

IMF MACRO CONFERENCE
JEANNE PRESENTATION

My presentation about the international monetary system will be structured around two themes: global financial imbalances and global financial safety nets.

Global imbalances and global safety nets

One theme that one hears a lot is that improving global financial safety nets should help address the problem of global imbalances. The idea is that global imbalances come in part from the accumulation of reserves by emerging market countries trying to self-insure against volatile capital flows. Thus, better safety nets, in addition to their intrinsic merits, will reduce the need for self-insurance through precautionary savings, and thus mitigate the “global savings glut”.

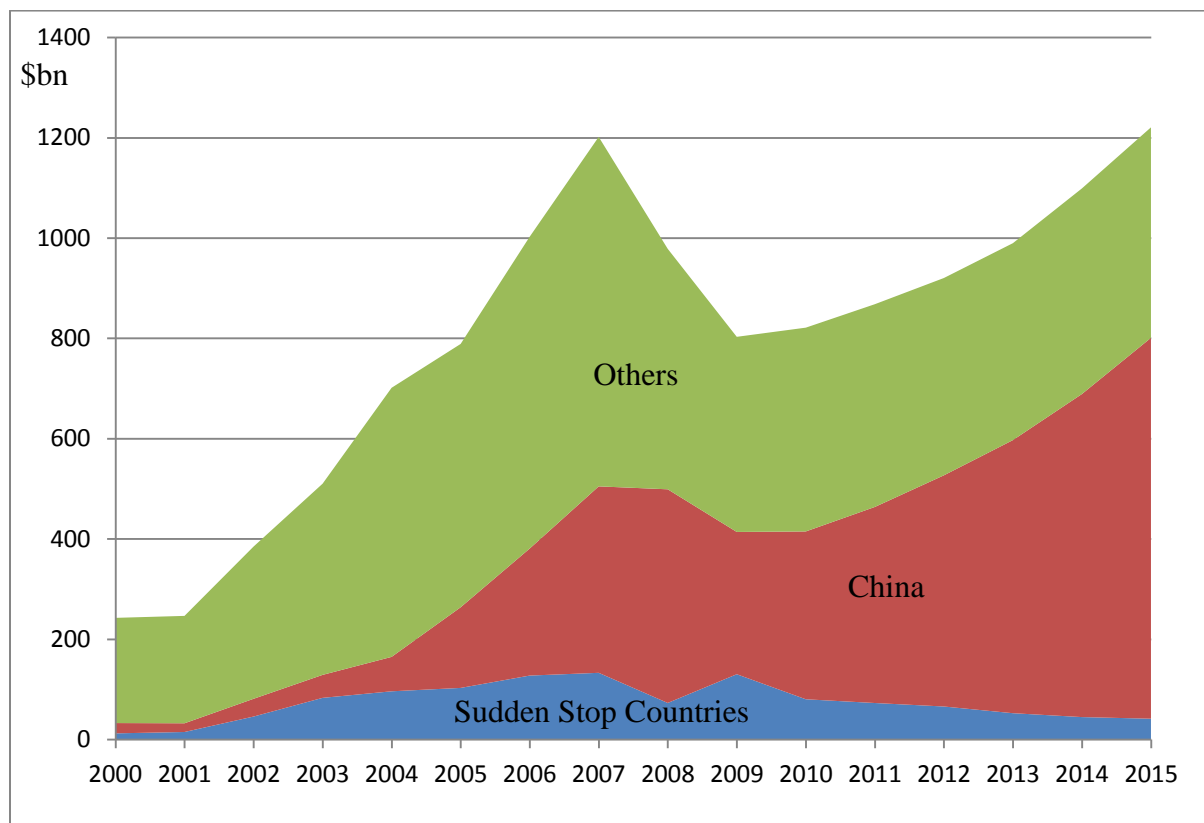
How important for global imbalances is the precautionary accumulation of reserves? One answer is given by Figure 1. This figure reports the current account surplus of all the countries that had a surplus in 2003-05 according to the World Economic Outlook (WEO) database, excluding oil exporting countries. (I remove the oil exporters because they accumulate foreign assets for reasons that are specific to those countries and that we understand pretty well.) The data cover 2000-2015, so the last third of the chart is based on a forecast by the IMF.

In this group, I define the “sudden stop” countries as the countries that either had a sudden stop between 1995 and 2000 or benefited from a swap with the US Fed or other central banks in 2008.¹ One can think of these countries as the natural “customers” of the global financial safety nets. The chart shows, in blue, the share of the surplus that comes from those countries. It also shows the contribution of China (in red) and -the rest (including Germany and Japan).

