# PAST EXPERIENCES WITH BANK RESTRUCTURING

# METHODS FOR RESTRUCTURING BANKS

MARC QUINTYN\*

#### Introduction

Bank restructuring is an inherent part of the governance of a country's financial system. Under normal (i.e., non-crisis) circumstances, an individual bank may occasionally become insolvent and the authorities have several options (typically provided in the law) to resolve this bank (Hoelscher 2002). These options include, among others, the sale of the bank as a going concern to a third party, a merger, a purchase and assumption (P&A) agreement, or liquidation and deposit payout. Typically, the authorities already start preparing for one of these options when it becomes clear that the bank is beyond rescue.<sup>1</sup>

In a systemic banking crisis – the focus of this paper - these techniques are in principle also available to the authorities. However, bank restructuring in a systemic crisis differs in a number of essential and intertwined aspects from the restructuring in case of an isolated bank failure. First of all, the size of the problem is by definition bigger – typically large segments of the system are affected and their problems threaten to bring the payments system to a halt. From this follow the two other key differences. Second, because of this threat, speed of intervention is of essence. The time to look for a partner for a merger or P&A agreement, or apply other private-sector solutions is in many cases limited to a weekend and therefore not feasible. Third, and most importantly, because of the size and the speed required, government support, be it under the form of guarantees or recapitalization, is inevitable to address the problems. Private sector solutions, although preferably in principle, are less adequate, not only because of the need for speedy solutions mentioned earlier but also because of the size of the problem.<sup>2</sup> Moreover, systemic banking crises typically trigger economic downturns, which make it extremely hard to find fresh funds in the private sector to recapitalize the banks.

Managing a systemic financial crisis is undoubtedly one of the most delicate and complex operations a government can possibly face because of the multitude of interests that are at stake.<sup>3</sup> Addressing a systemic crisis in a swift manner and head-on is essential, not only to prevent failing banks from dragging other banks into the crisis but also to mitigate the impact of the financial crisis on the real economy. Indeed, both the 1997–98 Asian and the current financial crises have clearly demonstrated that the impact of systemic financial crises on the real economy can be devastating in terms of output loss.<sup>4</sup>

Managing a systemic crisis – from the day the crisis is recognized as systemic until the day that the system returns to normal – requires a wide variety of professional skills. In fact, throughout the crisis, management requires a balancing act between macro- and micro-level decisions. The former concern the broad strategy to be followed to restore the financial system's intermediation function. These decisions are typically influenced by political-economy considerations. The latter involve a multitude of extremely technical decisions regarding the restructuring of individual institutions. Such decisions involve supervisors, accountants, auditors and lawyers, to name a few professional categories.

Systemic crises often give a very chaotic impression, particularly at the beginning. However, crisis management can be divided into three interconnected components. First, once a country is in a state of crisis, the main task for the government is to stop the crisis from spreading, i.e., to stop further contagion. The govern-



<sup>\*</sup> IMF Institute. Email: MQUINTYN@imf.org. The views expressed in this paper are those of the author and do not necessarily represent those of the IMF or IMF policy.

¹ Some jurisdictions, such as the US, have adopted a system of

<sup>&</sup>lt;sup>1</sup> Some jurisdictions, such as the US, have adopted a system of prompt corrective actions which allow the supervisor to take remedial actions from the moment that the bank's capital falls below a pre-specified threshold.

<sup>&</sup>lt;sup>2</sup> See also Landier and Ueda (2009b) and BIS (2009).

<sup>&</sup>lt;sup>3</sup> Throughout this paper I will use banking crisis and financial crisis interchangeably. However, most of the restructuring methods discussed here apply primarily to banks.

cussed here apply primarily to banks. 
<sup>4</sup> See for instance, Cerra and Saxena (2008).

ment needs to stabilize the financial system and try to restore public confidence. The second component is to restore a viable financial system - the restructuring stage. Finally the third component is the implementation of a strategy for dealing with the impaired assets ("toxic" or "legacy" assets as they have been labeled in the current crisis) in the system. These steps should gradually bring the system back to normalcy.

# The three components of systemic crisis management

Crisis management can be separated into three components. This section offers a short overview of the essence of these three components, in order to have a better understanding as to where bank restructuring enters the picture.

#### Crisis containment

Once the systemic nature of a crisis has been recognized, the authorities (in a coordinated action between the government, central bank and financial supervisors) should take measures to prevent the crisis from spreading throughout the system. The priority is to stop or prevent runs on banks by restoring the public's confidence in the financial system. Experience from several systemic crises since the mid-1990s shows that crisis containment relies on a combination of measures which is likely to differ from situation to situation and from country to country (Hoelscher and Quintyn 2003).

