly aware that a revaluation will have an even larger impact on the central bank's balance sheet, given its larger dollar holdings and its offsetting renminbi liabilities.¹

Inflation, Sterilization and Money Growth

Chinese academics – and no doubt the Central Bank as well, though we did not speak directly with the most key people at the PBOC – recognize that the current exchange rate peg constraints their monetary policy options. Many noted that any increase in interest rates would increase the incentive for hot money to flow into China, and if that inflow was not perfectly sterilized, it would expand the monetary base – preventing the desired tightening in monetary conditions.

There is clearly growing concern that rapid reserve growth is making it more difficult for the People's Bank of China to conduct monetary policy. It is true that inflation subsided over the course of 2004, helped by a strong harvest that kept food prices tame, controls on the prices of fuel and utilities, and the addition of lots of new capacity in the steel and auto industry. Auto prices are heading down, and steel imports (if not prices) are clearly falling.

This has not eliminated concerns – at least in the academic and central banking world --that a new round of inflationary pressure could be building. Reserves grew exceptionally
rapidly in the fourth quarter, and, while the pace of reserve growth abated somewhat in
Q1:2005, it is still well above the roughly \$40 billion per quarter pace seen during the
first three quarters of 2004.²

¹ See Roubini and Setser "Will the Bretton Woods 2 Regime Unravel Soon: The Risk of a Hard Landing" (2005) (http://www.stern.nyu.edu/globalmacro/BW2-Unraveling-Roubini-Setser.pdf) for estimates of the PBoC's potential capital losses.

² Reserves rose from \$403 billion at the end of 2003 to \$514.5 billion at the end of Q3, before surging to \$610 billion during Q4. They rose another \$50 billion in Q1 2005. Valuation changes added to China's

Moreover, fiscal policy may become more stimulative, increasing the pressure on monetary policy. Tax revenues significantly exceeded expectations in 2004. The government's fiscal surplus was kept on deposit until December, helping to limit overall money growth. However, a burst of spending at the very end of the year led to a big fall in government deposits at the central bank.³

The central bank offset the surge in spending (and fall in government deposits) by stepping up the issuance of sterilization paper in December. Overall, the stock of sterilization paper increased by 300% in 2004, rising from 303 RMB billion to 1108 RMB billion. But this increase still did not come close to fully offsetting the impact of reserve growth.⁴ Foreign assets on the PBOC balance sheet rose by almost RMB 1.6 trillion – more than two times the RMB 0.8 trillion increase in sterilization bonds.

No one explicitly raised this concern, but looking ahead, the central bank no doubt is asking how it will be able to sterilize another \$250 billion plus in reserve growth this year. Sterilization paper is only one of many potential tools the central bank can use – but even if the central bank deploys all its tools, including higher mandatory reserve requirement, there is clearly a risk that it may exhaust its capacity to sterilize continued large inflows.

The World Bank recently raised a separate concern – a concern that we did not hear while in China. Forcing the state banks to absorb sterilization bonds that pay very little – now a bit under 3% nominal, or 0% real –keeps the government's sterilization costs down, but at the cost of weakening the balance sheet of the state-owned banks over time. The long-term costs of using the state banks as a vehicle for below market sterilization can be considered one cost of further reserve accumulation.

These costs are growing. Right now, the government is not having difficulty selling its sterilization bonds: lending growth has been constrained by administrative controls, while deposit growth continues, fueled in part by ongoing external inflows. The net result: the banks have plenty of cash and are holding more reserves than the PBoC requires. Since the PBoC only pays 1% on its excess reserves, the banks have a strong incentive to invest in PBoC paper. Demand from the liquidity-rich banking system drives down the PBoC's sterilization costs, but it also drives down the bank's revenues – making it harder for the banks to recapitalize themselves out of ongoing profits.⁵ PBoC paper pays about the

reserve accumulation in Q4, and reduced China's reserve accumulation in Q1. We estimate that the underlying rate of reserve growth slowed more modestly that the headline numbers suggest. The underlying pace of reserve accumulation was around \$85 billion a quarter in Q4 and \$55 billion in Q1.

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Government deposits at the central bank fell from RMB 897 billion at the end of O3 to RMB 583 billion at the end of the year; the November to December fall was even more pronounced.

⁴ Standard Chartered estimates that only 36% of the 2004 reserve increase was sterilized. That estimate probably understates total sterilization, as it is based on the transparent auctions of PBoC bills (\$62 billion), the PBoC's intervention in the repo market (\$12 billion) and bond sales (\$1 billion); direct placements of PBoC paper with state banks were not included. The reported increase in the stock of PBoC bonds (\$97 billion) exceeded the amount auctioned, which the PBoC placed some bonds directly with the state banks.

⁵ See Stephen Green, Standard and Chartered Bank, China Money Monitor, April 2005.

same as the banks pay on their deposits. Concerns about bank profitability may emerge as a bigger constraint on the PBoC's capacity to sterilize reserve inflows than an absence of sufficient demand.

In effect, strict administrative controls on lending have freed up liquidity that the banks are investing in PBoC paper, keeping the PBoC's sterilization costs down. However, we doubt this "sweet" spot for the PBoC is sustainable.

Reserve Management

The Chinese clearly are thinking long and hard about the right composition of the reserve portfolio. Managing \$610 billion (now \$660 billion) tend to force your hand. While the interest rate on the PBoC's sterilization bonds is still relatively low, the PBoC's costs are rising along with the rising stock of sterilization bonds. China clearly wants to earn enough on its reserves to offset its sterilization costs – and ideally, to turn a hefty profit.

China's central bank – we assume, based on the US data -- has already diversified across asset classes, if not currencies. They clearly have been buying more than just US Treasuries (the SAFE is widely reported to be very active in the Agency market, and in the mortgage backed security market as well). The Chinese are considering broadening their portfolio to include equities, along with the pros and cons of swapping their stockpile of dollars for a stockpile of oil. That makes sense some sense: China, unlike the US, does not have a strategic petroleum reserve. But China also has to worry about buying oil (or other non-dollar assets, like euro) at the peak of the market – and the risks that adding demand to the market to build a stockpile right now would further boost the price of oil.

