

# Indonesia: Anatomy of a Banking Crisis Two Years of Living Dangerously 1997–99

Charles Enoch, Barbara Baldwin, Olivier Frécaut, and Arto Kovanen

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Indonesia: Anatomy of a Banking Crisis Two Years of Living Dangerously, 1997–99

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#### Abstract

The views expressed in this Working Paper are those of the author(s) and do not necessarily represent those of the IMF or IMF policy. Working Papers describe research in progress by the author(s) and are published to elicit comments and to further debate.

This study looks at the first two years of the banking crisis that erupted in Indonesia in late 1997. It finds that the banking sector was weak at the outset, and that governance problems intensified the crisis and seriously delayed its resolution. Although a strategy was put in place over the initial months, protracted delays in implementation led to an explosion in the costs of resolution. By end-1999, the critical elements to reconstruct the banking system were in place, and the political transition seemed completed; but, in a continuing unsettled environment, the new authorities still faced daunting challenges.

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#### LIST OF ABBREVIATIONS

AMC Asset management of credits (originally named AMU)

AMI Asset management of investments

AMU Asset Management Unit (later renamed AMC)

BAPEPAM Capital Markets Regulator

BAPINDO One of four component banks of Bank Mandiri

BBD Bank Bumi Daya (component bank of Bank Mandiri)

BCA Bank Central Asia

BDN Bank Dagang Negara (component bank of Bank Mandiri)

BDNI Bank Dagang Nasional Indonesia

BEC Bank Evaluation Committee

BI Bank Indonesia

BII Bank Internasional Indonesia

BI-SKRIP Bank Indonesia System for Clearing, Registry, and Information for

Government Paper

BNI Bank Negara Indonesia

BPK Supreme Audit Agency

BRI Bank Rakyat Indonesia

BSD Banking Supervision Department of Bank Indonesia

BTN Bank for housing lending

BTO1 Banks taken over in 1998

BTO2 Banks taken over in 1999

BUN Bank Umum Nasional

CDs Deposit certificates

COR Cut-off rate

EGP PT Era Giat Prima

FSDP Financial Sector Development Project

FSAC Financial Sector Action Committee

FSVC Financial Sector Volunteer Corps

IBRA Indonesian Bank Restructuring Agency

INDRA Indonesian Debt Restructuring Agency

IRC Independent Review Committee

JIBOR Jakarta Interbank Offer Rate

JITF Jakarta Initiative Task Force

KSEI Private Sector Payments Agency

LLL Legal Lending Limit

LOI Letter of Intent

LOLR Lender of Last Resort

MOF Ministry of Finance

MOU Memorandum of Understanding

MSOE Ministry of State-Owned Enterprises

NOP Net open position

PWC PricewaterhouseCoopers

RTGS Real-Time-Gross-Settlement System

SBCSC State Bank Credit Supervision Committee

SBIs Bank Indonesia certificates

SBPUs Short-term promissory notes issued by the banks

TBTF Too big to fail

#### I. Introduction

The economic crisis which engulfed Indonesia in late 1997 brought to an end 30 years of uninterrupted economic growth. The banking crisis which ensued proved to be one of the most serious in any country in the world in the twentieth century, in terms of its immediate impact on GDP and its ultimate impact in adding to the country's stock of debt. In part the severity of the crisis derived from the economic problems that hit all the countries in the region—from Japan to Korea and Thailand—provoking a withdrawal of foreign capital from the region and removing possible locomotives that could have supported an economic recovery. Perhaps as importantly, however, the crisis was exacerbated by the political transition which occurred during this period, and which had a major impact on its handling and on external reactions as it unfolded. The political transition was played out both in parliament and in the streets. With the period in power of President Soeharto coming to an end, memories were fresh of the bloody consequences of the previous change of government 32 years earlier.

This paper focuses specifically on the banking crisis, which in part was driven by—and in part drove—broader economic and political developments. It covers the period essentially from late 1997 until the end of 1999. By this latter date, the stabilization phase of the overall restructuring program was essentially complete. In terms of a ten-stage schema for bank restructuring (see Box 1), the first eight stages had been achieved. The situation was still extremely fragile, and significant reversals very possible; many important tasks remained to be carried out, but the basics were largely in place for moving forward into the (longer time frame) restructuring elements encompassed in the final two stages of the schema. At the same time, a key element of the political transition seemed completed with the inauguration of the new government under President Abdurrahman Wahid. The political and popular situation, especially in Jakarta, had been tense throughout the previous two years, as evidenced, for instance, by the permanent presence of large numbers of troops throughout central Jakarta; with the election of the new President, and Megawati Sukarnoputri as Vice-President, in September 1999, the troops disappeared from the center of Jakarta almost overnight. Box 2 provides a timeline for key events during this period.

The next chapter provides a brief account of the authorities' strategy for handling the banking crisis. Thereafter, much of the rest of the study looks at a series of issues and detailed events. Chapter III presents a chronological analysis of the banking crisis, starting in

<sup>&</sup>lt;sup>1</sup> As noted in Kenward (1999), 1967 per capita income in Indonesia was less than one half that in India, Nigeria, or Bangladesh. By mid-1997, it was five times that of Bangladesh, four times that of Nigeria, and three-and-a-half times that of India.