These measures include (i) expanding the coverage of the deposit guarantee scheme; (ii) or even providing a "blanket guarantee" (a government promise that all deposits in the system will be guaranteed by the government); (iii) the provision of lender-of-last-resort support, perhaps at less stringent conditions than in normal times; and (iv) the immediate closure of deeply insolvent banks to show the markets the government's decisiveness. In some cases, these measures need to be accompanied by macroeconomic policy measures to help restore confidence. If all these measures fail in stabilizing the system, the government's last resort is often administrative measures, such as closing the system for a number of days (partial or full) securitization of deposits, extending deposit maturities, or an outright deposit freeze. However, some of these measures, such as closing the system for a few days or a deposit freeze, do not really solve the problem; they just buy time for the government. If the government, in such circumstances, does not come up

with a credible solution, such measures often lead to a further deterioration of the public's confidence.

#### Bank restructuring

Once the situation is more or less stabilized, the authorities' attention should shift to restoring the financial system's intermediation function. The government should take stock of the state of the banking system and establish a restructuring strategy. Experience has shown that implementation of this strategy can take between a few months and years.

## Impaired asset management

Bank restructuring should be accompanied by a strategy to manage the impaired assets on the banks' balance sheets. Components two and three are complementary, in that the management of the impaired assets is part of the restructuring. However, other strategic decisions also need to be taken with respect to the management of impaired assets, such as the types of assets to be taken over and whether a private or a public sector solution for the management of these assets is favored.

These three components should not be interpreted as totally sequential. Phases two and three often start before phase one has come to a satisfactory end because of the need to keep the momentum of crisis management going.

# Methods for restructuring the banking system

Ideally, when entering the restructuring phase, the government should be guided by a clear strategy whose main objectives should be<sup>5</sup> (i) to restore the viability of the banking system as soon as feasible so that it can resume its role of mobilizer and allocator of financial resources in the economy; (ii) to provide throughout the process an appropriate incentive structure for all stakeholders; (iii) to minimize the cost for the government - and hence the taxpayer by managing the process efficiently and aiming for a fair burden sharing by all stakeholders.6

<sup>&</sup>lt;sup>5</sup> See Lindgren et al. (1999) and Hoelscher and Quintyn (2003). <sup>6</sup> This last objective is always mentioned as a crucial element in the government's strategy but is seldom analyzed. Recent work by Landier and Ueda (2009a and 2009b) evaluates the economics behind various restructuring options for systemically important banks. Based on a simple model, they conclude, among others, that (i) a combination of restructuring techniques is often the least costly solution and (ii) that asset sales are typically more costly for taxpayers than asset guarantees or capital injections.

Bank restructuring is typically a lengthy process. In emerging and developing markets the process often has to start with the establishment of a workable legal and institutional framework for bank restructuring. In recent years, several countries, faced with a systemic crisis, came to the conclusion that their legal framework to deal with a massive bank restructuring is outdated at best or nonexistent at worst. Precious time can be lost in these circumstances, resulting in continuing losses in asset values.

As a first step of this strategy, the balance sheets of all affected banks should be valued in order to assess their viability. This is a tedious, yet important, undertaking. Valuation should be done by outsiders and should use a standardized methodology to allow comparisons between banks. On the basis of this valuation it should be decided whether a bank is (i) insolvent and unviable, (ii) undercapitalized but viable and (iii) viable and meeting all (or most) solvency criteria. The first category should be resolved on the basis of the techniques listed in the introduction to this paper. The last category does not need much attention as they have survived the crisis. The restructuring should focus on the middle category as well as the too big to fail (TBTF), or systemically important institutions which could be either in categories (i) or (ii) but for which the decision has been taken to rescue them in any case. It should be noted that in a systemic crisis like the Asian crisis, it was important that more banks than just the systemically important were rescued because otherwise several layers of the population would have been deprived of banking services. Even a number of clearly insolvent banks were rescued for the same reason.

This "triage" process can be done in various ways. In the Asian crisis it was carried out for a large number of banks more or less simultaneously because the crisis hit many institutions within days. After their valuation and classification, a restructuring strategy was defined. In the current financial crisis, which came in waves, the diagnosing was done primarily on a case-by-case basis, particularly in the initial stages. As a result several governments also started off by taking stand-alone, or case-by-case, support actions. Only when the crisis became more pervasive, did governments move towards comprehensive support packages (BIS 2009).