Growing criticism of China's export led growth model, and subsidizing foreign direct investment

China's economic growth model has relied heavily on FDI to build a productive capacity base, along with a weak currency to create foreign demand for the Chinese goods and provide an incentive for foreign firms to locate production in China. Foreign investment is small relative to total investment to be sure, but there is little doubt that foreign investment has played a larger role in China's development than in the development of

⁶ Stephen Green of Standard Chartered estimates interest payments on PBoC's sterilization bills and repo operations will triple in 2005, rising from RMB 21.5 billion/ \$ 2.6 billion to over RMB 60 billion/ \$7.5 billion.

⁷ UBS estimates that the PBoC netted \$15 billion on its reserves in 2004. That works out to about 3% on an average holdings of around \$500 billion, though actual earnings would be need to be a bit higher to offset the cost of the PBoC's sterilization bonds/ repo bonds. Stephen Green and Tai Hui estimates that sterilization cost the PBoC \$2.6 billion in 2004, and earned interest income of between \$11-18 billion on its reserve portfolio (depending on the composition of its reserve portfolio), for a net profit of between \$8.4 and \$15.4 billion. See Stephen Green and Tai Hui, Standard Chartered, "On the Ground – China," 29 March 2005.

⁸ See Morris Goldstein and Nicholas Lardy "What Kind of Landing for the Chinese Economy? PB04-7, Institute for International Economics, November 2004.

other high-savings economies in Northeast Asia, notably Korea and Japan. The rapid expansion of the export sector has pulled labor out of rural areas into urban areas.

Proponents of the "Bretton Woods two" hypothesis argue this growth model is stable and will last until the hundreds of millions of poor and poorly employed rural workers are absorbed in the modern sector. Our conversations, however, suggested that this growth model is being reconsidered even now by many senior Chinese officials and economists. They highlighted that the growth model was creating a number of different imbalances inside China, including:

<u>Regional</u> imbalances. Foreign investment tends to be geared toward producing for external markets, and naturally tends to cluster on China's coast. Coastal cities have good transportation links to the world, but not necessarily good transportation linkages to China's interior (China's own version of the inter-state system, now under construction, may help). Consequently, foreign investment and rapid export growth tends to widen the economic divide between the coast and interior, and add to rather than subtract from income equality. The new leadership cares about distribution as well as growth, in part because it worries about the political consequences of rising inequality.

<u>Sectoral</u> imbalances. The export sector is booming, along with the real estate/housing sector. Many other sectors of the economy, including the service sectors, still lag. These imbalances in turn can give rise to <u>distributional</u> issues even within booming regions. Rising housing prices are a double-edged sword: some make a killing while others are priced out of the market. Real estate profits – including the profits that flow back to the communist party (see below) -- add enormously to expanding income and wealth differentials.

<u>Financial</u> imbalances. Rapid reserve accumulation feeds rapid credit growth, asset price bubbles especially in the real estate sector and overinvestment in real estate and export sectors, adding to the sectoral imbalances. In the face of concerns that rapid credit expansion was leading the economy to overheat, the authorities have relied on administrative and quantitative controls on credit rather than on prices, such as changes in the interest rates. The short term interest rate was increased by only 27 basis points in 2004, a risible amount for an economy growing as fast as China. The unwillingness to use the interest rate as a tool of macroeconomic management is in part due to the constraints coming from the peg: any increase in interest rates risks generating further capital inflows from abroad, inflows that would add to the liquidity in the system if they are not sterilized. But the authorities' reluctance also stems from concerns about the balance sheet of the banking system. Higher interest rate increases would lead to sharp losses on the banks' portfolio of fixed-rate longer term government debt. The spread the banks earn on their existing loan portfolio would also fall, though presumably many of these loans carry an adjustable rate.

China's current growth model also creates an imbalance on China's external balance sheet. FDI comes to China in search of a return of 15% or more. But China has more than enough savings of its own to finance a very high level of investment, so foreign

funds invested in China end up in the PBoC's reserves earning something like 4%, maybe a bit more, maybe a bit less.

For Dooley, Garber and Folkerts-Landau, this is just a total return swap: China's reserves are the collateral China has to post to attract FDI. FDI inflows have to be offset by reserve outflows, and to keep sufficient collateral on hand to match the rising value of the FDI, China has to run ongoing trade surpluses.

However, we did not hear anyone in China extol the virtues this kind of swap, or argue that China needed to hold reserves to encourage FDI inflows. We did hear internal critics of the current peg question whether a swap where China pays "15%" and gets "4%" is in China's interest (particularly since the value of China's low-yielding reserves will fall in the event of a revaluation, while the value of foreign direct investment will rise – at least foreign direct investment outside the export sector). China of course likes the technology transfer that comes with foreign investment. But in standard labor-intensive manufacturing sectors, China hardly needs the technology transfer.

The argument that China is subsidizing foreign investors too heavily goes beyond the exchange rate. Several Chinese economists argued China should not be offering as large a set of tax incentives – such as the 15% rate for the enterprise income tax for FDI firms compared to the 33% rate for domestic firms - to encourage foreign investment in China.

More generally, Chinese economists critical of the peg argue that the current renminbi peg is generating an unbalanced Chinese economy: a country that invests too much and consumes too little; a continental economy that is too exposed to the global macroeconomic cycle; an economy marked by too stark a divide between the prosperous coast with good transportation and financial links to the world, and an underdeveloped (and often under-educated) interior.

Trade

Some in China worry that a revaluation would slow export growth and, thus employment growth. But some also worry that a revaluation would not slow export growth much, given relatively low labor costs in China. There is concern that a revaluation might not do much to eliminate the tensions that come with China's large bilateral trade surplus with the US.

So far, talk of reducing China's dependence on foreign markets remains just that -- talk. Exports grew 35% y/y in January, February and March, while import growth slowed. Even if export growth slows a bit and import growth picks up a bit, China's trade surplus looks set to balloon. Given the seasonality in China's trade, a trade surplus of \$15 billion in the first quarter translates into an annual trade surplus of around \$100 – up from \$30 billion in 2004.