<sup>&</sup>lt;sup>2</sup> The "accute phase" in Box 1 may last several weeks, and the "stabilization phase" several months; the recovery phase may last several years. The steps are not all sequential; some can be initiated before preceding steps are completed.

the late 1980s, so as to provide a background on the state of the banking sector when the crisis erupted, and going through the various stages of the banking crisis up to December 1999. Chapter IV is divided into sections, each examining a particular issue that was important during the crisis: the provision of lender-of-last-resort (LOLR) assistance to the banking sector, and the establishment of the blanket guarantee; the recapitalization of eligible private banks; the handling of the state banks; issues related to the Indonesian Bank Restructuring Agency (IBRA); the creation of a high-quality system of prudential regulations, and the rebuilding of supervisory capacity at the central bank; President Soeharto's plan that Indonesian adopt a currency board arrangement; monetary instruments, including the establishment of markets for central bank bills and government bonds; and a selection of governance issues. Chapter V briefly presents some conclusions; and two appendices present additional technical material.

# II. STRATEGIC OVERVIEW OF THE BANKING CRISIS<sup>3</sup>

From late 1997 Indonesia was in economic and political crisis. This study focuses on the economic crisis—in particular the banking crisis which was at its heart—but it is hard to understand developments fully without being aware of the ongoing political crisis that formed an ever-present backdrop to developments in the banking sector. Also, during this period Indonesia reached agreements with the IMF on a series of programs that were supported by extensive borrowings; while these programs focused on macroeconomic stabilization as well as on banking—and other structural—measures, there was increasing concentration on measures on the structural side, particularly from the middle of 1998, once monetary conditions had been brought under control and the threat of hyperinflation receded.<sup>4</sup>

In the initial phase of the crisis, from around August to November 1997, there was a general feeling that the emerging economic problems derived largely from contagion elsewhere in the region (especially Thailand), that the underlying economy was basically sound, and that introducing confidence-building measures—for instance, resolving some banks known to be in difficulty and intervening heavily in the exchange markets to appreciate the exchange rate—would be sufficient.<sup>5</sup>

<sup>&</sup>lt;sup>3</sup> Issues concerning macroeconomic policy have been covered in detail elsewhere. See, for instance, T. Lane et al., (1999). Links between banking soundness and macroeconomic stability are presented in the context of Indonesia by Djiwandono (1998).

<sup>&</sup>lt;sup>4</sup> An analysis of the strategy of Fund-supported programs in five Asian countries is presented in Boorman et al. (2000).

<sup>&</sup>lt;sup>5</sup> The impact of contagion was examined in detail in a number of studies. See, for instance, Baig and Goldfajn (1998).

# Box 1. Ten Critical Points in Managing and Resolving a Systemic Bank Crisis 1/

The sequence presented below describes the different phases one encounters when dealing with a major systemic financial sector crisis. This sequence is based on the assumption that a country's financial sector has public good aspects and, hence, that solving such a crisis warrants substantial public sector involvement. Although specific actions may differ among countries based on the depth of the crisis, the composition of the financial sector before the crisis, local circumstances and preferences, the contents and sequence of the basic building blocks and strategies are similar across countries.

#### Steps 1-4: The acute crisis phase: measures to stop the panic and stabilize the system

- 1. The crisis usually begins because, in one form or another, there is *excessive leverage* in the economy. In the early stages there may also be a degree of denial on the part of the banks and the government.
- 2. *Bank runs* by creditors and depositors start and intensify. The central bank responds by providing liquidity support to the affected banks.
- 3. When central bank liquidity is unable to stop the runs, the government announces a *blanket guarantee* for depositors and creditors. Such a measure is intended to reduce uncertainty and allow time for the government to begin an orderly restructuring process.
- 4. All along, the central bank tries to *sterilize* its liquidity support to avoid a loss of monetary control.

#### Steps 5-8: The stabilization phase: measures to restructure the system

- 5 The authorities design the *tools* needed for a comprehensive restructuring, including the required legal, financial, and institutional framework.
- 6. Losses in individual institutions are recognized. The authorities shift the focus from liquidity support to solvency support.
- 7. The authorities design a *financial sector restructuring strategy*, based on a vision for the post-crisis structure of the sector.
- 8. Viable banks are *recapitalized*, bad assets are dealt with, and prudential supervision and regulations are *tightened*.

# Steps 9-10: The recovery phase: measures to normalize the system

- 9. Nationalized banks are *reprivatized*, corporate debt is restructured, and bad assets are sold.
- The *blanket guarantee* is *revoked*, which, if properly handled, is a nonevent because the banking system has been recapitalized and is healthy again.

1/ For further discussion, see Lindgren et al. (1999).

	Box 2. A Chronology of the Asian Crisis, March 1997–July 1999
1997	
July 2	Thai baht is floated and depreciates by 15–20 percent.
July 11	Widening of the rupiah's band.
July 24	"Currency meltdown"—severe pressure on rupiah, baht, ringgit, and peso.
August 14	Authorities abolish band for rupiah, which plunges immediately.
August 20	Three-year Stand-By Arrangement with IMF approved by Thailand.
October 31	Agreement on first IMF-supported program with Indonesia.
November 1	Bank resolution package announced; 16 commercial banks closed; limited deposit insurance for bank depositors.
November 5	Three-year Stand-By Arrangement with IMF approved.
November 19	Exchange rate band widened in Korea. Won falls sharply.
December 4	IMF approves three-year Stand-By Arrangement for Korea, but rollover of short-term debt continues to decline.
Mid-December	Deposit runs on Indonesian banks, accounting for almost half of banking system assets.
1998	
January 15	Second IMF-supported program for Indonesia announced (in the event never approved).
Mid-January	Continuing downward pressure on the rupiah; continuing massive liquidity support to banking sector
January 27	Indonesian Bank Restructuring Agency (IBRA) established and blanket guarantee announced.
February 14	Unpublicized IBRA interventions into 54 banks
Late-February	Pre-election period. Doubts about future of financial sector program grow stronger amid political uncertainty. Rupiah depreciates further and currency board is debated.
February 23	BI Governor Djiwandono dismissed.
February [30]	First Chairman of IBRA dismissed.
March 6	New regulations introduced for BI liquidity support
March 11	President Soeharto re-elected.
April 4	IBRA closes seven banks and takes over seven others.
April 8	Announcement of agreement on revised IMF-supported program.
May 4	Approval of revised IMF-supported program.
Mid-May	Widespread riots. Rupiah depreciates; targeted deposit runs resume; Bank Indonesia provides liquidity.
May 21	President Soeharto is replaced by B.J. Habibie.
May 29	Bank Central Asia (largest private bank) taken over by IBRA.