By establishing these categories, the government has set out the eligibility criteria for its assistance in restructuring. Further decisions concern the following issues:

- whether assistance to all institutions in this category is mandatory or whether institutions are free to ask for assistance under the program. If access is not mandatory, the (supervisory) authorities should request binding business plans from those institutions that opt not to take government assistance. These plans should lay out, among others, a time-bound strategy for private recapitalization. Compliance with these business plans should be monitored frequently to ensure that the institution is being recapitalized and complies with the supervisory rules and regulations within the agreed time-frame:
- the conditions that the government wishes to attach to the use of its funding or guarantees. These conditions may range from the submission of a business plan to the influence the government wishes to have in the institutions' decision-making process, the treatment of the existing shareholders' claims, the payment of dividends and all sorts of other aspects of the bank's operations.
- the size of the assistance. The size could be expressed in terms of a target level of recapitalization. This level should be the same for all eligible institutions but may vary according to the general circumstances. For instance, it can be argued that when the government has extended a blanket guarantee to all deposits, recapitalization to a zero capital adequacy requirement (CAR) is sufficient. However, given limited availability of private funding sources under the circumstances, this level of recapitalization may not be sufficient and the government may opt for some minimum positive CAR level (Enoch et al. 2002). The other parameter, of course, is the state of the government's finances.

Even if the plan is not mandatory, it is expected that in a systemic crisis most banks would take advantage of it, mainly because of the size of the problems (loss of capital, percentage of impaired assets) and the lack of alternative funding sources. However, if the government's conditions are considered too harsh, some institutions may try to gamble their way out of the crisis without relying on the government.

Restructuring of the undercapitalized but viable institutions, including the TBTF category under a gov-

<sup>&</sup>lt;sup>7</sup> Some authors include blanket deposit guarantees under this type of restructuring. We consider this measure more as a measure to contain the crisis and to restore confidence. However, it is true that one of the effects of a blanket guarantee is that it avoids the potential losses from selling assets at fire-sales and from high-cost borrowing to repay depositors.

ernment-led strategy, can take three forms: (i) recapitalization; (ii) guarantees on debt, assets or income<sup>7</sup>; and (iii) asset purchases. Most crisis-countries have been using combinations of these methods to enhance the effectiveness of their operations. For instance, while capital injections may be needed, they have no direct impact on the portfolio of impaired assets, which often prevents the banks from generating new loans and new cash flow.

### Recapitalization8

Capital can be injected using Tier 1 or Tier 2 instruments. Tier 1 capital is the preferred method because it improves the banks' capital ratios, can enhance profitability and is essential under the Basel Capital Accord. Moreover, the government's provision of Tier 1 capital can facilitate the bank's efforts to raise Tier 2 capital from other sources.

In any capital injection operation, the government needs to make a decision regarding the instruments to be used and how to pay for them. The choice of instrument depends, inter alia, on the government's future plans with the bank(s). If the capital injection is seen as temporary, i.e., the government wants to recover its investment when the bank is profitable again, common stock would be preferable because of its marketability. However, with common stock come voting rights, and the government might not be willing to exercise these – or the government may believe that its voting rights will reduce the private sector's appetite to invest in this bank. In that case, convertible preferred stock would be a better option. This would also count as Tier 1.

In terms of payment, the government may pay in cash or bonds. Use of bonds is the most common practice when governments inject capital. They increase the bank's net worth, improve capital ratios (because government bonds are risk-free assets under the Basel standards), liquidity and potential profitability. However, bonds should pay market-based interest rates.

To attract fresh private sector capital, the government may attach some incentives. For instance, under some of the recap programs in the Asian crisis, governments promised they would match fresh private capital injections (in varying proportions) with their assistance.9

Providing guarantees on debt, assets or income

As part of the recapitalization operation, governments can also provide explicit guarantees on bank debt, assets or income, or a combination of all three. Depending on which specific guarantees are applied, these can have positive effects on either assets values, the balance sheet, capital ratio and/or liquidity. For the government, the advantage associated with such guarantees is that they do not directly involve taxpayers' money. So they carry some political appeal. However, they all create a contingent liability which the government may have to honor and which may in the end make things politically worse.

Debt guarantees protect against default on bank debt and other non-deposit liabilities (BIS 2009). The advantage for the financial institutions is that such guarantee helps them maintain access to medium-term funding at a reasonable cost in circumstances when private funding is drying up. Liquidity risks and overall borrowing costs are reduced through this form of assistance.

