# POST-CRISIS ISSUES IN FINANCIAL SECTOR REGULATION

Policy Report
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### **Policy Report**

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### **Executive Summary**

The global financial crisis of 2008 brought the global financial system to a near collapse, taking a devastating toll on global growth and welfare. Determined to prevent, or at least minimise, the probability of another crisis, governments, central banks and financial sector regulators launched a vigorous effort to distil lessons from the crisis and reflect them in public policy. An important component of their reform effort revolved around banking regulation to make banks safe and stable. But policymakers also realised that, while such regulation was necessary, it was not sufficient: the crisis had demonstrated that the financial sector is interconnected and that pressure in any part of the system can rapidly spread and engulf the whole system. It was necessary, therefore, that regulatory reforms encompass the entire financial sector, including non-bank entities and financial markets. Moreover, this could not be an individual country effort; it had to be a globally coordinated effort.

This paper aims to explain the economic and political economy dimensions of the important challenges that policymakers confronted as they worked through the reform agenda. It makes a special effort to give an emerging market economy perspective on these global issues.

#### Introduction

The global financial crisis (GFC), triggered by the collapse of Lehman Brothers in September 2008, brought the global financial system to a near-death experience and took a devastating toll on global growth and welfare. Determined to prevent, or at any rate minimise, the probability of another crisis, governments, central banks and financial sector regulators launched a vigorous effort to distil lessons from the crisis and reflect them in public policy.

That effort was multi-pronged. Since banks and bankers were at the heart of the crisis, an important component of this overall effort focused on rationalising and reinforcing regulation in order to make banks safe and stable. Policymakers realised that while such regulation was necessary, it was not sufficient. The crisis demonstrated powerfully that the financial sector is interconnected and that pressure in any part of the system can rapidly spread and engulf the whole system. It was necessary, therefore, that regulatory reforms extend beyond banks to encompass the entire financial sector, including non-bank entities and financial markets. Moreover, this had to be a globally coordinated effort as individual country initiatives would be sub-optimal.

Much of the work on regulatory reform of the financial sector was led by the Financial Stability Board (FSB) and the Basel Committee for Banking Supervision (BCBS). As they worked through the reform agenda, policymakers confronted several issues that defied easy resolution. This paper aims to explain the economic and political economy dimensions of the important issues in that debate.

In order to appreciate those issues in context, it is necessary to understand the lessons from the crisis that prompted the reform. Section I is devoted to that. That is followed by a discussion of the policy issues in financial sector regulatory reform in Section II. The paper concludes with some reflections on whether these reforms are robust enough to minimise the probability of another crisis.

The paper makes a special effort to give an emerging market economy (EME) perspective on these global issues.

Prior to the crisis, these forums were largely rich-country clubs. A significant development post-crisis has been extension of membership of these bodies to a few prominent emerging markets.

### Section I: Lessons of the Global Financial Crisis

The GFC threw up many lessons. This paper is restricted to identifying those lessons that have a bearing on financial sector reform. In particular, four lessons are discussed below.

### Lesson 1: In a globalising world, no country is an island

Although the root causes of the GFC are still a matter of contention, it is widely agreed that the proximate cause was the pressure that built up in the US subprime mortgage market. What started as a bubble in the US housing sector quickly snowballed, first into a global banking crisis, then a global financial crisis and quickly thereafter into a global economic crisis, powerfully demonstrating the interconnectedness of the global financial sector and the global economy. Virtually every country in the world was affected as the contagion spread through three channels — the finance channel, the real economy channel, and importantly, as happens in all financial crisis, through the confidence channel.

The crisis came as a particular shock to EMEs. In the pre-crisis period, many EMEs grew to believe that they were "decoupled" from global economic swings because of the reforms they had instituted in the preceding decade. The ferociousness with which the crisis spread demonstrated that, in a world interconnected by trade and finance, no country can be an island and that economic and financial disruptions anywhere can affect countries everywhere.

### Lesson 2: Global problems require global coordination

This is, in fact, a corollary of the first lesson.

As the financial markets went into panic and financial institutions were crumbling, every country began dousing the fires on its own. However, it was soon realised that this individual effort was in vain and that countries needed to combine forces and coordinate their actions to mitigate the disruptive forces.