Recent UBS analysis suggests that the rapid expansion of China's trade surplus is not primarily the product of surging textile exports. Rather, it stems from the vast expansion

of China's steel and chemical production capacity. Intermediate goods that were imported in 2004 are now being exported. A vast rise in steel capacity coincided with a modest slowdown in the real estate construction (a slowdown from an exceptionally high pace of growth), creating, at least for now, more steel capacity than is needed to satisfy even a rapidly growing Chinese market.

Views on the type and timing of a currency regime adjustment

Going to China, we thought that a likely policy outcome was a Chinese version of the two-step. A small revaluation (perhaps disguised as a widening of the trading band around the renminbi, and perhaps combined with a move toward a basket peg) in 2005 that would fail to alter the basic market dynamics. However, a small revaluation would not slow China's reserve accumulation, as investors would still bet on further appreciation. By 2006, China would recognize the need for a larger move. That probably still is a possible outcome, given committee-policy making and the caution of China's leadership.

But we also found a growing recognition, at least at the technical level, that a small change in the renminbi exchange rate would not work. A number of Chinese economists - including economists with links to China's central bank - think that China may already have as many (if not more) reserves than it really needs. They also recognize that a small step adjustment of the currency – say 3, 5 or even 7% - would not be effective. It would not change trade flows much, it would not solve the trade policy frictions with the US, and it would not slow speculative capital inflows/ slow reserve accumulation/ make the PBoC's job easier. Many in policy circles recognize that a larger move could well be necessary.

However, policy is ultimately set by the engineers on the State Council, not by economic technocrats. The People's Bank of China and the Finance Ministry are but two voices among many. Exporting, and other, interests – such as FDI firms - also have a voice. Policy by committee creates built-in pressure for compromise.

Moving preemptively is always hard, particularly since China's "exchange rate peg" is part of a broader policy approach that has worked – in a sense – macro-wise and growth-wise to date. Engineers like to quantify everything. No doubt there is lots of technical work going on trying to estimate the impact of a revaluation on China's export growth, employment growth and other variables. The perception that the current system if not helping China is probably stronger in economic circles then in engineering circles – but even the engineers may soon start to grasp the costs of the current peg regime.

China has long argued that it has a plan to liberalize its financial and exchange controls and gradually loosen the peg over a medium-term horizon. This plan envisioned a carefully sequenced set of reforms. China would take steps: to recapitalize the domestic financial and banking system; to liberalize domestic capital markets (at least partially), liberalize certain exchange controls to augment demand for foreign assets (that would generate more two way flows and reduce the need for the PBoC to intervene to keep

China's current account surplus and FDI inflows from creating pressure for appreciation); allow more "onshore" foreign exchange trading; to create hedging instruments to help allow firms and financial institutions manage the currency risk that would accompany more flexibility. It would only adjust the peg after all these steps were well under way.

However, this medium term timeline increasingly appears to be neither politically nor economically feasible. The financial costs of the reserve accumulation are mounting on the back of rising reserve accumulation, which looks set to exceed \$250 billion in 2005. US pressure to move faster is in anything growing even faster than China's reserves. Many – even if not all - of the technical steps required for a more flexible exchange rate regime have been taken. Many local economists believe the effects of a 15% revaluation on exports, growth and employment would all be manageable.

Remember, Chinese firms that sell to Europe already have plenty of experience managing exchange rate volatility. China's real exchange rate was not been stable over time: it rose until 2002 along with the dollar, and subsequently has fallen. A 15% revaluation against the dollar do little more than bring China's real exchange rate back to its 2002 level.

Both Chinese central bankers and academic economists supported a revaluation even prior to the increase in US pressure: the key constraint came from above. US pressure on China clearly has grown since our trip. Its impact is hard to gauge. On one level, China's leadership no more wants to "reward" the US administration for publicly pressuring China than it wants to reward currency speculators. On the other hand, China so far has not taken advantage of moments of relative calm to move. To the extent that the threat of tariffs leads China's export industries to conclude that a revaluation is in their interest, external pressure might well provide the impetus needed for Chinese policy makers to coalesce around the need to change.

We suspect that China was planning to move later this year in any case, and we doubt that US pressure will lead China to delay a move that is in many ways far more in China's short-term interest than in the United States' short-term interest. There is no doubt that the most senior policy level in China is increasingly frustrated at the US. They openly argue that the US blames China for problems that are fundamentally made in America, and stem from the combination of fiscal deficits and low private savings.

A senior Chinese policy maker argued that if the US would do its part – code for fiscal adjustment – China would be willing to do its part, code for exchange rate adjustment. But he also argued that the "alternative" – i.e. China moving alone – might be "be much worse." That presumably was an indirect reference to the risk that a sharp reduction in Chinese reserve accumulation would make it much harder for the US to finance its external deficit, and could trigger a sharp increase in US rates.

China has an incentive to use the United States' unwillingness to move its fiscal policy as an explanation (or excuse?) for its failure to move its exchange rate at international meetings that focus on global imbalances, just as the US has a incentive to blame China's

peg for the loss of domestic manufacturing jobs/ the growing trade deficit. But Chinese policy makers do seem to be concerned about the global implications of any unilateral move not combined with a broader set of policy changes aimed at reducing global imbalances.

Real Estate

Chinese policy makers and academics showed less concern about a real estate bubble than we expected, though foreign "speculation" in property is clearly a concern. At the time, there seemed to be a sense that the central bank has been able to reign in the construction sector, and perhaps also a sense that China's growing urban population with rising standards of living will generate nearly inexhaustible demand for housing. Foreign observers seemed far more concerned than the Chinese.

