Mario Bergara: Financial stability nets – complementing and reinforcing micro and macro perspectives

Speech by Mr Mario Bergara, Governor of the Central Bank of Uruguay, at the opening of the 9th meeting of the IADI Latin America Regional Committee (LARC), Punta del Este, 21 March 2012.

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1. Lessons from the crisis: What is new?

The aftermath of the 2008 global financial crisis witnessed a surge on the discussion of financial stability issues. In some countries the focus of the debate is on the role of the shadow financial system, its relationship with banks, and the regulatory and supervisory failure to address the problem of regulatory arbitrage. In Europe, the main concerns lies on the lack of a European safety net, mainly due to the absence of a European lender of last resort. In emerging countries, however, the discussion is centered around the impact of the crisis on the volatility of capital flows and the architecture of the international financial system. Though some of the phenomena underlying the origins and depth of the financial crisis were either new or located in new instruments and markets, most of the issues that were raised during this episode can be traced back to the first financial crisis of the world. In the following lines, we develop the argument that even though financial stability concerns are as old as financial systems, and despite some of the main lessons of the recent crisis look pretty much alike the lessons of several financial episodes of the past (to which many jurisdictions have already reacted), there are good reasons to heighten our concern with financial stability.

Financial stability arises as a main concern, despite the fact that the concept is neither new, nor the main explanation for the collapse the world experienced in 2008. The crisis revealed the existence of regulatory failures at different levels, as well as problems in the design of the financial safety nets both at the national and international level. In what appears to be nearly a paradox, regulatory failure has remained in the background overshadowed by the concentration of policy making bodies in financial stability.

Financial stability concerns have had an impact on the management of both macro and micro policies regarding financial stability for a long time now. Uruguay can give examples of that matter. To quote one, in 1998 when facing a bullish international environment, Uruguay increased capital requirements on banks to tame the seemingly bubbling behaviour of domestic credit. For years now, Uruguay has worked on increasing the maturity of domestic public debt to avoid liquidity pressures on fiscal accounts that might in the end affect the health of the banking sector. Another example is our country's concern with real exchange appreciations. In the graph below it is possible to see that every financial crisis we had in the last 50 year was preceded by a deep and gradual appreciation of the real exchange rate followed by a sudden and sharp depreciation. That lesson has carved deep into the skins of the Uruguayan people, who see the appreciation of the currency as a sign of trouble to come. As a reflection of that concern, macroeconomic policy has always been keen to keep an eye on the exchange rate market, trying to prevent the misalignment of the real exchange rate with respect to fundamentals. Financial stability is then a long term concern in both macro en micro economic policy design.

Despite their long standing tradition on caring about financial stability, emerging countries like Uruguay are paying a renewed and closer attention to the matter because the international environment has changed. The G20 solution to the financial crisis has set clearly the boundaries of the international financial safety net, which were previously unknown, and has left a legacy of medium term excess liquidity that has to be dealt with in emerging economies. The sum of those two elements implies much more volatile international capital flows, in an international financial architecture in which each country is basically on its own.

As a result, even though financial stability is nothing new to us, we are paying a much closer look at the ways to complementing and reinforcing efforts to enhance the stability of our financial system and its contribution to the whole economy. In the next lines we would go over the way we envisage financial stability in the new international context.

2. Why is public intervention in financial markets necessary?

Public intervention in an industry is commonly justified by the existence of market failures and externalities. Market failures and externalities are particularly pregnant in financial markets. Financial markets operate in an environment of asymmetric information where adverse selection, moral hazard and costly state verification problems play a very important role. Moreover, the activities of the financial market players pose important spill-overs and externalities over other players in the industry, other industries, the domestic economy and even spread over other economies. Many examples of contagion, externalities and other market failures may be identified on the recent global financial crisis.

Some aspects that are specific to the financial industry provide a rationale for public intervention in financial markets:

Representing and protecting small claimholders. Financial institutions (e.g. banks) finance risky investments (e.g. loans) through retail deposits and other liabilities. Retail depositors, as well as other claimholders, are relatively small (and maybe nonsophisticated) agents. They do not have either the technical capabilities or the incentive to monitor financial institutions. Hence, public intervention is justified in order to cope with the potential moral hazard problem. In particular, a public entity assumes the representation of small claimholders of financial institutions in order to protect them (see Dewatripont and Tirole, 1994).