From that perspective, the London G20 Summit in April 2009 will go down in history as a clear turning point when the leaders of the world showed extraordinary determination and unity. There were differences, no doubt, but these were debated and discussed and compromises were made without eroding the end goal — that is, to restore calm and confidence to financial markets. This resulted in an agreed package of measures with both domestic and international components but requiring all of them to be implemented in coordination, and indeed in synchronisation where

necessary. The entire range of crisis response measures — accommodative monetary stance, fiscal stimulus, debt and deposit guarantees, capital injection, asset purchases, currency swaps — all derived in varying degrees from the G20 package.

The common thread running through the entire G20 agenda was the need for global cooperation in solving the world's most pressing problems. The crisis also taught us that, given the deepening integration of countries into the global economic and financial system, uncoordinated responses will lead to worse outcomes for everyone.

Sadly, prospects for global cooperation do not look promising. On the contrary, intensifying trade wars and the regression of the multilateral rules-based order suggest that in a world divided by nation-states, there is no natural constituency for the global economy.

### Lesson 3: Excessive dependence on a single reserve currency is a threat to global financial stability

Reflecting America's dominance in the global economy and finance, the US dollar has become the world's dominant reserve currency. The crisis emphatically demonstrated that this excessive dependence on a single reserve currency is a threat to global financial stability.

As far as currency markets go, the aftermath of the crisis actually presented a bizarre situation. The United States was the epicentre of this huge crisis: American financial markets had seized up with extreme anxiety and panic; several of its big-name financial institutions were on the brink of collapse and the US economy seemed headed into a fierce recession. All this should have sapped confidence in the dollar, and the dollar should have plunged as a consequence.

What happened was exactly the opposite — the dollar actually appreciated. The reason for this counter-intuitive surge in the dollar was not far to seek. The extreme uncertainty in financial markets following the Lehman collapse drove investors around the world to withdraw their investments and return to the safe haven of the United States, in the process pushing up the dollar exchange rate. The flip side of this capital exodus was a severe dollar shortage everywhere outside the United States, which threatened the smooth functioning of global payment systems and exacerbated financial vulnerability.

The post-Lehman developments and anxieties reinforced the growing view that there needs to be another reserve currency apart from the US dollar if global financial stability has to be safeguarded. The search for an alternative is, however, proving to be an elusive guest.

It was initially thought that the euro would be a good reserve currency candidate to supplement rather than replace the dollar. But those hopes were dashed by the eurozone sovereign debt crisis of 2011/12, which called into question the very survival of the euro. That left the Chinese renminbi (RMB) as the only credible alternative. But it is not clear whether the Chinese authorities are interested in positioning the RMB as a reserve currency. They are, no doubt, pushing to internationalise the RMB in order to promote Chinese trade. This was, in fact, the motivation for their aggressive campaign to get the RMB included in the IMF's special drawing rights (SDR) basket.

But internationalising a currency is a different proposition from pushing for it to be a reserve currency. Being the issuer of a reserve currency brings advantages but it also entails costs. All indications are that the Chinese do not see the cost-benefit calculus to be in their favour, at least for the foreseeable future.

If the Chinese are not prepared for the RMB to rival the US dollar, the global financial system is left to contend with the dollar as the sole reserve currency and with all the risks that come with such dependence.

### Lesson 4: Emerging markets are being forced to build their own self-defence to guard against the downside of financial globalisation

Developments before and after the GFC showed that EMEs are particularly vulnerable to the forces of financial globalisation which, as explained above, are exacerbated by the dollar being the world's sole reserve currency. In particular, as a result of opening up their capital accounts and financial sectors, emerging markets have experienced large and volatile capital flaws, which have moved their exchange rates out of line with fundamentals and threatened their financial stability.

EMEs have consistently agitated against such vulnerability to capital flows at all international policy forums, including the IMF, the G20, FSB and the Basel meetings of central bank governors. Their main contention was that advanced economies must be sensitive to the spillover impact of their policies on EMEs. Since both advanced and emerging economies have shared the upside of globalisation, they argued, both must also share the downside of globalisation.

Advanced economies led by the United States were unsympathetic to this concern, mainly on the argument that their mandates are essentially domestic and they have no leeway to take spillover concerns into account. They argued that, instead of looking outward to advanced economies for a solution to their problem, EMEs must look inward and strengthen their macroeconomic frameworks in order to withstand the forces of globalisation.

Since such exchanges turned out to be a dialogue of the deaf, EMEs were forced into building their own self-defence by way of capital controls and the building up of foreign exchange reserves. Their capital flow management measures have been costly and sub-optimal but emerging markets have been left with no alternative.