This confidence struck us as a bit misplaced: the most recent GDP data confirm that investment is still growing faster than GDP and a large fraction of such investment is in real estate. Property prices in Shanghai were not low at the end of 2003, and they rose another 19% during the course of 2004. Administrative controls – higher required down-payments, limits on real estate lending and taxes designed to deter real estate speculation - seem to have a had a very limited effect in the face of the strong impetus provided by cheap financing (in real terms), the development of consumer (mortgage) lending, and widespread popular interest in the urban real estate game. Anecdotes are only worth so much, but our tour guide in Chongqing was very informed about recent increases in the per square meter price of urban Chongqing real estate.

The recent real estate boom (bubble?) in China has clearly been fueled in part by the loose monetary conditions associated with the peg – but that is not the entire story either. As we will discuss later, the communist party's control of both land and credit creates strong structural incentives for corruption, and gives the party a large direct stake in the real estate market.

Banking sector

Banks matter in China. Banking deposits are the dominant form of savings. M2 is 190% of GDP, an amazing ratio for an emerging economy. At the end of 2004, bank lending stood at around 140% of GDP, and the bank deposit base was 185% of GDP. Bond market capitalization is only \$300 billion, about 20% of GDP, and equity market capitalization of around \$150 billion, less than 10% of GDP.

Government bonds dominate the bond market. Equity markets are poorly regulated, state owned enterprises make up most of the listings (the majority of shares in these firms do not trade) and the stock market has, at least recently, provided negative returns. Consequently, most domestic investment is financed either by the banks or from retained

⁹ Andy Mukherjee "Greenspan Misses the Point About Yuan," Bloomberg News, Apr 26, 2005

earnings. We estimate that bank lending provided \$220 billion in new financing in 2004; down from maybe \$360 billion in 2003. By comparison, corporations raised only \$4.5 billion in the bond market and \$16 billion from the sale of "A" shares on the Shanghai and Shengzen exchanges.

Just to put the \$580 billion in new bank lending over the course of 2003 and 2004 in perspective, that is roughly two times the market capitalization of the EMBI, the leading index of dollar-denominated emerging market bonds.

The big four state commercial banks hold roughly 60% of the systems' deposits and collectively control much of the allocation of commercial credit in the economy. Lending from the big four banks is equal to about 85% of GDP – they alone are far bigger than the total banking system of most other emerging economies.

China's banking system faces two broad sets of issues:

- 1) How to take the legacy of past "policy" based lending largely lending to loss-making state owned firms off the balance sheets of the state banks.
- 2) How to manage the current credit boom, and to avoid the creation of a new generation of loss-making loans.

To be honest, it is hard to tell how well China is doing on either front. We did not talk to the policy makers directly involved in bank restructuring, but we also did not get a sense that the problems have been effectively addressed either.

Estimates of the size of the "legacy" of bad loans on the books of the state banking system are enormous (see Table 1). Official estimates put the number at 45% of China's 2002 GDP (\$570 billion), informal estimates suggest a higher number (\$815 billion, or over 60% of 2002 GDP).

Not all these bad loans are on the banks' books. 1,400 billion RMB (\$168) billion in bad loans were taken off the banking system's books in 1999 and given to four asset management companies (AMCs). These asset management companies have sold some of their bad loans in the secondary market, and started to slowly work out others. But recovery rates on these loans have been low. Some early recovery rates were around 30 cents, but recovery rates on even the first batch of better loans fell to 15 to 20 cents on the dollar. The average recovery rates may end up being 10 cents on the dollar, or even less. Indeed, it is not obvious that recovery rates have been high enough to cover the investment companies' administrative costs. Ultimately, most of the \$168 billion will have to be made up by tax payers in one way or another.

But even after this transfer, the banking system still had an enormous number of non-performing loans. Official estimates put the number of bad loans in the big four state banks at around \$255 billion at the end of 2002. 10

There is little doubt that the banks' NPL ratio has been falling sharply, largely as a result of the enormous recent expansion of bank credit. Loans usually don't go bad immediately. By our calculations, loan growth alone is on track to reduce "legacy" NPLs from 27% of all "big four" loans to under 15% by the end of 2005, and to reduce total legacy in NPLs in the broader banking system from 25% of all loans to under 15%. Relative to GDP, the stock of legacy bad loans is also falling. Rapid GDP growth alone would reduce bad loans from 45% of GDP in 2002 to 32% of GDP at the end of 2005, and the stock of legacy bad loans in the big four from over 20% of GDP to under 15% of GDP by the end of 2005.

Table 1. Reduction in NPLs in the Chinese banking system as a result of loan growth

All banks, \$ billion

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	2002	2003	2004	2005
	1626.9	1989.1	2303.1	2604.9
performing loans	1225.1	1587.3	1901.2	2203.1
non-performing loans	401.8	401.8	401.8	401.8
NPLs as % of total	24.7%	20.2%	17.4%	15.4%
	1265.6	1411.6	1592.6	1774.9
Total loans as % of GDP		140.9%	144.6%	146.8%
performing loans	112.4%	119.4%	124.1%	96.8%
non-performing loans	31.7%	28.5%	25.2%	22.6%
's	168.2	168.2	168.2	168.2
	570.0	570.0	570.0	570.0
Total bad loans as % of GDP		40.4%	35.8%	32.1%
	performing loans non-performing loans NPLs as % of total % of GDP performing loans non-performing loans	2002 1626.9 performing loans non-performing loans NPLs as % of total 24.7% 1265.6 % of GDP performing loans non-performing loans non-performing loans 112.4% 1265.6 \$ 168.2	2002 2003 1626.9 1989.1 performing loans 1225.1 1587.3 non-performing loans 401.8 401.8 NPLs as % of total 24.7% 20.2% 1265.6 1411.6 % of GDP 128.5% 140.9% performing loans 112.4% 119.4% non-performing loans 31.7% 28.5% cs 168.2 168.2 570.0 570.0	2002 2003 2004 performing loans non-performing loans non-performing loans 1225.1 1587.3 1901.2 1901.

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¹⁰ In the middle of 2003, the official number was lowered to around \$240 billion, a number that is often cited in the press. Current official estimates are even lower.