¹ A sudden stop is defined as a fall in the financial account of more than 5 percent of GDP. The list of sudden stops comes from Jeanne and Ranciere (2011), “The Optimal Level of International Reserves for Emerging Market Countries: a New Formula and Some Applications,” *Economic Journal*, forthcoming. The countries that benefited from swaps can be found in Aizenman, Jinjark, and Park, 2010, “International Reserves and Swap Lines: Substitutes or Complements?”, Table 2.

Figure 1 highlights two striking facts. First, the self-insurance motive accounts for a small and decreasing share of the current account imbalances. Thus, improving global financial safety nets, although it may be an important topic in itself, should not be expected to significantly reduce global imbalances. The second striking fact is the size of China's contribution to global surpluses, especially looking forward. The WEO predicts that China will account for more than 60 percent of the global surplus (excluding oil exporters). So if there is one topic that we have to focus on if we want to understand global imbalances, it is China.

Figure 1. Surplus countries (source: WEO 2010)



The Chinese dilemma

Why is the Chinese current account surplus so large? I will develop the thesis that the

capital account policies of China are key to understanding that fact. My analysis of the Chinese capital account policies is based on a model presented in a recent paper of mine,² but I am not making strong claims to originality with this model. This is a simple model that is consistent, I think, with what many people think China is doing.

Here is, in simple terms, how the model works. Think of an open economy in which the government uses two policy instruments. First, the government can determine the volume of gross capital inflows using capital controls. Second, the public sector of this economy accumulates a large stock of foreign assets. It stands to reason—and the model shows—that by playing with these two instruments the country can control the level of *net* foreign assets for the country as a whole. Essentially, the controls on capital inflows prevent the accumulation of foreign assets by the public sector from being offset by capital inflows to the private sector.

This is a simple point, but it has important implications. If the government controls the country's net foreign assets, it then controls the current account balance, which is the change in net foreign assets. From there it is easy to see that it also controls the trade balance, and that the real exchange rate must be at the level that is consistent with the trade balance. The causality goes from the trade balance to the real exchange rate rather than from the real exchange rate to the trade balance.

This is not a completely conventional way of presenting Chinese policies because it does not involve the monetary authorities in an essential way. The more conventional view is that the Chinese central bank resists the nominal appreciation of the renminbi through foreign exchange interventions. The conventional view, however, misses one important point: if the only thing that the Chinese authorities are doing is buying reserves, they could resist only the *nominal* appreciation of the renminbi, not the *real* appreciation, which would still come about through domestic inflation.

Where controls on capital inflows come into play is by preventing the internal appreciation of the renminbi by repressing domestic demand. Those controls are what make

² Jeanne, 2011, "Capital Account Policies and the Real Exchange Rate," manuscript, Johns Hopkins University, Dept. of Economics.

it possible to maintain a *sustained* real undervaluation of the renminbi. But once capital controls are introduced into the model, one quickly realizes that it is possible to abstract from monetary policy and build a model in which the real exchange rate is determined entirely by capital account policies. Obviously, the central bank's foreign exchange interventions are the way that the Chinese public sector accumulates foreign assets in practice. But this is not essential: the foreign assets could be accumulated through a different channel at the margin without impairing the authorities to undervalue the real exchange rate. Capital account policies, in this view, are the linchpin of China's exchange rate policy.

This view, if it is correct, has several implications. First, consider the vexing question of how to reduce the Chinese saving rate. My hypothesis is that the Chinese authorities induce a form of "forced saving" in China through their capital account policies. One way of understanding this is that the Chinese public sector, at the same time as it is purchasing large volumes of foreign assets, is forcing the domestic private sector to buy large volumes of yuan-denominated assets (sterilization bonds and bank deposits) that cannot be sold to foreign investors because of the capital controls. The domestic income that is spent on those assets cannot be spent on consumption: it is a form of forced saving.

Obviously, there are other explanations for the high Chinese saving rate, going from the lack of social insurance to aging or financial underdevelopment.³ But if you believe these other explanations, you have to believe that if China relaxed its controls on capital inflows, nothing would happen because the Chinese government is holding the stock of net foreign assets that the Chinese private sector wants to hold. If you think that relaxing the controls on inflows would lead to more inflows on a net basis, then you must believe in some version of the model that I have outlined.