### Section II: Post-Crisis Issues in Financial Sector Reforms

The crisis led to much soul-searching among governments, central banks and other financial sector regulators about where they had gone wrong and how they should reform financial sector regulation. This search for reform proved to be quite challenging for two main reasons. First, if they were to be effective, global standards would need to be clearly specified, objective and verifiable. But policymakers found that reducing the lessons of the crisis to precise rules or formulaic prescriptions was not always possible nor easy. Second, regulatory reform required agreeing on common global standards. But because countries differed widely in their economic circumstances and financial sector development, the cost-benefit calculus of common standards was different for each country, which made reaching a consensus a formidable challenge.

The following is a discussion of four major issues of contention.

### Issue 1: Safeguarding financial stability will be a core concern of central bankers

In the aftermath of the crisis, the main charge against central bankers was that, in their single-minded pursuit of price stability, they had failed to safeguard financial stability, which led to pressure building up in the system and its eventual implosion into a crisis. What is the basis for this charge?

In the years before the crisis, central bankers were a triumphant lot. This was the period of the "Great Moderation", when the volatility in business cycles that advanced economies had experienced in prior decades had significantly declined. Advanced economies were recording steady growth and low inflation whereas EMEs were clocking rapid growth even as they kept inflation under check. This apparent success of the Great Moderation fortified the argument that price stability is a necessary and (a nearly) sufficient condition for economic growth and for financial stability. Central bankers believed they had discovered the holy grail to a world free of business cycles.

That sense of triumph was deflated by the unravelling of the crisis. As the global financial sector came to the brink of a collapse even in the midst of a period of extraordinary price stability, it became clear: that price stability and macroeconomic stability do not guarantee financial stability.

Indeed, the experience of the crisis prompted an even stronger assertion — that there is a trade-off between price stability and financial stability, and that the

more successful a central bank is with maintaining price stability, the more likely it is to imperil financial stability. The argument goes as follows. The extended period of steady growth and low and stable inflation during the Great Moderation blindsided policymakers to the pressures building up in the underbelly of the financial system, especially as such pressures are difficult to detect in real time. As a consequence, when pressure builds up in the system undetected and the inevitable implosion occurs, it is not just disruptive but often even catastrophic.

This realisation led the post-crisis reform effort to focus on four questions: (i) How do we define financial instability? (ii) What are the policy instruments for safeguarding financial stability? (iii) What should the institutional arguments for safeguarding financial stability be? (iv) In particular, what should the role of central banks be with regard to financial stability? The following are some reflections on these questions.

Financial stability is difficult to define in concrete and quantifiable terms to suit all contexts. The consensus is that financial stability is a condition in which the financial system can withstand shocks, thereby reducing the probability of disruption or breakdown of the system. Conversely, financial instability is a situation characterised by erosion of confidence in the financial system that results in market seizure, panic and collapse.

There is a fair consensus that preserving financial stability requires, at a broad level, checking excessive systemic leverage by throwing sand in the wheels of financial exuberance. But there is much disagreement on what policy instruments are to be used for this purpose. Much of this debate has centred on macroprudential policy encompassing instruments such as risk weights, provisioning norms, and loan-to-value ratios.

International policy discussions have noted that while macroprudential polices should be the first line of defence to preserve financial stability, there could be occasions when it may be necessary for the central bank to step in and deploy monetary policy to check financial excesses. That raises a whole set of questions.

What are the relative roles of monetary policy and macroprudential policies in preserving financial stability? Under what circumstances should one, rather than the other, be invoked? How do these policies interact with each other? If they are handled by different agencies, is it possible that they can work at cross purposes? Is there an inevitable political dimension to macroprudential policies? If yes, how does one protect the autonomy of the institution responsible for macroprudential policy?

While preserving financial stability is a challenge for every country, the challenge is particularly acute for EMEs. First, their financial markets are less developed and may not be able to signal financial excesses in good time for regulators to take preventive action. Worse still, they might emit misleading signals, wrong-footing policy responses that can be enormously costly.

Second, in regulating financial stability, regulators may sometimes be required to take decisions with fiscal implications, for example, rescuing a bank at taxpayer expense. Evidence in the post-crisis period shows that managing the fiscal-regulatory tensions is difficult for any country, but is particularly so for emerging markets, which typically struggle with resource shortages.

Third, financial stability decisions occasionally involve decisions with political implications, such as which bank to rescue and which bank to allow to fail. Vesting regulators with such decision-making authority can open them up to criticism, and, worse, make them vulnerable to capture, that is, susceptible to the interests they regulate rather than to the public interest. While this is a problem for all countries, it is particularly acute for emerging markets with weak institutional structures.