These calculations ignore the banks' ability to use ongoing profits to write-offs of existing bad loans. They ignore the transfer of bad loans to the PBC – something that has been known to happen. And we have not adjusted the total to reflect the sale of bad loans by the AMCs.¹¹

However, they also probably overstate the overall health of the banking system, for three reasons:

- Most analysts think the initial stock of "legacy" NPLs was far higher than has been reported publicly; many estimate that close to 40% of all loans were not performing in 2002.
- The ever-greening of old bad loans (lending new funds to pay interest on old bad loans) usually creates new bad loans.
- The expansion of credit since the end of 2002 has been absolutely phenomenal. If the banks increase their outstanding loans by 2500 billion RMB (\$300 billion) in 2005, the government target, they will have added around 8 trillion RMB, or \$1000 billion in new loans to their books since the end of 2002. A significant fraction of this new lending may ultimately fail to perform. Goldstein 12 notes that roughly 40% of the loans made in past Chinese lending bubbles ended up going bad.

Consequently, it is quite possible that the underlying health of the banking system is not improving. Lending has been growing relative to GDP, so even if a smaller fraction of new lending goes bad than in the past, the overall cost of the new bad loans could still be quite significant.

We used the end 2002 snapshot of the backing system as the basis for a more pessimistic estimate of banking system's current health. We assumed a higher initial level of "legacy" NPLs and calculated the potential impact on the banks if some new lending ultimately goes bad (see Table 2).

¹² Morris Goldstein, "Adjusting China's Exchange Rate Policies," Institute for International Economics, May 2004.

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¹¹ Toward the end of 2003, the AMCs held RMB 600 billion in bad loans, v. RMB 1400 initially. James Kynge, Financial Times, October 30, 2003.

Table 2. Estimates of the current health of China's banking system, assuming a higher initial level of "legacy" NPLs

All banks, \$ billion

		2002	2003	2004	2005
Total loans		1627.3	1989.6	2206.2	2508.1
	performing loans	1025.2	1387.5	1604.1	1906.0
	non-performing loans	602.1	602.1	602.1	602.1
	NPLs as % of total	37.0%	30.3%	27.3%	24.0%
GDP		1265.9	1412.0	1593.0	1775.4
Total loans as %	of GDP	128.5%	140.9%	138.5%	141.3%
	O/w performing	81.0%	98.3%	100.7%	107.4%
	O/w NPLs	47.6%	42.6%	37.8%	33.9%
NPLs in AMCs		168.2	168.2	168.2	168.2
All NPLs		770.3	770.3	770.3	770.3
Total "legacy" bad loans as % of GDP (before new NPL s)		60.9%	54.6%	48.4%	43.4%
New NPLs					
	If 5 % go bad	0.0	18.1	28.9	44.0
	If 15% go bad	0.0	54.3	86.8	132.1
	If 25% go bad	0.0	90.6	144.7	220.2
Total NPLs as a	ı % of GDP				
	if 5 % go bad	60.9%	55.8%	50.2%	45.9%
	if 15% go bad	60.9%	58.4%	53.8%	50.8%
	if 25% go bad	60.9%	61.0%	57.4%	55.8%

These calculations focus on the entire banking system. Most attention, however, focuses on the big four state commercial banks. The government has acknowledged that these banks had a starting stock of \$255-260 billion in NPLs in 2002, before the recent credit expansion. Indeed, the government argues that these NPLs were reduced to \$240 billion during the course of 2003.

Consequently, it is pretty clear that the \$60 billion of the country's foreign exchange reserves transferred to three of the four main state commercial banks -- \$22.5 billion each to the China Construction Bank (CCB) and the Bank of China (BoC) in December 2003, and the \$15 given to the Industrial & Commercial Bank of China (ICBC), the nation's

biggest lender by assets, in April 2005 -- is no where near enough to fully recapitalize these banks.

However, the distribution of NPLs is not uniform among the state banks. CCB is considered to be in better shape than the others, though its chairman was recently forced out in a corruption scandal (thus, the chances of a year-end IPO have fizzled). ICBC is considered to be in worse shape than either the CCB or the BOC, and it is bigger than the others. And the Agricultural Bank of China (ABC) is considered to be in worse shape than ICBC. Consequently, it is clear that CCB and BoC held less than ½ the "legacy" bad loans back in 2002. But even if they held only 25-30% of the total bad loans of the SCBs, that implies combined legacy NPLs of between \$64-\$76 billion. \$45 billion is not enough.

\$15 billion is clearly not enough for the ICBC. Even if the \$15 billion from reserves is augmented by another \$15 billion from the Treasury, the ICBC will remain woefully undercapitalized. On the same day the government announced its recapitalization, the rating agency Fitch Rating presented analysis showing that ICBC needs at least \$50 billion to clean up its bad loans. UBS analysis suggests the final cost of cleaning up ICBC will be closer to \$100 billion. 15

In reality, total stock of legacy bad loans is probably higher than has been reported publicly – in 2002, legacy NPLs might have been \$385 billion rather than \$255 billion. Moreover, some new loans will probably go bad. That could add anywhere from \$25 billion to \$130 billion to the stock of bad loans in the SCBs. Of course, some old bad loans also have been written down. Still, our analysis would suggest that total bad loans in the SCBs probably are somewhere between \$400 and \$500 billion.

Even if the CCB and the BOC account for only 20% of all bad loans in the SCBs, they would then hold between \$80 and \$100 billion of bad loans. All these are ball park guess-estimates, done on the basis of old data on the big four combined without any detailed information on any of the individual institutions. But they help to set some basic parameters.

Consequently, our ballpark math suggest that even the recapitalized banks do not have a positive net worth, and are not even close to being ready for privatization. We find it equally hard to believe that these banks meet international capital standards.

The state commercial banks increasingly face a second problem: a lack of income. Nominal lending rates capped at a relatively low level, their existing stock of NPLs provides no income, and the low yielding PBOC sterilization paper pays a lower interest

(http://www.bloomberg.com/apps/news?pid=10000080&sid=aLgLJpRdMaDU&refer=asia).