Controlling systemic risk, financial and macroeconomic stability. One of the main functions of financial institutions is to manage risks. For this reason, financial institutions are inherently fragile, to the point that some authors refer to them as “risk machines” (see Bessis, 2010). Moreover, troubles in one institution may rapidly amplify and spread to others through balance sheet interlinks and financial contagion, and affect the payment systems and the real economy (see, for instance, Allen and Gale 2000, Diamond and Dybvig 1983, Freixas et al. 2000. Ponce and Tubio 2010 offer a review of the literature). In addition to these externalities, amplification and spill-over effects, a situation of financial instability may be the result of the materialization of a macroeconomic risk which is common to all financial institutions (see Rochet, 2004). Yet, financial institutions may face difficulties to coordinate actions in order to resolve potentially damaging imbalances. Rochet and Vives (2004) demonstrate in a formal model that such coordination failure may determine that solvent financial institutions face severe liquidity shortfalls. Hence, these market failures and the need to preserve public goods (e.g. the payment system and the financial and macroeconomic stability) provide another rationale for public intervention.

Protecting taxpayer’s money. Financial crises have demonstrated to impose large cleaning burdens to fiscal authorities. Hence, the protection of fiscal revenues is another rationale for prompt public intervention in order to reduce the frequency and the impact of crises, and to quickly and efficiently resolve them once they have materialized.

Public intervention in financial markets commonly implies a series of functions that can be classified into the categories of *prevention* and *resolution.* Among the category of prevention one can mention the activities of monitoring and assessing risks (two crucial functions of financial supervision), and the application of a regulatory policy. A regulatory policy implies the use of rules (i.e. regulations) but also of preventive action (e.g. to enforce rules), and corrective action (e.g. to lean against imbalances). The resolution policy involves the use of rules, which are important to guarantee prompt and efficient resolution processes, the resolution and cleaning of institutions in trouble, and the correction of imbalances. Many tools are used to fulfil the objectives of public intervention in financial markets: prudential regulation, control and supervision (i.e. preventive tools), and resolution mechanisms and emergency liquidity assistance (i.e. resolution tools).

The set of all these functions and tools provides a *financial safety net* to the financial system. In general, the functions and tools of the financial safety net are allocated to different agencies. For example, it is generally the central bank which is responsible for the provision of emergency liquidity assistance. Other responsibilities like prudential regulation, supervision, and deposit insurance are allocated inside the central bank in some jurisdictions and outside in others. In order to determine the most efficient governance structure for the financial safety net policymakers should consider the agencies explicit conflict of objectives, the potential conflict of opinions about key issues (e.g. the intervention or the liquidation of a financial institution, the provision of short term emergency assistance, the authorization of mergers and acquisitions), and the need for coordination. In addition to this, policymakers should consider the pros and cons of the unification versus the separation of financial safety net agencies on the grounds of their relative expertise, capabilities, reputation, credibility and institutional strength. Moreover, the financial safety net affects and is affected by other functions like the conduction of monetary policy and fiscal policy. These effects should also be considered when designing financial stability institutions. We come back to this point in Section 5.

3. Micro- and macro-prudential perspectives

Sound risk management are needed not only at individual institutions but also at the financial system as a whole. The severity of the recent global financial crisis can only be explained by the systemic risk factors that propagated the problems in individual institutions and markets to the entire global financial system. The close relationship between individual and systemic risks provides a rationale for complementing the traditional micro-prudential perspective (focusing on individual risks) with a macroprudential perspective (assessing systemic risks).

Most of the financial regulatory and supervisory apparatus focalizes on the microprudential perspective. Some exceptions are the cases of Spain and Uruguay which have been implementing mechanisms to control both the static and the dynamic dimensions of systemic risk (e.g. dynamic provisioning and limit to currency mismatches) during the last decade. The recent Basel III capital and liquidity accord makes advances in the consideration of systemic risk. However, most of the current financial regulation focuses on the stability of each financial institution and market considered in isolation. Hence, it largely ignores the externalities that one institution poses on the others, the systemic importance of individual institutions, and the risks that are generated endogenously to the financial system. Moreover, the regulation focusing on individual institutions may open possibilities for regulatory arbitrage, i.e. the possibility that financial institutions avoid regulations of certain activities by conducting them through other entities (or lines of business) which are subject to less severe regulations.