All in all, while the lessons of the crisis regarding financial stability are clear, delivering on them will be a challenge. There will be much learning by doing on the way forward.

### Issue 2: Balancing the costs and benefits of regulation

Calibrating regulation is always a challenge as regulators have to find the right balance between regulating tightly enough to ensure consumer safety and financial stability but not so tightly that financial institutions have no freedom to innovate.

It is possible, for example, to regulate so tightly that banks are totally safe but this will have negative consequences in two ways. First, the cost of financial intermediation will go up and will eventually be passed on to consumers. Second, innovation of new products and processes that will improve efficiency and reduce costs will get stifled, resulting in substantial welfare loss. On the other hand, regulators can run a laissez-faire regime and allow freedom to financial institutions to compete and innovate. But this will lead to pressure building and may even result in an implosion, imposing enormous costs by way of growth and welfare.

The judgement that regulators will have to make is about the price — the insurance premium — they would be willing to pay for buying financial sector safety.

What further complicated post-crisis reform of regulation was that, on the one hand, the costs and benefits are different for each country, in particular for developed and emerging markets. On the other hand, regulatory standards have to be global.

In designing post-crisis regulatory reforms, policymakers had to manage the balance not just between tight and relaxed regulation but also between the interests of developed and emerging markets.

### Issue 3: The Basel III package for bank regulation came with costs and benefits

By far the most significant and broad-based reform at the global level has been the agreement on the Basel III package for bank regulation. This package, which was discussed for over two years, is an attempt to reform the capital, leverage and liquidity regulations on banks to fix the loopholes that became evident during the crisis.

What were those loopholes? (i) Under the pre-crisis regulatory regime, common equity requirements for banks were pegged too low to provide for adequate loss absorption in a time of distress; (ii) there was no explicit regulation against leverage, which allowed banks to become excessively leveraged while remaining compliant with the capital requirements; (iii) there were no explicit safeguards against liquidity risk, and this, in fact, proved to be the final straw for the crisis as liquidity shortage quickly snowballed into a crisis of confidence; and (iv) regulations demanded only light capital requirements against trading book exposures on the logic that trading book assets were low risk as they can be rapidly sold and positions can be quickly unwound.

The Basel III package addresses these flaws, most importantly by requiring banks to hold higher and better-quality capital. The common equity requirement was more than doubled; on top of that, banks were mandated to hold a capital conservation buffer of 2.5 per cent of risk weighted assets (RWA), which could be drawn down in periods of stress.

Another lesson learnt from the crisis the hard way was the moral hazard of "too big to fail". Because of the interconnectedness of the financial system, large financial institutions have a disproportionately large impact on the rest of the system. In other words, if they indulge in excesses and get into trouble, the contagion can ricochet through the entire financial system, often triggering a crisis. This outsized systemic influence creates a perverse incentive for them to let their guard down

and behave irresponsibly. If they do well and make profits, the upside is all theirs. On the other hand, if they make bad decisions or indulge in excess and get into trouble, there is often no downside: they are fairly confident that the government will bail them out through taxpayer money in order to protect the rest of the financial system.

One of the objectives of Basel III was to mitigate this risk by requiring systemically important financial institutions (SIFIs) to hold higher loss absorbing capital. This would reduce the probability of their failure and the cost of this insurance would be borne by the institutions themselves rather than being externalised as before.

Agreeing on the Basel III package turned out to be quite contentious. Policymakers were aware that the stiffer regulation will increase the cost of credit and thereby impede growth, but the cost-benefit calculus was different for each country. The contrasting views of Europe and the United States on tightening financial sector regulation illustrate this point. Financial services everywhere are provided by both banks and non-banks. In the eurozone, banks occupy a larger space than non-banks; it is the reverse in the United States, with the non-bank sector outsizing the banking sector. The eurozone, therefore, had an incentive to keep bank regulation lighter and argued that the Basel III package would affect their growth more than it would that of the United States.

Similarly, there was a divide between developed countries and emerging markets. Emerging markets were agitated that the Basel III package would raise the cost of credit precisely at a time when they expected to see a sharp upsurge in the demand for credit as their economies shift from informal to formal sectors and as financial inclusion deepens. Besides, they will have to invest in infrastructure, which is also credit intensive. They argued that the increase in costs of banking precisely at a time when they will need more banking credit would hurt their growth prospects.

The final Basel III package reflects a consensus on these tensions.