Box 2.	A Chronology of the Asian Crisis, March 1997–July 1999 (concluded)
June 5	International lenders and Indonesian companies agree on framework for corporate debt rescheduling.
July 29	First auction of Bank Indonesia bills.
August 21	Closure of three banks taken over by IBRA in April 1998.
September 21	Revised agreement on so-called shareholder settlements.
September 29	Bank Mandiri created through merger of four largest state-owned banks. Governor of BI announces private bank recapitalization plan.
October 6	Amended Banking Law passed, providing legal powers for IBRA.
Mid-October	Rupiah strengthens from 11,000 to 7,000 per U.S. dollar.
1999	
March 13	Government closes 38 banks and IBRA takes over seven others. Eligibility of nine banks for joint recapitalization with government announced.
April 21	Closure of two joint-venture banks.
April [ ]	Government announces plans to recapitalize the three other state banks.
June 7	Parliamentary elections give largest block of seats to opposition party.
June 30	Eight private banks recapitalized jointly through public and private funds.
July 5	Government announces plan for resolution of IBRA banks through merging most of them within the largest bank, Bank Danamon.
July 31	Legal merger of component banks of Bank Mandiri.
August	Growing row over possible government involvement in side-payment agreement connected to recapitalization of Bank Bali.
October 19	President Habibie announces he will not stand in forthcoming Presidential election.
October 20	Abdurrahman Wahid elected President. Megawati Sukarnoputri elected Vice-President.
October 21	First tranche of capitalization of Bank Mandiri.
October 26	Announcement of new Cabinet.
December 28	Second tranche of capitalization of Bank Mandiri.

This almost-universally-held analysis derived from the suddenness of the economic turnaround, from credibility in the competence and professionalism of the Indonesian authorities, and from the absence of an accurate quantitative base on which to challenge the conventional analysis. By year-end, however, it was clear that the economy and, in particular, the banking system was in deep crisis. Many factors have been suggested for causing this turnaround, and it is very hard to be definitive in determining their relative importance. There has, in this context, been focus on some of the specific measures introduced, most particularly the closure of 16 banks (representing 3 percent of banking sector assets) with less than full depositor protection. But more broadly, unlike in Thailand and Korea, by end-1997 there was evidence that the authorities had, at this stage, limited commitment to the program they had agreed with the IMF, and had made numerous policy reversals: while the Korean authorities, for instance, had pushed through a series of farreaching laws to restructure their economy in December 1997, the Indonesian program with the IMF had gone far off-track, with lack of progress on a range of measures agreed in the program, as well as the reversal of a number of actions taken before program approval to address weaknesses on the banking side. 9

With the exchange rate having depreciated from about 2,500 rupiah per U.S. dollar in summer 1997 to around 14,000 rupiah per U.S. dollar, with protracted runs on much of the banking system, and the threat of imminent hyperinflation and financial meltdown, the authorities set out their strategy in late-January 1998. There were three main elements: (1) a blanket guarantee for all depositors and creditors of domestic banks (apart from those connected to the banks) for a minimum of two years to restore confidence in the banks and to give the authorities time to address the banking situation; (2) the creation of a new public super-agency, the Indonesian Bank Restructuring Agency (IBRA), for a limited period, with

<sup>&</sup>lt;sup>6</sup> Furman and Stiglitz (1998) found that the Indonesian crisis was the least predictable one of a sample of 34 troubled economies.

<sup>&</sup>lt;sup>7</sup> Radelet and Sachs (1998b), who attribute the depth of the Asian crisis in large part to errors by the international financial institutions, nevertheless list a series of policy reversals by the Indonesian authorities. For instance, as they report, although the government announced the cancellation of 150 investment projects in early-September 1997, in order to demonstrate its responsiveness to external developments, on November 15 it rescinded the cancellation of 15 of the largest of these projects.

<sup>&</sup>lt;sup>8</sup> For instance, the termination of the national car program run by the President's son, "Tommy" Soeharto.

<sup>&</sup>lt;sup>9</sup> Krugman (1998), and Pesenti and Tille (2000) have presented analyses explaining the Asian crises in terms of traditional "second-generation" currency models, augmented by the effects of financial sector weakness deriving in turn from deficiencies in regulations and supervision.

a range of responsibilities to address the banking crisis; and (3) the elaboration of a framework (later called the Jakarta Initiative)<sup>10</sup> to carry forward corporate restructuring.

The moral hazard effect of the blanket guarantee was recognized. From the outset, the authorities sought to cap the interest rates that banks could offer depositors. There was a reluctance to impose an administered fixed-rate cap, but no obvious market rate was available at the outset. Although initially the cap was set relative to the central bank bill rate, by May 1998 it was set relative to the interest rate offered by the "best" banks. Until early 1999, banks were allowed to offer no more than 500-basis points above the rates offered by the so-called JIBOR banks. <sup>11</sup>

The establishment of a single centralized public agency, with a range of responsibilities with regard to the prospective bank restructuring, was a dramatic innovation, designed to fit the particular conditions pertaining to Indonesia. While countries vary significantly in the extent to which bank restructuring is centralized, and indeed the degree to which the public sector takes control over the process, it was felt—given the widely-recognized governance problems in both the Indonesian public and private sectors—that oversight could be best conducted within a single public institution that was new, highly visible, and carefully focused. Thus IBRA was designated to supervise banks under restructuring, <sup>12</sup> to manage and dispose of the assets from any banks that were closed, and to pursue the creditors' interests with regard to claims that came under its control.