³ For the lack of social insurance see Chamon and Prasad, 2010, "Why Are Saving rates of Urban Households in China Rising?" *American Economic Journal: Macroeconomics* 2(1): 93-130. For financial underdevelopment see Caballero, Farhi and Gourinchas, 2008, "An Equilibrium Model of 'Global Imbalances' and Low Interest Rates", *American Economic Review*, 98:1, 358-393; or Song, Storesletten and Zilibotti, 2011, "Growing Like China." *American Economic Review*, 101(1): 196-233.

Which explanation you believe in has important implications for the structural reforms that would be required to increase Chinese demand. Based on the other explanations for high saving mentioned above, the required reforms should be to “increase social insurance, strengthen corporate governance, and implement reforms to increase access to credit for households and SMEs in China”.⁴ However, if the high Chinese saving rate is due primarily to its capital account policies, those structural reforms are unlikely to increase Chinese demand much. The focus should instead be on the capital account policies of China, and more precisely, on giving foreign investors a larger access to Chinese financial and monetary assets.

The Chinese capital account policies are closely related to the internationalization of the renminbi. There are important debates (on which I will not dwell in these remarks) about the transition from a dollar-based international monetary system to a multipolar world with three or four reserve currencies, perhaps including the renminbi.⁵ The Chinese authorities seem to have adopted the objective of internationalizing the renminbi, although the pace and the modalities of the transition are not clear. However, making a reserve currency of the renminbi would require giving foreign investors access to a substantial stock of yuan-dominated financial assets. That is, it would mean relaxing the controls on capital inflows, and so losing control over the real exchange rate.

The transition from a strictly controlled capital account to a less controlled one is fraught with difficulties. The concerns of the Chinese authorities, as I understand them, are twofold. The first concern is about the pace of this transition: to preserve the benefits of an undervalued renminbi in terms of export-led growth until an alternative engine of growth is up and running. The second concern is about the orderliness of the transition: avoid a scenario with speculative inflows overflowing the capital account barriers and leading to an abrupt appreciation of the renminbi, which could be very disruptive for the Chinese

⁴ The quote is from Blanchard and Milesi-Ferretti, 2009, “Global Imbalances: In Midstream?” IMF Staff Position Note 09/29.

⁵ See Eichengreen, 2011, *Exorbitant Privilege: The Rise and Fall of the Dollar and the Future of the International Monetary System*, Oxford University.

economy.

Those concerns are both understandable and legitimate but there is a tension between the two. On the one hand, the Chinese authorities might want to err on the side of caution and implement a slow transition (“crossing the river by feeling the stones”). On the other hand, the slower the transition, the more foreign assets will be accumulated, the more pressure will build up and the more difficult it will be to achieve an orderly exit. Therefore, an orderly exit strategy requires a measured—but not too measured—pace. How the Chinese authorities will resolve this dilemma is key for the future shape of the international monetary system.

Rules of the game for international capital flows

Should China be treated *sui generis* or should it be included in a wider concept of the rules of the game for the global economic system? I am going to argue in favor of the latter, and more precisely that it would make a lot of sense to put the case of China in the context of a multilateral framework for the management of capital flows.

The *status quo* is characterized by an indefensible asymmetry between strong international rules for trade in goods (with the WTO) and a quasi-absence of international rules for international trade in assets. This asymmetry is indefensible because—as I show in Jeanne (2011)—any country can, by using capital account restrictions, manipulate its real exchange rate in a way that reproduces the effects of a combination of tariff and subsidy. What sense does it make to actively discourage trade distortions while putting no restriction on capital account policies?

However, this does not mean that all capital controls are bad. A session was dedicated to prudential capital controls yesterday and I will not dwell on this topic more than by stating my own view, which is that there is a strong case for emerging market economies to use prudential controls to deal with booms and busts in capital flows.⁶ There have been calls for

⁶ For more details see Jeanne and Korinek, 2010, “Excessive Volatility in Capital Flows: A Pigouvian Taxation Approach”, 2010, *American Economic Review*, pp.403-407; and Jeanne, Subramanian and Williamson, 2011, *Who Needs to Open the Capital Account?*, Peterson Institute for International Economics, forthcoming.

developing a “code of good practices” with regard to prudential capital controls that would increase the predictability and reduce the stigma associated with the use of such policies. And the IMF has been asked by its shareholders to look into the question of whether there is a need for globally agreed “rule of the road” for the management of capital flows.⁷

If one is going to develop a code of good practice for prudential controls on capital flows, it would make sense to take an additional step forward and also think about using the code to define, by exclusion, the capital controls that cannot be justified on prudential grounds, are presumably distortive, and should be relaxed. This is the proposal that John Williamson, Arvind Subramanian and I are making in a forthcoming monograph at the Peterson Institute (*Who Needs to Open the Capital Account?* Peterson Institute for International Economics, forthcoming).