The final objective of the macro-prudential perspective is to avoid the materialization of large social and economic costs due to financial instabilities. Hence, this perspective to financial stability considers the entire financial system and intends to protect their infrastructures (e.g. the payment system, the interbank and the money markets). The macro-prudential

perspective oversights the aggregate risk of the entire financial system by explicitly considering the exposition of individual institutions and market to common sources of risk, and the dynamic of risks that are generated endogenously.

The micro- and the macro-prudential perspectives should be jointly considered in order to avoid regulatory arbitrage and to ensure financial stability. Both perspectives should complement and reinforce each other in order to protect small customers and the stability of the entire financial system. Hence, their contribution should be transversal to the financial safety net agencies rather than the responsibility of a specific, macroprudential authority. The following sections analyse the implications of jointly considering the micro- and the macro-prudential perspectives on rules, institutions, governance and the design of macroeconomic policy.

4. Micro- and macro prudential policies: A two-way road

The following lines we argue that the function of financial stability implies a more articulated cooperation between institutions concerned with macro and microeconomic policy making and regulation.

4.1 Implications of systemic risk on traditionally micro-prudential rules and institutions

The consideration of systemic risks (e.g. exposure to common and correlated risks, interconnectedness, financial and real sector conglomerates, cross border issues, regulatory arbitrage, new kinds of risks and developments) have implications on traditionally micro-prudential rules and institutions.

Risk-based regulation. Risk-based regulation implies that similar risks face similar regulations regardless the financial institution and activity that generate them. This kind of regulation is a direct way to provide safety and protection to claimholders of financial institutions and other participants to the financial system. Other kind of regulation (e.g. activity-based and institution-based) may imply that important sources of risk remain unregulated and foster regulatory arbitrage. Moreover, they may ignore the important synergies, interlinks and externalities among different activities and financial institutions (which are particularly relevant under financial conglomerates) that contribute to systemic risk. To anticipate and control excessive risk taking is a direct mechanism to mitigate the negative effects that the materialization of risks impose to the stability of the financial system. A risk-based regulation acts directly over the incentives to take risks, and reduces the possibility of regulatory gaps whereby important activities that should be regulated escape regulation.

Dynamic regulatory perimeter. Financial institutions are special not only because they are specialized on risk management but also because they have shown to be creative and efficient on the development of new products. Financial innovation may contribute to social welfare but it also may serve as a device to arbitrate regulation and thereby to increase individual and aggregate risk. The capacity to innovate of financial institutions, the potential for regulatory arbitrage, and their potentially dangerous effects to the whole financial system provide a rationale for allowing the agencies on the financial safety net to expand and contract the regulatory perimeter (i.e. to select what institutions and activities should be regulated) in order to promptly react to new kinds of risks as market develop.

The possibility to dynamically adjust the regulatory perimeter is also justified by the trend of financial institutions to form groups and conglomerates where a stockholding company (even a non-financial one) owns financial institutions. Moreover, state-owned and privately-owned financial institutions managing similar risks should be in the same side of the regulatory perimeter and then subject to the same kind of regulations and controls.

Uruguay represents a particular case in Latin America where the Law gives powers to the financial sector regulator and supervisor to adjust the regulatory perimeter in order to fulfil its mandate of preserving the stability of the financial system.

Centralized regulation. The regulation of financial institutions should be centralized in a unique regulator. The existence of many agencies regulating the same financial institution (e.g. in an activity-based regulatory framework) may imply important overlaps in regulatory requirements or important gaps where important activities that should be regulated escape regulation. Moreover, financial markets are naturally dynamic and financial institutions and markets (e.g. banks and other intermediaries, pension funds, insurance and capital markets) show important interlinks which justify the need for a large level of consistency thought different regulations.

More centralization of financial regulation may imply lower bureaucratic costs, economies of scale and scope, the use of a conglomerates logic and lower regulatory arbitrage. These advantages from concentrating financial regulation may be traded off the potential advantages from a less concentrated financial regulation (e.g. efficiency gains due to specialization).

The rules and tools used by the centralized regulator should consider micro- and macroprudential risks. Otherwise stated, the financial regulator should take both prudential perspectives into consideration when writing rules and using regulatory tools and instruments. Hence, the financial regulator should receive as a clear and explicit mandate not only to ensure the stability of individual institutions and markets, but also to guarantee the stability of the whole financial system. Other aspects that are related to the governance of the financial regulator and its relationship with other agencies are analysed in Section 5.