The success or failure of bank restructuring in Indonesia has, therefore, been closely bound up with the fortunes of IBRA. Among the elements in its favor, at the outset was the appointment of a highly regarded senior finance ministry official, Dr. Bambang Subianto, as its first chairman, and the public statement from the Finance Minister, Mar'ie Muhammed, that the government recognized bank restructuring to be a government responsibility. However, while IBRA was intended from the start to be an independent agency carrying out a specific task, its centrality to the restructuring process created a permanent tension between its officials and the wider political forces whose interests were likely to be threatened. As the extent of the necessary restructuring became apparent, these tensions increased. The first

<sup>&</sup>lt;sup>10</sup> Details of this initiative are largely outside the scope of this study, in part because the process of corporate restructuring proceeded much slower than that of the bank restructuring and had yet to achieve a critical breakthrough by the end of 1999. Nevertheless, it was widely recognized from the early stages of the crisis that the resolution of corporate sector problems would need to be an integral element of the overall resolution of the crisis.

<sup>&</sup>lt;sup>11</sup> Further details of the cap are provided in Chapter IV, Section A.

<sup>&</sup>lt;sup>12</sup> There was ongoing tension between IBRA and BI, over the transfer to IBRA of the supervision of the banks under restructuring; in summer 1998 this responsibility was handed back to BI.

chairman was dismissed after only a month in the job, reportedly for being too diligent in pursuing his responsibilities, and was replaced by a BI Deputy Governor. Although IBRA successfully intervened in 54 banks in February 1998 and closed or took over 14 of these in April 1998, the agency was left under-resourced and unbudgeted for over a year. There were lengthy delays in the passage, and the bringing into effect, of the IBRA law which gave it its necessary powers to hold, manage, and transfer assets, and to pursue recalcitrant debtors. Thus, only in February 1999 could IBRA take full control of the assets of the banks it had closed in April 1998. The result was that the process of bank restructuring was slow, and much more costly than might have been the case, although the overall strategy established in early 1998 remained broadly in place. 14

IBRA was, during this period, undoubtedly more constrained in its actions than were equivalent agencies in other countries during the first year of their existence. First, there was little prospect of substantial early capital inflows. Foreign investors were withdrawing from the entire region and factors specific to Indonesia made it unlikely that this would be the first place to which they would return. Second, there were limited domestic resources available, including human resources to replace former managements of failed banks. Third, there was no domestic consensus in support of the agency. Bank restructuring agencies frequently encounter strong vested interests. But, partly because of the depth of the crisis, the magnitude of the prospective redistribution of wealth in Indonesia was so substantial that the vested interests that IBRA encountered were pervasive across its operations. Fourth, there was no history of independent operation by public agencies. In 1997–98 Indonesia was a highly centralized country, and IBRA had to operate subject to intense political oversight.

The priority need in early 1998 was to curtail the intense liquidity emissions from BI through its provision of lender-of-last-resort credit to the banks. Interest rates at the time were subject to micro-control by the President, and were difficult to adjust; thus sterilization of the emissions was barely feasible. New techniques of monetary management had to be developed to establish market interest rates that would by-pass the administered rates. This led, after some delays, to the start of auctions for central bank bills in July 1998. At the same time, conditions for the provision of liquidity were overhauled. Instead of last-resort lending being subject to penal, but never paid, interest charges, nonfinancial penalties—such as emergency inspections and possible transfer to IBRA—were introduced by BI in March 1998. Meanwhile, IBRA focused on bringing under its full control those banks responsible for the bulk of the lending. IBRA management sought to design uniform and

<sup>&</sup>lt;sup>13</sup>IBRA initially operated out of premises lent by the central bank; later in 1998 it took over the headquarters of a bank it had closed; most staff initially were seconded, and paid by their seconding institutions.

<sup>&</sup>lt;sup>14</sup> Further challenges to IBRA came through the court system, where—even after a challenge to the constitutionality of IBRA's powers was dismissed—IBRA's bankruptcy petitions were rejected by judge after judge. Only in mid-2000 was IBRA to begin winning such cases.

comprehensible criteria for interventions into the banks, in view of the public perception that official treatment of the banks would vary according to their political connections. On April 4, seven banks—which had all borrowed more than 2 trillion rupiah (around \$200 million), <sup>15</sup> and which together were responsible for over 75 percent of total liquidity support—were taken over, their owners' rights were suspended, and management replaced. <sup>16</sup> Seven small banks, which had each borrowed more than five times their capital, were closed; their deposits were transferred to a designated state bank.

In the weeks that followed, liquidity support tailed off, although there was a major resurgence in May 1998, when amidst ethnic rioting there were massive withdrawals on some Chinese-owned banks—in particular the biggest private bank, Bank Central Asia (BCA), which was consequently transferred to IBRA. Once the situation was again stabilized—after the resignation of President Soeharto and his replacement by B.J. Habibie—the authorities turned to ascertain the true state of the banks in order to perform the conventional triage: to distinguish between those banks that were so weak that they had to be closed, those that could survive if supported, and those that were strong enough to survive on their own.