¹³ Market analysts estimate NPLs of around 15% in CCB and the BOC, relative to the government's estimate of under 5%. They put the ICBC's bad loans at around 30%, v. the government's 19%. And they estimate 40% of the ABC's loans are not-performing.

¹⁴ See Bloomberg, April 22, 2005

¹⁵ Jonathan Anderson, UBS investment research, "China: Ten questions about the ICBC recap," 25 April 2005.

rate than their cost of funds. Consequently, it is hard to believe that the banks have been able to recapitalize themselves out of high ongoing earnings. China is not Turkey or Brazil: the banks cannot make a good living lending at high real rates to the government, and right now, administrative controls limit their ability to lend their available liquidity out. Realistically, the banks probably expect further injections of reserves – and probably further transfer of close to worthless bad loans to AMCs at par. That expectation creates an environment ripe for moral hazard.

The fiscal impact of bank recapitalization

One thing should be clear: China's reported public debt vastly understates the government's "true" financial position. The government – read China's taxpayers – faces large losses on the central bank's dollar reserve holdings. In a sense, the costs of the ongoing subsidy China provides its own manufactures, foreign direct investors who sell abroad, and US consumers are now being hidden on the central banks balance sheet: the costs will not be incurred until China revalues its currency. And in addition to losses at the central bank, China's government will have to cover the massive cost of cleaning up the banking system.

Official data put end 2004 Chinese public debt at 33% of GDP and the IMF estimated a 2004 fiscal deficit of 2.2% of GDP. Our ballpark math suggests that between the old legacy NPL and the new one that will emerge from the shakeout of the new loans, overall financial system NPLs could well be between 45-55% of GDP. Even assuming a generous recovery rate on NPLs of around 20 cents on the dollar (net of costs), the total cost to the government of cleaning up the financial system could still be between 35%-45% of GDP. International best practice would imply that the bond issued to recapitalize the banking system would need to carry close to market rates, say something close to 5%, then the ongoing the fiscal cost of recapping the banks from higher interest payments would be between 1.75% and 2.25% of GDP. Current market rates on China's domestic bonds are also unusually low, in both nominal and real terms – so this should be considered a low end estimate of the ongoing fiscal cost of cleaning up the banking system. China's "real" public debt and "real" fiscal deficit is at least twice as large as the official numbers.

If the banks are so bad, why isn't there a risk of a bank run?

We clearly do not think the financial system is in good shape. But both the argument that Chinese savings is itching to get out of China the moment controls are lifted ¹⁶ and the

¹⁶ A corollary of this view is that the renminbi might well fall if China loosened capital controls *and* adopted a more flexible exchange rate regime. Close analysis suggests that the deposit outflow needed to put significant pressure on the current exchange rate would need to be very large indeed. Remember that China looks set to run a trade surplus of around \$100 billion in 2005 trade surplus, and to attract an additional \$60-\$70 billion from FDI inflows. These inflows would allow China to finance a deposit outflow equal to \$160-\$170 billion, or around 10% of China's expected 2005 GDP, without drawing on its enormous stock of reserves. And don't forget that global investors are underweight Chinese assets just as much as Chinese private citizens are "underweight" in global assets. There would almost certainly be two-

argument that depositors will run toward higher-quality foreign banks after 2006, when China has agreed to open its banking system up to foreign competition, seem to be a bit over stated.

Why? Chinese depositors have no reason to care about NPLs so long as they expect the government to back the State Commercial Banks in full. Depositors are not betting on the solvency of the banks, but on the government's commitment to the state banks and the long-run solvency of China's government. Recently, Chinese savers have been shifting funds from domestic bank accounts denominated in foreign currency into domestic bank accounts denominated in RMB, even though this implies shifting funds from safe banks abroad toward insolvent banks in China.

In any case, the whole debate is rather academic: China will not liberalize its capital controls if the result would be a destabilizing bank run. Foreign banks lack the capacity to rapidly lend out large deposit inflows; building up lending capacity takes time. They will cut their deposit rates (assuming they can) rather than try to siphon more deposits out of the system than they can lend out. Right now, neither lending in the interbank market nor lending to the Chinese government is profitable. China's authorities probably will be able to "force" foreign banks to take over large numbers of existing bank branches, if not entire banks, if they want to expand rapidly.

Internal Distortions

Believers in "markets" like to highlight how China's market-based reforms have laid the basis for China's current prosperity. That view is no doubt correct. But in many ways, China is still not a modern market economy: its current boom reflects the power of markets, but it also stems, in part, from the power of distorted markets. China is no longer "really" Communist. But it is not "really" capitalist either – lots of key prices remain out of line as a result of government action.

Credit is too cheap in China. Nominal interest rates are very low for a fast growing economy. Real interest rates are negative for many firms, as the nominal rate is lower than in the increase in producer prices. This has led to the substitution of capital for labor, even in the face of China's enormous reservoir of underused labor (labor that can be drawn in from the country side as well as employees in some state firms). Work by some Chinese economists suggests a sharp fall off in the marginal productivity of capital, and total factor productivity. The Labor productivity has been growing in large part because each unit of labor is now combined with more capital. The cheap price of capital is one reason why investment has soared in relation to GDP.

In this dimension China looks like the "Asian Miracle" that went bust in the 1990s: high growth driven more by growth in factor inputs (notably the rapid accumulation of capital) than by growth in total factor productivity in economies with very high (excessive) rates

¹⁷ Hu Angang at "China's Economic Emergence," April 7-8, Columbia University.

way flows at the current exchange rate if the capital account was fully liberalized: Chinese investors seeking safety abroad would be offset by foreign investors seeking risk and higher returns.

of investment.¹⁸ Demand for credit at current interest rates remains strong, and, to date, low returns on bank savings has not impeded the growth of bank deposits. Indeed, with demand for credit, at current rates, well in excess of available credit, which is currently constrained by administrative controls, there are strong incentives for corruption. The long-term risk is clear: cheap credit will fuel an investment boom that eventually leads to an investment bust.