4.2 Implications of micro-prudential concerns on macroeconomic polices

Micro prudential policy has a direct impact on macroeconomic policy, but experience shows that the reciprocal is also true.

Changes in regulation and supervision affect the power, reach and timing of macro policies. Leaving aside the obvious effects in crisis times, it is well known the impact of regulation and supervision on the development of financial markets and credit. Changes on the development of financial markets have a direct effect on the power of monetary policy. Changes in credit affect might affect consumption and therefore fiscal revenues. The recent crisis has highlighted the potential effect of failure in regulation and supervision on the creation of asset price bubbles. If we add those “normal time” effects to the ones generated during times of stress, we have a clear case why both monetary and fiscal policy should be concerned with financial stability.

Nevertheless, since many financial crisis can be traced back to problems in policy at the macro level, there is a clear case of a reciprocal concern on macro policy design coming from the authorities of the financial safety net. Particularly in the case of emerging economies, threats to financial stability come from the macro environment, and depend largely on the way macroeconomic policy is conducted. Reinhardt and Rogoff illustrate that financial crisis tend to cluster in history, and are related to the volatility of capital inflows and commodity prices. The literature on early warning systems suggest that the most basic features that currency and banking crisis seem to share are unsustainable appreciations of the domestic currency and fiscal problems. In the case of Uruguay, the three cases depicted in the figure portrayed in section I can be explained by (or cannot be understood without) problems on the design of macroeconomic policy. Since most financial crisis events have macroeconomic factors that either caused or amplified them, financial stability concerns should affect the design of macroeconomic policies.

The impact of macroeconomic policies on financial stability justifies the presence of macro policy makers in the discussion of financial stability issues not only as the ones that pay the

bill once the crisis has started, but also as key actors in the prevention of episodes of financial instability. A direct result of the line of reasoning that this paper develops is that financial stability is a two way road, in which all the actors involved have some milage to cover in order to ensure financial stability.

5. Financial stability committees: from safety to stability nets

The final outcome in terms of financial stability depends on the policies conducted by several of the agencies that are involved on macroeconomic policy design and the financial safety net: prudential regulation and supervision, emergency liquidity assistance, deposit insurance, etc. All the agencies that may contribute to the stability of a financial system "own" policy instruments and tools, and are responsible for their use. The challenges are that all these agencies should internalize the effects of their policies on financial stability; that all these agencies should complement each other on the identification and the assessment of risks and vulnerabilities; and that policy instruments and tools should be used and calibrated by considering both the micro- and the macro-prudential perspectives to financial stability.

Operationally independent agencies should receive clear mandates and remain accountable for the outcome of their policies. Hence, safety net agencies should receive the mandate of contributing to the stability of the whole financial system in addition to their specific mandates. Yet, agencies may have conflicting opinions on crucial decisions which may end in situations of financial instability. Financial stability committees appear as a response to align incentives, coordinate efforts, and contribute for all agencies to comply with their respective mandates. Financial stability committees also add to the financial safety net by helping the micro- and the macroprudential perspectives to complement and to reinforce each other. Financial stability committees are a step toward *financial stability nets.* Uruguay, like other Latin American countries, has recently created a committee with the objectives of sharing information and coordinating actions among the financial safety net agencies.

Financial stability committees serve as a framework to share information and to coordinate actions. They also help to improve the identification and the assessment of risks, and the accountability of the stability net agencies. Hence, they help safety net agencies to comply with their mandates. The specific mandates of safety net agencies and the operational constraints that they face imply that each of them specializes on the oversight of specific dimensions of financial risks. To share, combine and analyse the different pieces of information under the leadership of a financial stability committee improves the efficiency of risk assessment not only by profiting from the specialization of safety nets agencies on assessing specific risks, but also by having a more comprehensive approach to risks, by considering the interlinks between them, and by anticipating new risks. To get information from different safety net agencies also has the benefit for the financial stability committee (and the social welfare) of reducing the potential that the industry "captures" safety net agencies (see Boyer and Ponce, 2011). Moreover, the sharing of information, the insights provided by different safety net agencies, and the explicit consideration of different point of view on crucial decisions imply the generation of observable (and verifiable) information which may improve the accountability of the agencies.

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