There are several advantages from focusing the multilateral discussion on capital account policies. The discussion would be focused on the policy *instruments* rather than on the *outcomes*. As I understand it, the multilateral assessment program conducted by the G20 to reduce global imbalances relies on targets (or indicators) for outcome variables such as current account balances. This is problematic, because economic theory does not give us models that we trust enough to determine the appropriate (undistorted) levels of variables such as current account balances, or the policy instruments that should be used to achieve targets for such variables. This also applies to real exchange rates. A more direct approach that focuses on policy instruments seems preferable.

To sum up, there might be considerable (although not immediate) benefits from trying to agree on rules of the game that recognize the link between free trade in goods and a certain degree of freedom in trade in assets, i.e., that full participation in the world trading system should be premised on a certain degree of freedom in trade in assets.

Global financial safety nets

Let me conclude my remarks with some thoughts on global financial safety nets. The

⁷ Strauss-Kahn, 2011, “Toward a More Stable International Monetary System,” Opening remarks at the Lecture and Discussion on: “Towards a More Stable International Monetary System”, Washington DC, February 10, 2011.

motivation to reform global financial safety nets is well-known. Emerging market countries did not rely on the existing multilateral arrangements (the IMF, the Chiang Mai initiative) to obtain international liquidity in the fall of 2008, and relied instead on swaps with the US Fed and other central banks. The question is how the multilateral arrangements for international liquidity provision can be improved. This question is largely orthogonal to global imbalances (as I argued above) but it is nonetheless quite important for emerging market countries and it has received a lot of attention under the Korean chairmanship of the G20.

This question is discussed in more detail by Maurice Obstfeld and Már Guðmundsson in this session. I will limit myself to raising one question—because I think the answer really matters for the way we want to design global financial safety nets. The question is simply why did the swaps make a difference? As shown in Table 1, the four emerging market economies that received swaps from the US Fed already had reserves that were a multiple of those swaps. For example, Korea had more than \$200 billion in reserves when it received a \$30 billion swap. Why would a \$30 billion swap make a difference for a country that has \$240 billion in reserves?

Table 1. International reserves

Country	Korea	Brazil	Singapore	Mexico
Reserves Sept.08	\$ 240bn	\$ 206bn	\$ 169bn	\$ 99bn
Fed swap	\$ 30bn	\$ 30bn	\$ 30bn	\$ 30bn

I can think of four hypotheses, which are listed below:

1. Psychological threshold. The swaps made it possible to maintain the headline level of reserves above a psychological threshold. For example there were reports that the Korean authorities believed that reserves should be maintained above \$200 billion to maintain market confidence.
2. Seal of approval. The Fed signaled that it had a positive view of the prospects for the Korean economy, which in turn improved market expectations.
3. Lender-of-last-resort. The Fed, as the true lender of last resort for dollars (the creator of the currency), was implicitly committing itself to lend further if

necessary. The difference with the previous explanation is that the signal was about the Fed rather than about Korea.

4. Minor part of a policy package. The swaps did not really matter; they were just components of a larger set of policies that restored a measure of confidence at the center (Wall Street).

It is difficult to distinguish empirically between these views, but I believe more in explanations 3 and 4 than in the first two ones. That is, the Fed swaps mattered more than the \$30 billion that was provided to Korea because the Fed is a true lender of last resort and because the support to Korea was part of a larger package that restored a measure of confidence at the center. If this is correct, the fact that the resources were provided by a central bank—the creator of the currency—was of the essence as to why the swaps had a positive effect. That would mean that for the global financial safety nets to be as effective as possible, they should involve central banks and institutionalize the swaps in some way.⁸ If it is politically unfeasible for the major central banks to make such commitments, emerging market countries will have to rely more on prudential capital controls to reduce their exposure to capital flow volatility.

⁸ This could be done through the IMF, as proposed by Truman, 2008, “On What Terms Is the IMF Worth Funding?” Peterson Institute Working Paper 08-11.