Energy is also too cheap. Retail gasoline prices are lower than in the US. Retail prices have increased over the past couple of years, not as much as the world market price of crude has increased. The government has kept the retail price of gasoline down, helping to control inflation. The state owned oil companies are (effectively) required to use the large profits on their domestic production (which still covers roughly 2/3s of total demand) to offset the rising cost of imports. For now, this works: the state-owned oil companies profits are still up, though they are not up by as much as they would be if prices increased to world market levels. Moreover, with the enormous expansion of China's automobile industry – both domestic and foreign – there is pressure to keep gasoline prices low to encourage automobile purchases. And, as in the US, there is also pressure to build more roads to ease traffic congestion.

Land is also too cheap, if you pay off the right people. The peasants who work agricultural land still cannot formally own land – land remains the property of the "people." Long-term leases may have helped get incentives for agricultural production right in 1970s/1980s without either the ideological or practical complications of outright privatization – though, as De Soto would note, the absence of formal title to land is still an impediment to growth, since peasants cannot use the land they work but do not own as collateral.

As importantly, the Communist party retained de facto control over all land, and, over time, it has transformed itself into a capitalist real-estate venture. As cities expand, developers who can convince the local party committee to turn agricultural land over for development (or to allow old urban neighborhoods to be razed for new redevelopment) can make a fortune. Rather than buying the peasants (or old urban tenants) out, they often buy the local party committee out, so the windfall profits from land that is used for real estate development often accrue (privately) to the members of the local party committee, not to the peasants who have been working the land or urban dwellers that have lived in these urban areas for decades. This is clearly a key source of social tension; compensation for such eviction from rural or urban lands is systematically lower than the values of such real estate.

The renminbi is also too cheap. Over time, the renminbi should have a strong tendency to appreciate, at least in real terms, in line when rapid productivity growth in China.

Asia faced in 1997-98. China has a large stock of reserves, low amounts of short term foreign currency debt, capital controls and a current account surplus. Still, the Chinese hard landing would take the form of a domestic financial crisis. The risk is that the over-extended financial system stops lending, leading to a severe credit crunch, an investment bust and a domestic recession.

¹⁸ A busting of the investment bubble in China would not lead to the external debt payments crisis that East Asia faced in 1997-98. China has a large stock of reserves, low amounts of short term foreign currency

Consequently, the link between the renminbi to the dollar worked reasonably well so long as the dollar was appreciating. Indeed, during the Asian crisis, the renminbi probably appreciated a bit more than was optimal – the renminbi temporarily strengthened more than was justified by China's underlying productivity growth. The dollar, however, turned down in 2002, leading the renminbi to fall in real terms even as China's continued productivity growth implied the need for a trend appreciation. This has strengthened incentives to invest in the export sector rather than in production for domestic markets, and stymied the development of China's service sector. The result: a boom in exports, a steady increase in exports as a share of GDP, and a growing current account surplus even in the face of rising commodity prices (a negative terms of trade shock for China).

Recent data suggests that the increase in the 2005 current account surplus could be particularly strong. A surplus of 7 or even 8% of GDP is not out of the question.

Province/ center difficulties. China and Argentina are both growing fast, but otherwise seem quite far apart right now. China is the current darling of foreign direct investors; Argentina its "pariah". China is the new icon of capitalism; Argentina is not – even though unregulated markets play a larger role in Argentina even after its crash than in China right now, despite China's market reforms.

However, in one key respect, China and Argentina are quite alike: both have a system of "fiscal" federalism that may create strong incentives for borrowing at the local level (though the Argentina's provinces face additional constraints after the 2001 crisis). China's provinces and municipalities are responsible for the provision of education and social services, as in Argentina. The provinces rely in part on transfers from the center to cover the costs of the provision of these services, but the transfers alone are not enough. The result: differences in the quality of education across provinces, with better education in richer regions, and strong pressure to find additional sources of revenue at the local level.

There is another key similarity: provinces can effectively borrow from the center to finance the provision of local benefits. The mechanism, though, is probably a bit more indirect in China than it was in Argentina. Chinese provinces (to our knowledge) do not borrow directly from the large state banks to finance local deficits. But an ambitious provincial governor is likely to quickly discover that revenues (and growth) are far higher in the midst of a local real estate boom. The benefits of a real estate boom accrue locally. If the real estate boom is financed by one of the state banks, however, financial risk that the boom will turn to bust rests squarely on the center. The same story would hold true if the province expects that any losses in "city" banks, which are often owned by the local government, would be covered by the national government.

The result seems to be a Chinese version of an "Iron Triangle" linking the government to private commercial interests. Real estate developers need land to build on, credit to finance construction, and ideally, mortgage credit to allow individual buyers to purchase the completed apartments, letting the developer cash out quickly. The local party – not private individuals -- controls the land the developers need. The local party wants rapid

development and a rising tax base. And many local party members seem willing to give developers control of the land for a share of the profits. The state banks can supply ample, cheap financing. And since demand for credit exceeds supply, particularly at subsidized prices, it helps to have the right connections. Local lending officers may not care too much about the risk of losses further down the road – losses that will be assumed by far off Beijing in any case. The result: strong incentives to overbuild and lots of possibility for corruption.

No doubt, we have got some of the details of this story wrong. But we suspect the broad outlines are correct. Cheap credit, cheap land and cheap gas in places where rising incomes make cars affordable are a potent formula for a real estate boom – particularly when combined with the strong natural demand for housing created by rapid urbanization and rising living standards.

Internal distortions stem from government policies

It is not hard to find institutional reasons for China's current pattern of very unbalanced growth. We worry that excessive investment growth, excessive real estate investment and excessive export growth reflect the fact that a number of crucial prices are currently distorted. The low intertemporal price of money (the interest rate) distorts credit flows and leads to the substitution of capital for labor. The relative price of domestic and foreign goods is off, generating additional intra-temporal and intertemporal distortions: an undervalued real exchange rate generates large rents for foreign direct investors who produce for the export market and encourages excessive investment in the tradables sector. The low relative price of both land and credit encourages excessive investment in real estate. The low relative price of energy encourages investment in energy intensive heavy industries, and reduces incentives to invest in either energy production or conservation.