In this connection, the authorities recognized the need to value the banks in the most transparent and credible way possible. Over the following months, all remaining 211 banks were subject to audit, of which all the 67 banks that were licensed to conduct foreign exchange business were audited by the international representatives of the Big-Six-accounting firms. This contrasted with experience in Korea, where local affiliates of the international accounting firms had performed such audits; and Thailand, where the banks' auditors themselves performed the audits. The Indonesian approach was the most prudent of the three; indeed, the process was arguably over-prudent, in that the auditors were likely to be quite aggressive in recognizing loan losses, particularly given the environment prevailing at the time and the lack of western-style practices of documentation. The approach followed by Indonesia—which led to the auditors finding devastating losses in the banking system—may have, therefore, slightly exaggerated the difference between the state of the banks in Indonesia and those elsewhere, but it served to end any possibility of denial that the banks' condition was dire, and it formed the basis for the next steps of the restructuring strategy.

The desire to bring the full picture out up-front, so as to generate confidence in—and support for—the restructuring strategy, extended also to the handling of the prudential

<sup>&</sup>lt;sup>15</sup> All but two banks had borrowed more than 5 trillion rupiah; the two biggest borrowers had borrowed more than 30 trillion rupiah (around \$3 billion).

<sup>&</sup>lt;sup>16</sup> Except for the one state bank among these, which had needed support because of treasury losses rather than depositors' runs, and where the treasury team was replaced.

<sup>&</sup>lt;sup>17</sup> The remaining banks were audited by BI.

framework. Under the new regulations on classification and loan loss provisioning, all provisions on loans classified doubtful or loss had to be recognized up-front. This absence of forbearance contrasted markedly with earlier experience; the resultant capital asset ratios were in some cases horrific but could hardly be challenged as over-optimistic. Recognition that very few banks met the required capital adequacy standards led to a temporary reduction in the minimum required (to 4 percent, with the intention of returning to 8 percent by end-2001).

The auditors' analysis also confirmed that the banking crisis in Indonesia reflected deep underlying factors, and was not principally due to possible tactical errors in the initial handling of the situation. <sup>18</sup> The extent of delinquent loans, together with the high level of connected lending in many of the private banks, illustrated the degree to which in the pre-crisis period the state banks had been used as vehicles for directed lending to noncommercial ventures, and private banks as vehicles for channeling deposits to the owners. Banking supervision was largely ineffective, whether because of lack of capacity among the supervisors, or because the supervisors were constrained from doing their jobs. These patterns could remain largely hidden as long as the economy was growing at a fast pace, but once growth reversed the true situation would quickly be visible. <sup>19</sup>

By September 1998, the authorities had adopted a triple strategy for handling the banks. First, the seven private banks taken over by IBRA were to be assessed case-by-case in the light of the auditors' reports and an overall plan for the sector; second, the seven state banks were all deemed "too big to fail" and would be recapitalized once they had undertaken specified operational changes; and third, the remaining private banks would be triaged, with the middle group of banks eligible under certain conditions for joint recapitalization with the government. Details of the various plans are given in the following chapters.

The banking sector that had emerged by late 1999 was, thus, very different from that at the outset of the crisis. (Details of the various stages of the transformation of the sector are shown in Appendix I.) Four of the state banks had been merged to create Bank Mandiri, with almost 25 percent of the deposits of the banking system. This bank, together with the three other remaining state banks, comprised over 50 percent of the sector. Three of the banks taken over by IBRA in April 1998 had been closed in August 1998; another of these banks,

<sup>&</sup>lt;sup>18</sup> Some observers, such as Radelet and Sachs (1998b) criticize the initial bank closings, arguing that data on nonperforming loans, and other indicators of banks' performance, showed that the banks' position pre-crisis was slowly improving. The extent of the problems identified by the auditors in mid-1998 throws into severe doubt the accuracy of these pre-crisis figures.

<sup>&</sup>lt;sup>19</sup> Kaminsky and Reinhard (1999) find, in their cross-country study, that "problems in the banking sector typically precede a currency crisis—the currency crisis deepens the banking crisis, activating a vicious spiral... crises occur as the economy enters a recession."

Danamon, was designated in effect as a "bridge bank" and was in the process of merging with the three remaining banks taken over in April 1998, as well as the five banks taken over by IBRA in March 1999, to form the fourth largest bank in the country. IBRA still held three further banks, including BCA, but had plans to privatize them all over the coming two years. Seven private banks, comprising almost 10 percent of the banking sector, had been found eligible for recapitalization with the government,<sup>20</sup> and 73 small banks comprising 5 percent of the banking sector were deemed sufficiently strong to survive on their own. A further 38 private banks had been closed in early 1999. The 27 regional development banks, together comprising 2 percent of the banking sector, which had all been recapitalized by the government, made up the remainder of the domestically-owned banks in the sector. Thus, within the overall restructuring framework, the authorities had adopted a range of approaches depending upon the characteristics of the various banks: closures, mergers, recapitalization, and a bridge bank. Although the share of the public sector had risen to almost 75 percent of the banking sector, 21 this was seen as temporary, and the government expressed its commitment to progressively sell its holdings in the original state banks as well as in those it had taken over.

As part of the restructuring process, the state banks, those taken over by IBRA (known as the "BTO" banks), and the private banks, jointly recapitalized with the government, had been required to transfer to IBRA at zero price all their loss loans. Consequently, IBRA had become the biggest creditor of problem borrowers in the country. Thus asset management and recovery were largely concentrated in IBRA, although retail loans were left with the originating banks in view of IBRA's capacity constraints. This centralization was designed partly to improve the monitoring of loan recovery efforts, but also to maximize the use (and the threat of the use) of the special powers given to IBRA in the new law, recognizing the weakness of the creditors' position in the conventional legal framework. Plans for private asset management companies had emerged from time to time, but had generally appeared suspect, or at least nontransparent, from a governance point of view and had been rejected.

