Some random thoughts on fiscal and monetary policy in developing countries

Notes for IGC brainstorming session Doug Gollin October 2011

Without having been a part of the discussions leading up to the workshop, it's hard for me to know what issues these sessions will address or what perspectives participants will bring. But I thought I would try to weigh in with a few "brainstorming" ideas of questions that seem to me researchable, open, and potentially important. I've tried to divide them into fiscal policy questions, monetary policy questions, and perhaps also some data issues.

Monetary Policy

Much of the current work on monetary policy in developing countries is straightforwardly empirical. This is not a criticism; it's simply a reflection of the gap between well-framed models with money and the kinds of issues that central bank policy makers face on a regular basis. Central bankers are trying to hit inflation targets or exchange rate targets, and they are looking for seat-of-the-pants empirical models that will let them think about money supply and money demand. The literature has focused on practical management issues such as the impact of hard currency inflows due to aid or natural resource booms. Another literature, both empirical and theoretical, focuses on the problems of achieving macro stability, typically in a context of highly mobile capital and volatile economies.

I would argue, though, that relatively little attention has focused on the challenges of monetary policy in really *poor* countries. In particular, I am thinking of sub-Saharan economies that are not always entirely monetized. Certainly, large fractions of the workforce operate outside the formal sector, and most of the financial intermediation in these countries takes place through informal channels. It is difficult to believe that the standard textbook models of money creation and money supply really are applicable in these economies. When the central bank changes reserve requirements, do we really expect to see an impact on consumer behavior; and if so, how large or robust is this channel? It is not clear that the reach of the central bank extends very far beyond the urban formal sector. In many countries, people use a mix of local and hard currencies, perhaps along with some barter. So here are some questions that seem to me relevant for the context of poor – largely agricultural – developing countries.

- How much does the "non-monetization" of economies limit the ability of governments to pursue stabilization policies? What are reasonable targets for stabilization policy in economies of this kind?
- Agricultural goods represent a large fraction of the consumption basket in poor countries. The prices of agricultural goods are driven to a large extent by domestic production, which in turn is highly related to weather shocks. Following their textbook models (arguably more appropriate for rich countries), central banks often define "core inflation" rates that exclude food and energy prices. This often means that stabilization policies are not, in fact, responding to some of the biggest shocks that are hitting the economies.
- This is complicated by the dualistic structure of many poor economies. Often, there is an urban formal sector (often coastal) that is well integrated into world markets and that takes world prices as given. But because of many factors, including high transport costs, the rural economy is partly or largely closed. The two sectors are loosely integrated through exchanges of agricultural goods for non-agricultural goods. Monetary policies that make sense for the urban formal sector may have perverse effects on the rural sector (and presumably vice versa, though it's difficult to think of real-world examples). In some

sense, you would like to model the urban and rural sectors as two partly open economies that trade with one another and that inhabit some kind of currency union. They experience different shocks and perhaps changing terms of trade. What are the optimal policies for this environment?

- If the biggest sources of price instability in many poor countries are shocks to agricultural production, then would it ever make sense to think about investments in things like irrigation (which would tend to smooth agricultural production over time) as tools for achieving stabilization?
- Seasonal variation in prices is no longer a very big issue in rich economies, and most textbook models treat this as a minor issue. Yet in rural areas of poor countries, we know that the prices of agricultural goods vary enormously over the course of a year, with very low prices after harvest and correspondingly high prices in the "hungry season" before the next harvest. These seasonal variations are perhaps less acute in urban areas that are better connected to world markets and where effective storage facilities are widely operated. This leads to a couple of questions:
 - Would the construction of physical storage facilities (perhaps like irrigation investments) have a positive effect on the macro economy? If so, how much?
 - How actively should governments pay attention to these seasonal patterns of price fluctuation? There is abundant evidence that these price fluctuations impact credit markets, since farmers in many parts of the world borrow at planting time (when prices are high) and seek to repay their loans at harvest (when the price of their output is low). It seems plausible that the price fluctuations would then also affect the demand for inputs that need to be paid for in cash early in the season; e.g., fertilizer, hired labor, etc. My

impression is that governments in most developing countries simply ignore these seasonal price fluctuations at present, preferring to focus on annual inflation pressures. Is this sensible?