Of course, once investments have been made on the assumption that these distortions will continue, any change could be disruptive. There are strong interests that back the preservation of the current system despite its long-run costs. Modifying China's model in ways that generate more balanced growth will be difficult. But we suspect that it also is increasingly necessary, and that a range of relative prices will need to change to create incentives to move away from the current pattern of growth.

Off-the-wall scenario: China may become less welcoming to foreign direct investment over time.

China technically does not need FDI to finance its domestic capital accumulation: national savings are more than enough to finance all its domestic investment. Indeed, China currently exports part of its domestic savings and financial inflows from foreign investors end up being lent back out by the central bank as reserve accumulation.

Of course, FDI bring with it not just capital but also managerial skills, technology and access to global distribution channels. China though, clearly does not want to depend on

FDI forever to provide those inputs: it wants foreign managerial skills and foreign technology to spill over to the Chinese local firms and industry, eventually allowing Chinese firms to compete effectively with foreign multinationals, both in China and abroad.

That increasingly is happening, at least inside China. Chinese firms that start as parts suppliers often evolve in potent competitors for MNCs inside China. Chinese firms already dominate the production of a wide range of cheap, low value added labor intensive goods. Increasingly Chinese firms are moving into parts of the electronics business, as well as the automobile business. But Chinese firms generally have not developed into major global brands. They still rely heavily on MNCs to distribute and market China's production abroad. In contrast, Japan and Korea relied far less on FDI, and many Japanese and Korean domestic manufacturing champions went on to develop into global brands: Think of Honda, Toyota, Sony, Panasonic in Japan and now Samsung and Hyundai in Korea. Chinese manufacturers increasingly want a similar profile: Lenovo was virtually unknown outside China before it bought the PC operations of IBM. China aspires to be more than a low-end manufacturing base for US, European and Japanese MNCs.

There is nothing economically wrong with relying on foreign direct investment to build up its manufacturing sector. FDI made Ireland into Europe's tiger, and about three quarters of Irish manufacturing is foreign owned. Malaysia and Singapore also supercharged their development with foreign investment. But China aspires to be a superpower, not Ireland or Singapore. It does not want its entire industrial and financial system owned by foreign companies. China already restricts foreign ownership of domestic Chinese companies: it has no desire to let foreigners take advantage of the cheap renminbi to buy a range of Chinese manufacturing and industrial assets (remember, \$150 billion would buy all of China's listed equities). It now seems to intend to use its state-owned energy firms as a conduit for investing Chinese savings in the production of energy abroad. Chinese nationalism is not limited to purely political questions.

A high degree of foreign ownership of domestic capital in a high-savings economy frees up a lot of domestic capital to be invested abroad. That is certainly true in China, though in China's case, its investment abroad takes the form of growing government reserves – reserves that are on track to reach almost 50% of China's GDP at the end of 2005. And while foreign multi-national corporations (MNCs) are earning the high returns on their Chinese capital stock, the Chinese government earns lousy low returns on its holdings of dollar reserves. Swapping ownership of high return domestic capital for low return dollar assets sounds like a raw deal to many in China, as does paying the US a fat margin to intermediate Chinese savings. China's excessive reserve growth increasingly is prompting some Chinese intellectuals and policy makers to envision a different growth model –one where China's stock of excess savings is used to build up the overseas presence of Chinese firms, not just to support the US Treasury market.

To quote Guo Shuqing, until recently director of the State Administration of Foreign Exchange (SAFE) and a deputy-governor of the People's Bank of China (and now the proposed chairman of the China Construction Bank Ltd Co), in the China Daily:

Excessively favourable policies towards exports and foreign investments made sense in the years immediately after the country adopted its "opening-up" policy in 1979. But over time, such policies have fostered the erroneous belief that has led to the unconditional support for foreign investment and exports to achieve a consistent trade surplus. "This mentality should be corrected,". "And trade surplus is not necessarily a good thing all the time," he said.

China's exports contributed much to the coastal area's prosperity. However, after so many years, exports with relatively higher added-value, especially those with Chinese-owned intellectual property rights, account for a persistently low proportion of total exports ... The foreign-related segment of the economy, which constitute key parts for the economy in coastal areas, has gradually drifted away from the rest of domestic economy. These foreign-funded enterprises have more transactions within itself and with foreign economies than with domestic firms. ... "More than half of China's exports and overwhelming majority of high-tech manufacturing and trade are generated by foreign companies," Guo noted.

Guo's conclusion: "Indiscriminate support of exports and foreign capital influx has created short-term economic problems ... We should gradually reduce the preferential treatment to exports and seriously review our foreign investment policy."

Nothing may come of this – it may be nothing more than rhetoric designed to pave the way for a modest revaluation. But it also is not inconceivable that China will become far less welcoming to foreign direct investment over the next twenty years than it has been over the past twenty years. Policies sometimes change.

Conclusions

Credit growth and investment growth have slowed down from the torrid rates of the end of 2003 and the first quarter of 2004. But credit, investment in real estate, overall investment and above all exports are still growing more rapidly than the overall economy.

All were already large in relation to China's GDP, and all are still growing relative to China's GDP. Real investment is now close to 50% of GDP – and China's capital stock is no longer so small that it is obvious that China can *profitably* re-invest half of its yearly domestic product. China now exports over \$600 billion worth of goods to the rest of the world – not all that much less than the US. It is not clear that its exports can keep on growing at 35% y/y.

Right now, China's growth is strong, but it is based on the rapid expansion of sectors of its economy that are already well developed. That can work for a while, but it also adds to China's internal imbalances. The last time around when investment rate spiked from

35% to 45% of GDP in the early 1990s, the outcome was a hard landing. The risk of another – economically painful and socio-politically destabilizing - hard landing is still high. China's existing growth model looks to be running up against real limits, both internally and globally. Sustaining growth will require reorienting China's economy – and relying, at least on while, on rapid expansion of domestic consumption to sustain growth.