Governments can also assume part or all of the risks of a portfolio of impaired or illiquid assets. Such asset guarantees remove the tail risk of insured portfolios from bank's balance sheets (BIS 2009). Guarantees can also take the form of providing assistance to the borrowers of a bank – frequently the corporate sector. Such support for the corporate sector may be part of an overall strategy for handling a pervasive economic crisis (Enoch et al. 2002).

Finally, income guarantees (for instance through "stop-loss guarantees") allow banks to increase capital through retained earnings. This type of guarantees may be attractive to prospective bank purchasers in case of uncertainty about the value of the bank's assets and prospects for recovery.

# Asset purchases

A final method for bank restructuring is the purchase of impaired assets by the government. Asset purchases should be part of a broader program of asset rehabilitation (see below). Asset purchases can in fact be both a complement to, and a substitute for, capital injections. The asset rehabilitation program as a whole should enhance the effectiveness of the capital

 <sup>8</sup> This section draws on Enoch, Garcia and Sundararajan (2002).
 9 The US Public-Private Investment Program (PPIP), announced in

The US Public-Private Investment Program (PPIP), announced in February 2009, also falls under this category of incentive-providing assistance. However its focus is on asset purchases, not directly on recapitalization.

injection program in supporting economic recovery and may even provide capital relief.

Asset purchases are a complement to recapitalization programs. Indeed capital injections as such may not be sufficient as banks, sitting on piles of distressed assets, cannot jumpstart their lending activities. Asset purchase programs improve bank liquidity and accelerate the restart of the banks' intermediation function.

Asset purchases can also be a substitute for recapitalization programs if the government buys the assets at book value or a higher price. This can be an explicit goal of the restructuring program, but it can also be a disguised capital injection. Conversely, if the government buys below book value, it implies a forced write-down by the bank. Indeed one of the issues in a systemic crisis, when price discovery in the financial markets is hampered, is to establish the right price for many categories of distressed assets.

#### **Asset rehabilitation**

As indicated earlier, programs to purchase impaired assets should be part of a broader asset rehabilitation strategy which is intended to accelerate the economic recovery – the third component of crisis management. As such, asset rehabilitation is an integral part of a bank restructuring strategy in times of a systemic crisis. At the same time, experience worldwide suggests that this third component of crisis management

is often the most protracted one. Once the momentum of crisis management is gone, the urge to rehabilitate assets diminishes, particularly when a government agency is in charge.<sup>10</sup>

The objectives of asset rehabilitation should be to maximize the value of the impaired assets, and minimize bank losses and capital erosion. Establishing a rehabilitation program entails a number of strategic choices. In principle, three options present themselves for the management of bad or impaired assets. They can be (i) retained and managed by the banks themselves at appropriately written-down values, allowing the government to limit its actions to capital injections. Banks are then in charge of writing them off or restructuring them; (ii) relocated or sold to a "bad bank", loan recovery company or privately-owned asset management company that is specialized in the management of distressed assets; or (iii) sold and transferred to a centralized asset management company, which is in most cases state-owned.

The choices between these three options (and a combination of them is again not excluded) depend on such factors as the relative size of the portfolio of impaired assets economy-wide, and the type of assets involved. For instance, non-performing loans of bor-

#### Box

# Experience during the current financial crisis

The current financial crisis started in 2007, but intensified significantly in the fall of 2008 after the collapse of Lehman Brothers. In the wake of this event, governments started to provide assistance to troubled financial institutions, first through standalone interventions and subsequently increasingly through system-wide support programs.

Initially most government interventions were concentrated on capital injections and debt guarantees. All of the most-hit advanced countries have taken measures of either type. Most of these interventions were offered on a system-wide basis. Fewer countries, and only at later stages, engaged in programs to remove impaired assets, or to guarantee assets. In addition, in most cases these programs were only accessible to big systemic institutions. Only more recently did a greater number of countries engage in this restructuring method, and on a system-wide basis. This sequence seems to indicate that the first attempts at restructuring through capital injections failed to reach their goals, and that measures to address illiquid assets were needed to fully restore confidence. BIS (2009) shows indeed that those banks that received big(ger) capital injections were also the ones that participated most actively in asset purchase and guarantee programs.

According to BIS (2009), government interventions in the UK (capital injections, asset purchases and the exposure in cases of guarantees) have been the highest, both in terms of banking sector assets and GDP (respectively close to 9 percent and 55 percent). Relative to banking assets, the US rank second, while the Netherlands rank second in terms of GDP.