- Poor developing countries have developed a surprising array of informal and quasi-formal financial institutions that address the market failures in credit markets. How should these be regulated (if at all)? How should their existence alter government monetary policies (if at all)? From the perspective of data collection, how should these institutions be accounted for in financial data, such as measures of financial depth, debt, assets and liabilities of financial institutions, etc. Specifically, consider the following:
 - Others (notably David Weil and Isaac Mbiti) are thinking about this, but how should we understand the growing phenomenon of "mobile money" in Africa and other parts of the world (i.e., the growth of mobile phone banking and payments systems). How should governments regulate and manage these systems? What reserve requirements should be imposed? What would bank runs look like in a world with mobile money?
 - Along the same lines, we know that in many developing countries, rotating savings and credit associations (ROSCAs) are an important source of financial intermediation for the poor as, increasingly, are microcredit schemes. How do these sources of intermediation relate to government monetary policies. How should these schemes be regulated, from the perspective of a central bank? (Or, indeed, should they be regulated at all?) What role do these small-scale operations play in money creation?
- Monetary unions have been well researched over the years. At present, a number of country groups in sub-Saharan Africa are engaged in talks

over establishing or reviving monetary unions. To what extent are the issues facing these countries different from the issues that have faced previous country groups that are considering monetary union? These countries are poor, predominantly agricultural, and they have large fractions of their economies operating in quasi-subsistence. Many of them are heavily dependent on export commodities that are subject to large price fluctuations. What should a monetary union look like under these circumstances? Is it preferable to some other arrangement?

In addition to these issues, there are a lot of open economy macro issues that I don't fully understand but that seem compelling: about exchange rate regimes and how they are managed and targeted. I believe it's true that sub-Saharan central banks are mostly pursuing money targets of one kind or another, even though the rest of the world has given up on them because of a belief that money demand is not very stable and that monetary aggregates are not well measured. Is this true? If so, does it make sense?

Another issue that my colleague Peter Montiel raised in conversation is that we do *not* always adequately distinguish between *de jure* and *de facto* financial openness. It looks as though a lot of sub-Saharan African countries are quite open to capital flows on a *de jure* basis. If they are open to capital flows, then the usual arguments about the "impossible trilemma" apply. But if in fact there are lots of transaction costs and frictions in capital markets, then these countries might be far less open to capital movements than the *de jure* rules might suggest. In that case, there might be more scope for countries to pursue independent monetary policy and stable exchange rates. What do we know about this?

Fiscal policy

On the fiscal policy side, there are a lot of issues about public goods and investments. I feel that those research areas are well explored at the moment; much of the work in micro development is, to some extent, asking questions about the returns to different kinds of investment. There are also a lot of issues related to the composition of spending and the composition of taxes. I think these are interesting and important issues, and I would like to know more about some of them.

- Many countries have very narrow tax bases, often relying on export taxes, import duties, and some kind of taxation of large firms. How much do these distortionary taxes affect the patterns of economic activity. (Disclaimer: I have a paper on this topic, so perhaps it's not surprising that I find it interesting.)
- How can countries mobilize revenue for provision of public goods, when they lack enforcement capacity and when many large firms are internationally mobile?

Frankly, however, I think there is a more interesting set of fiscal policy questions, from a macro perspective. Again, I credit my colleague Peter Montiel for raising a number of these in conversation.

- In many poor developing countries, government revenues are highly cyclical. For a variety of reasons, it is difficult for them to smooth government spending across the business cycle. It is almost impossible for them to use countercyclical fiscal policy. As a result, most poor countries seem to pursue strongly procyclical fiscal policy, *de facto*. Presumbably this is not a good idea.
 - What kinds of institutions or mechanisms would address this problem? Are there commitment devices or supermajority rules that they could use to save government revenues from "boom" periods to use in "bust" periods?
 - Are there any automatic stabilizer policies that would be feasible for a government in a poor country? Since most employment is informal and the reach of governments may be limited, it is

difficult to use social safety net programs as automatic stabilizers. What alternatives might there be?

- How much does procyclical fiscal policy actually reduce welfare in these economies?
- Would it at least help if the "boom" spending were on capital investments rather than current expenditures?
- Would it make sense for poor countries to accumulate buffers of reserve currency or other financial resources?
- What are the political economy issues that stand in the way of sensible countercyclical policies?
- In some poor economies, non-governmental organizations bring in a substantial quantity of aid. In addition, bilateral and multilateral donors may finance development projects directly (i.e., independent of the central government). To some extent, these institutions are functioning like government actors, and their expenditure patterns may matter for government policy. Are there plausible mechanisms to allow this aid funding to be used in a countercyclical fashion?
- The intrinsic dualism of these economies is again important with respect to macroeconomic volatility. The urban formal sector may experience business cycles that are driven by world commodity prices and other external shocks; the rural informal economy is likely to face a different kind of volatility, driven in large part by climate shocks. Are countries better off or worse off when these two sectors are more integrated? How should policies mediate and mitigate volatility, given this dualism?
- If climate shocks are emerging as an increasingly important phenomenon in poor countries, driving macroeconomic volatility, how should government fiscal policy seek to stabilize or mitigate these shocks? What

are the implications for patterns of public investment? For example, if climate shocks make food prices highly volatile, does it make sense to connect the rural economy better to international markets (e.g., through improved transport networks), so that prices will be driven by international rather than domestic shocks?

I've written these notes quickly and I'm not sure they are all fully coherent. I hope they can contribute in some way to the discussions, and I look forward to hearing what others propose for the research agenda.