### Issue 4: Shadow banking — extending the perimeter of regulation

The crisis has demonstrated how shadow banking can destabilise the financial system, reinforcing the need to more effectively regulate it.

First a bit of background. Shadow banking is credit intermediation involving entities and activities outside the regular banking system. The pre-crisis regulatory architecture and regulatory culture provided a fertile ground for a thriving shadow

banking sector to emerge. Regulators focused on securing the safety of banks. But it was this exclusive and straitjacketed focus on banks that opened up opportunities for regulatory arbitrage in the form of shadow banks, which mushroomed and proliferated without the shackles of regulation. Banks also found out that it was possible to transfer risky businesses and assets to the balance sheets of shadow banks without transgressing any regulations.

But shadow banks were a crisis waiting to happen because of their low capital base, high leverage, interconnection with banks and risky business models. According to an FSB estimate, the global shadow banking system, as conservatively proxied by "other financial intermediaries", grew rapidly before the crisis, more than doubling from US\$26 trillion in 2002 to US\$62 trillion in 2007.<sup>2</sup>

At the international level, the post-crisis consensus was that if an entity behaves like a bank, it must also be regulated like a bank. To safeguard financial stability, it is necessary to monitor the shadow banking system (from micro and macroeconomic perspectives) and regulate it, both directly as well as by regulating the regular banks' interactions with shadow banks.

The FSB focused on five specific areas: (i) mitigating the spillover effect between the regular banking system and the shadow banking system; (ii) reducing the susceptibility of money market funds to "runs"; (iii) assessing and mitigating systemic risks posed by other shadow banking entities; (iv) assessing and aligning the incentives associated with securitisation; and (v) dampening risks and pro-cyclical incentives associated with secured financing contracts such as repos (selling with an obligation to repurchase), and securities lending that may exacerbate funding strains in times of "runs".

For the past several years, the FSB has been publishing an annual report to assess global trends and risks from shadow banking activities This is part of its strategy to transform shadow banking into resilient market-based finance. The monitoring exercise adopts an activity-based approach, focusing on those parts of the non-bank financial sector that perform economic functions which may give rise to financial stability risks.

There are no global standards for shadow bank regulation; there are only norms. Even so, there were tensions on agreeing on these norms too as the size and, therefore, the importance of the shadow banking sector is different in each country.

<sup>&</sup>lt;sup>2</sup> Financial Stability Board (FSB), "Global Shadow Banking Monitoring Report 2017", FSB, 5 March 2018, https://www.fsb.org/wp-content/uploads/P050318-1.pdf.

### Conclusion

Even as the crisis taught many lessons and policymakers have responded to them by instituting financial sector regulatory reforms, there can be no room for complacency. These measures will reduce the probability of a crisis, but will not prevent one altogether.

In their painstakingly researched book, *This Time is Different: Eight Centuries of Financial Folly*, Kenneth Rogoff and Carmen Reinhart argue that every time a crisis occurs and experts are confronted with the question of why, based on past experience, they could not see it coming, they would argue that past experience was no guide as circumstances had changed. Yet this "this time is different" argument does not hold. Reinhart and Rogoff put forward impressive evidence showing that, over 800 years, all financial crises can be traced to the same fundamental causation chain — upswing in optimism, leading to irrational exuberance giving way to excessive leverage, pressure in the financial system building up to an unsustainable level before giving a signal, which then results in fear, panic, sudden exit and eventual implosion.

By far the biggest lesson of the crisis is not technical but philosophical. What matters to people is their quality of life, and this is determined by how the real sector performs. Before the crisis, the fashionable world view was that for every real sector problem, no matter how complex, there is a financial sector solution. The post-crisis view is that for every real sector problem, no matter how complex, there is a financial sector solution which is wrong. Real sector problems require real sector solutions; they cannot be solved by financial engineering. The financial sector is important only to the extent that it can help solve real sector problems. It is this tenet that should guide and inform financial sector regulation.

### **Further Reading**

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#### **About the Author**

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### About the S. Rajaratnam School of International Studies

The **S. Rajaratnam School of International Studies (RSIS)** is a think tank and professional graduate school of international affairs at the Nanyang Technological University, Singapore. An autonomous school, RSIS' mission is to be a leading research and graduate teaching institution in strategic and international affairs in the Asia Pacific. With the core functions of research, graduate education and networking, it produces cutting-edge research on Asia Pacific Security, Multilateralism and Regionalism, Conflict Studies, Non-traditional Security, Cybersecurity, Maritime Security and Terrorism Studies.

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