By end-1999 Bank Mandiri had been capitalized to the required minimum 4 percent CAR, on the basis of deep management changes and progress in implementing a radical restructuring plan; the other state banks, as well as the surviving BTO banks, were to be recapitalized in the early part of 2000, also on the basis of management changes and progress with implementing agreed business plans.

The groundwork was thus set for the reestablishment of a sound banking system. Many issues, however, still remained at this point. First, it was not yet clear to what extent the new managements would succeed in making use of their banks' new capital in turning the

<sup>&</sup>lt;sup>20</sup> Details of the recapitalization scheme are given in Chapter IV, Section B

<sup>&</sup>lt;sup>21</sup> See Figure 8 on page 121

banks around, in part because there was little history in Indonesia of commercial banking being conducted without outside interference. Second, and even more fundamentally, the structure of the banks' balance sheets was far from ideal, with the assets side in many cases dominated by the bonds issued to replace the loss loans, and the banks' fortunes thus bound up closely with the fortunes of the bonds. Thirdly, disposal of the assets acquired by IBRA had barely begun.

IBRA, meanwhile, had three principal channels through which it intended to recover as large a share as possible of the government's outlays on bank restructuring: first, IBRA's equity investments, principally the banks that it had taken over; second, the assets it had acquired through taking over the loss loans of most of the banking system, as well as all the assets of the banks it had closed; and third, potentially the largest source of recoveries, the so-called shareholder settlements, a locally-devised scheme whereby the state hoped in effect to recover from owners of the failed banks the bulk of the money expended on central bank liquidity support.

Conventional central banking practice is for liquidity support to be given to a bank in difficulty in exchange for collateral. In Indonesia during this period, however, there was very little useable collateral in the banks. BI therefore had extended liquidity on the basis of personal guarantees that the money would be used to meet deposit withdrawals and that the bank was in compliance with all prudential requirements.<sup>22</sup> Soon after IBRA took over or closed 14 banks in April 1998 (plus BCA a month later) it performed forensic audits on them, and found that 10 had been in violation of their prudential requirements, and had therefore violated the undertakings under which they had obtained their liquidity support. Using the threat of legal action, IBRA negotiated with the owners of these banks that they should provide IBRA with assets in line with the extent to which they had violated prudential requirements (generally the legal lending limits) in effect to compensate the state for the liquidity support.<sup>23</sup> Such an approach reflected the particular conditions in the Indonesian banking sector, in that it relied on the owners generally having substantial outside assets, even after the failure of their banks, and that they could be persuaded to cooperate with the authorities. In September 1998, IBRA announced agreement with the first bank, BCA, for a schedule of asset transfers, with the assets valued to be equal to the value of the bank's excess connected lending. Astonishingly, the day after the announcement of the agreement by IBRA, the government's coordinating committee announced that it rejected the agreement, reportedly on the grounds that the schedule for realizing the assets was too drawn out. Eventually, the issue was resolved through presidential intervention, with President

<sup>&</sup>lt;sup>22</sup> Several such contracts between the owners and the authorities were signed during the banking crisis—for instance, the owners had to undertake to cooperate with banking supervisors in exchange for participation in the blanket deposit guarantee scheme.

<sup>&</sup>lt;sup>23</sup> By this time the government had assumed BI's initial obligations in this regard in exchange for government bonds.

Habibie brokering an agreement under which assets would be placed into a holding company, controlled jointly by IBRA and the former owners, with the intention that the assets would all be sold over a four-year period. BCA again reached agreement fairly quickly, followed by several others. The owners of Bank Dagang Nasional Indonesia (BDNI), formerly the third largest private bank in the country, pledged assets that had been world class: the largest shrimp farm in the world, a large cement company, and the dominant Indonesian tire manufacturer. In a few cases, most importantly as regards Bank Danamon, the second largest private bank, the former owners had no remaining assets. In the case of four banks, involving three former owners, there was no cooperation with IBRA, and IBRA undertook to refer the owners to the attorney general for prosecution.

By late 1999, six holding companies had been established. However, no sales had yet been made, although preparations were in train for sales during 2000. Even more serious was emerging evidence of substantial declines in the asset values, making evident the governance problems in the design and the operation of the holding companies for the pledged assets—in particular the nonexclusion of the former owners from a management role. The overall effect was to substantially dilute IBRA's expected recoveries. And, once it was recognized that there had been such dilution, the authorities came under pressure—not least because of the potential resultant fiscal losses—to reopen the original settlement agreements and obtain further assets from the former owners.<sup>24</sup>

From the beginning of the crisis, the authorities had attempted to ensure the necessary coordination of the various interested government and other public sector agencies through a series of high-level committees. In late 1997 such a committee was established reporting directly to the President, but it rarely met and was not effective. Under President Habibie a Financial Sector Action Committee (FSAC)<sup>25</sup> was formed, comprising a number of the economics ministers and the Governor of BI,<sup>26</sup> under the chairmanship of Coordinating Minister Ginandjar. Although it too met only occasionally in the early months of the administration, it became increasingly intrusive as time went on. Feeling itself under increasing outside pressure, IBRA sought cover for itself by seeking approval from the FSAC for all transactions above a small de minimis level. On occasion there appeared to be overt

<sup>&</sup>lt;sup>24</sup> In August 2000, the Attorney General announced that he intended to take this course. On November 15, 2000, the authorities announced tentative agreement on the transfer of additional assets with the former owners of the three largest banks involved. As of April 2001, however, this agreement has still not been finalized.

<sup>&</sup>lt;sup>25</sup> An analogous Financial Sector Policy Committee was later established by President Wahid. This too has been assertive in seeking control over the operations of IBRA.