 $<sup>^{10}</sup>$  Klingebiel (2000) documents, for a number of asset management companies around the world, the number of years impaired assets stay on the books until they completely lose their value.

<sup>&</sup>lt;sup>\( \)</sup> This box draws on BIS (2009).

rowers who are likely to honor their contracts, as well as small loans should preferably remain on the banks' books, because banks have a personal relationship with these borrowers and are therefore more likely to succeed in the recovery process. Standardized assets, on the other hand, could be transferred out of the banks' books. Experience shows that privately-owned asset recovery companies act faster and more effectively. On the other hand, government-owned and centralized companies seem more efficient when the problem is vast, when special recovery powers are needed, or when required skills are scarce.<sup>11</sup>

If the choice is for a government-owned agency, a number of strategic questions - mainly related to the fairness of the program – need to be dealt with first. The first one is the purchases price, an issue that we have discussed before. A second question is whether the government should buy from all banks or only from the weaker ones. Only buying from the undercapitalized ones may put the better-run banks at a disadvantage when handling their own impaired portfolio without assistance. A fair solution would be to leave the weaker banks with a distress portfolio of, roughly, the size of the better banks' distressed portfolio. More generally, the government should never buy the entire impaired portfolio. This would create even more moral hazard as it relieves the banks from undertaking any portfolio rehabilitation effort. The third question is whether the company should only buy impaired assets or also good ones. The asset company might indeed be tempted to buy good ones as well, to increase its return. The solution to this question could be that either "fair prices" are established or that the sales concern specific asset categories such as "loss" or "doubtful."

#### **Conclusions**

Managing a systemic banking crisis – very often a once-in-a-generation event – requires a lot of imagination from the government in the broadest sense of the word. Creative measures need to be invented to contain the crisis as soon as feasible by restoring the public's confidence. To restructure the system, i.e., to restore its intermediation function, a similar dose of creativity is needed.

#### References

Bank for International Settlements (2009), "An Assessment of Financial Sector Rescue Programmes", *BIS Papers* no 48.

Cerra, V. and S. Saxena (2008), "Growth Dynamics: the Myth of Economic Recovery", *American Economic Review* 98 (1), 439–57.

Enoch, C., G. Garcia and V. Sundararajan (2002), "Recapitalizing Banks with Public Funds: Selected Issues", in C. Enoch, D. Marston and M. W. Taylor, eds., *Building Strong Banks through Surveillance and Resolution*, IMF, Washington DC.

Hoelscher, D. (2002), "Guidelines for Bank Resolution", in C. Enoch, D. Marston and M.W. Taylor, eds., Building Strong *Banks through Surveillance and Resolution*, IMF, Washington DC.

Hoelscher, D. and M. Quintyn (2003), "Managing Systemic Banking Crises", *IMF Occasional Paper* 224, IMF, Washington DC.

Klingebiel, D. (2000), "The Use of Asset Management Companies in the Resolution of Banking Crises. Cross-Country Experience", *Policy Research Working Paper* no. 2284, The World Bank, Washington DC.

Landier, A. and K. Ueda (2009a), "The Economics of Bank Restructuring: Understanding the Options", *IMF Staff Position Note* SPN/09/12.

Landier, A. and K. Ueda (2009b), "Evaluating Restructuring Plans for Systemically Important Banks", VOX.

Lindgren, C., T. Balino, C. Enoch, A. Gulde, M. Quintyn and L. Teo, 1999, "Financial Sector Crisis and Restructuring. Lessons from Asia", *IMF Occasional Paper* 188, IMF Washington DC.

Woo, D. (2002), "Two Approaches to Resolving Nonperforming Assets during Financial Crises", in C. Enoch, D. Marston and M. W. Taylor, eds., *Building Strong Banks through Surveillance and Resolution*, IMF, Washington DC.

Since in a systemic crisis private sector solutions (such as recapitalization with private funding, debt-to-equity conversions, and private sector initiated mergers and acquisitions) are not sufficient or feasible, government funding is necessary, despite the moral hazard effects associated with it. Government-led bank restructuring has the option of injecting capital, providing guarantees on debt, assets or income and purchasing assets. In most crises, a combination of these methods has been used to enhance the effectiveness of the assistance. Purchasing impaired assets is part of a broader strategy to rehabilitate impaired assets, which should also assist economic recovery. A recent BIS study shows that during the current financial crisis, several countries used combinations of restructuring methods to bring their financial system back on track.

 $<sup>^{11}</sup>$  For an in-dept analysis of pros and cons of various options, see Klingebiel (2000), Woo (2002), and Hoelscher and Quintyn (2003).