<sup>&</sup>lt;sup>26</sup> Once BI was granted independence, it adopted a purist position about inclusion in government committees. The governor thereafter participated in the FSAC only as an observer.

political interference, for instance, when the FSAC rejected the initial shareholder settlements that had been negotiated by the IBRA management.

One area where political involvement periodically undermined the credibility of the bank restructuring was in relationship to ethnic issues. This led to demands for nonuniformity of treatment in, for instance, the private bank recapitalization scheme, where there was some resistance to the joint recapitalization of those eligible banks that were "Chinese," on the grounds that the government should support the indigenous business community. This tension reached its peak in February 1999 and contributed to the postponement of the prepared resolution of the private banks while some groups sought to rebase the proposed resolutions on to a more ethnically-based system. In part because of awareness of the hostile reaction that such a move would prompt in the international community, other public agencies, in particular IBRA, sought throughout to maintain uniform criteria across the banking system. The clear application of such uniformity, once the bank closures and recapitalizations were announced in March 1999, added immeasurably to the credibility of the bank restructuring process and proved to be a definitive turning point in the restoration of confidence and stabilization of the economy.<sup>27</sup> Once again, adherence to uniform and credible criteria for determining interventions into the banks was paramount in achieving credibility in the bank restructuring program.

One important theme during the crisis was the need to reduce the degree of centralization in the monetary sphere, both as regards allowing the markets to have a greater role in allocating resources and, institutionally, in allowing the responsible monetary institution, i.e., the central bank, independence from government.

As regards the first of these, at the outset of the crisis key interest rates were determined at the level of the Presidency. After 30 years without fiscal deficits, there was no government bond or treasury-bill market. There was a market in discounted commercial paper (so-called SBPU) but rates were barely market driven. Central bank paper was essentially placed at administered interest rates. From early 1998, BI prepared for the auctioning of central bank bills (SBI), in order to create a market-driven benchmark interest rate. Infrastructure had to be developed from the very basics, since there was no experience of domestic market auctions. After being delayed by the ethnic rioting of May 1998, auctions of one-month SBIs began in July 1998. Initial interest rates at around 70 percent reflected the seriousness of crisis and the authorities' attempts to sell sufficient SBIs to stabilize monetary

<sup>&</sup>lt;sup>27</sup> The takeover by IBRA of some banks that would otherwise have been closed, on the grounds that they each had at least 80,000 depositors, was seen by some observers as an attempt to give preferential treatment to some banks owned by ethnic-Indonesians, especially as the well-connected owner of one of these banks made public statements that he was still effectively in charge of his bank. This view was gradually shown not to be valid as the former owners and managers were excluded from the banks, and the banks themselves were prepared for downsizing and merging within Danamon.

conditions. As the market deepened, the authorities were able to establish a three-month SBI market. Interest rates fell dramatically, particularly once the bank closures of March 1999 showed that the authorities were coming to grips with the banking problems. However, plans to move out to a six-month maturity were put on hold in late 1999, as confidence weakened in the wake of a series of scandals in the run-up to the Presidential election. By the end of 1999 preparations were in train for the start of trading of the bonds that were being issued as part of the banks' recapitalization. However, no significant immediate pick up was expected as tradability began, because of the limited infrastructural preparation (there were no bond prospectuses to international standards), continuing political uncertainty, and the tight country limits against Indonesia maintained by most international investors.

A major institutional development was the passage of a new central bank law in 1999, which gave independence to BI and made it more accountable through requiring periodic presentations by the governor to parliament. The law also heavily constrained BI in its ability to lend to the government or to the banks. Lawmakers had been unable to decide whether to leave banking supervision in the central bank. One provision of the law said that a new financial sector regulator would conduct supervision by the end of 2002. However, separate legislation would be needed to establish that regulator; if such legislation could not be passed, supervision would remain in BI.<sup>28</sup>

While the elements of the bank resolution strategy were slowly put in place, the costs continued to soar. By the end of 1999, 500 trillion rupiah of bonds had already been issued, and it was expected that an additional amount of some 140 trillion rupiah would be needed during the first half of 2000, bringing the total to 640 trillion rupiah, or 52 percent of GDP.

By the end of 1999 much had been achieved in restructuring the banking system. The largest of the state banks had been recapitalized, having implemented the first phases of its business plan; most of the banks taken over by IBRA were being merged into a bridge bank; the largest IBRA bank was in preparation for privatization; the private bank recapitalization scheme had been implemented; BI had introduced new prudential regulations; BI was now independent; and a strategy was in place for the remaining stages of the restructuring.

Nevertheless, much remained to be done, with many risks, in particular those relating to the governance of the process. Several high officials were being investigated in connection with a banking scandal; progress in the restructuring of some of the state banks seemed to be progressing very slowly; IBRA had barely begun selling its assets and was having great difficulty securing bankruptcy judgments in its favor in the courts; and while BI's new regulations were now in place, it was not clear how far compliance was being monitored or enforced. Important opportunities had been lost: IBRA had failed to sell any of the banks it had taken over, and the acquisition of a major private bank by an international bank—which

<sup>&</sup>lt;sup>28</sup> Subsequent parliamentary discussions on the central bank law led also to moves to bring forward the removal of supervision from BI.

had generated positive front-page news headlines worldwide when it was announced in mid-1999—had fallen through. The banking system as a whole remained severely undercapitalized. The success of the overall restructuring plan, in terms of achieving a sound banking system on a sustained basis, was as yet very far from assured.

#### III. BANKING SECTOR DEVELOPMENTS: 1988-1999

# A. Phase I—1988-August-1997: An Unbalanced Financial Sector Liberalization

#### The 1988 liberalization measures

In October 1988 a comprehensive package of deregulation measures was introduced for the Indonesian banking system, including the liberalization of the requirements for the establishment of new private domestic banks and joint-venture banks. The number of banks increased substantially, from 111 in 1988 to a peak of 240 in 1994, with a large number of local conglomerates establishing their own bank. However, while the doors were wide open for new banks to enter the market, no proper exit mechanism was set up for banks that failed to operate profitably.

In late 1988 several smaller banks started to experience severe liquidity problems requiring emergency liquidity support from BI. The problems derived from depositors' withdrawals, prompted by fears that these banks were facing serious difficulties not reflected in their financial statements, in particular with regard to the adequacy of asset quality assessment and the accrual of interest income.<sup>29</sup>

In the following years, with technical assistance from various sources, including the IMF, the regulatory and supervisory framework achieved substantial progress. However, enforcement, particularly of the legal lending limit, remained a constant problem and no progress was achieved in the definition and implementation of an exit mechanism for failed banks.

#### The Bank Summa incident

Bank Summa provided a clear illustration of the flaws pervading the banking system in the early 1990s. The bank was part of the Astra group, one of the major private diversified groups in Indonesia. It was among the larger banks, with liabilities of \$750 million (0.6 percent of GDP), and began to face serious financial problems in the second half of 1990, mostly as a result of the deteriorating quality of its large portfolio of loans. Most bad loans were in the real estate sector, and 70 percent of these loans had been extended to related parties, exceeding the legal limit by far. The bank was rated as "poor" by BI in

<sup>&</sup>lt;sup>29</sup> Discussion of these problems is contained in Djiwandono (1997).

October 1990, and then downgraded to "unsound"—the lowest level—in July 1991. For two years BI relied on its traditional approach of holding talks with the shareholders and trying to convince them to solve the bank's problems while continuing to provide liquidity support, which at the end amounted to 25 percent of the bank's total liabilities. In June 1992, a memorandum of understanding formalized the owners' commitment to repay the nonperforming connected loans and recapitalize the bank. However, the owners failed to meet their commitment and the bank's financial condition continued to deteriorate. Faced with ever-growing liquidity needs, BI decided in November 1992 not to grant any additional liquidity support, and excluded the bank from the clearing house. After the failure of a BI-brokered rescue plan, Bank Summa's license was revoked in December 1992.

In line with the law, the management of Bank Summa was itself given the responsibility of liquidating the bank under BI's supervision. The process was long and difficult, including public protests and street demonstrations directed against BI. This strenuous experience, and the inadequacies of the legal framework for problem bank resolution that it revealed, reinforced BI's view that bank closures should be avoided at almost all cost. This view was to color BI's thinking over the coming years, meaning that even as increasing numbers of banks fell into difficulty, BI recoiled from active intervention, allowing the banks to deteriorate until late-1997, by which time the system had fallen into crisis.

#### Problems in the state-owned banks

The state-owned banks traditionally held a dominant market position in Indonesia, with some 70 percent of market share at the time the liberalization measures were introduced. Nevertheless, these banks had demonstrated protracted financial weaknesses, deriving in particular from the poor track record of repayment of their loans, especially those extended to the largest and most influential Indonesian conglomerates. Extensive and repeated financial support over a number of years had become necessary, and was provided on several occasions with World Bank participation.

During 1992–1993, the World Bank participated, through a Financial Sector Development Project (FSDP), in a \$4 billion (close to 4 percent of GDP) recapitalization plan for the state-owned banks, of which \$300 million was financed by a World Bank loan and the balance mainly by conversion of subordinated loans and cash injections from the budget. The recapitalization needs were assessed through asset reviews by BI teams assisted by foreign consultants, who determined the needs for loan-loss provisions based on generally accepted banking principles. As part of the FSDP, some 12 resident banking supervision advisors to BI were also funded by the World Bank.<sup>30</sup>

<sup>&</sup>lt;sup>30</sup> The presence of this large number of advisors demonstrates that weaknesses in BI's supervision operations (discussed in Chapter IV, section D) did not stem from absence of technical assistance, but rather from unwillingness or inability to implement the results of that assistance.

In May 1993, a high level State Bank Credit Supervision Committee (SBCSC) was established to improve the follow up of the implementation of the recapitalization plan. The SBCSC consisted of two Ministry of Finance (MOF) directors, two BI managing directors, plus a ten-staff secretariat, and several World Bank consultants. It was responsible for monitoring both the collectibility of existing loans and the issuance of new loans, and to report quarterly to the Minister of Finance. The situation of the 50 largest borrowers was reviewed every month.

The results were uneven. In February 1994, the so-called "Golden Key incident," in which the owner of the Golden Key company disappeared overseas with huge amounts of Golden Key's (borrowed) resources, brought to light losses of \$340 million faced by a state bank, BAPINDO, which became insolvent as a result and required emergency BI liquidity support. These losses were seen to be the result of large-scale fraud and collusion between the borrowers and some of the banks' officers. <sup>31</sup>

As of the summer of 1997, the World Bank considered that problems remained especially in two of the state banks: Bank Bumi Daya and BAPINDO. The former had fallen behind its agreed restructuring schedule, and the condition of the latter bank had actually deteriorated further under the World Bank program. A merger plan for these banks was approved by President Soeharto in June 1997.

# Pre-crisis financial position of banks and corporations

As of June 1997, the estimated aggregate solvency position of banks and corporate groups can be summarized as follows (in billions of U.S. dollars):

	Banks	Corporations	Bank and corporations
Assets	226	310	536
Liabilities	209	210	419
Equity	17	100	117
Assets/liability (%)	108%	148%	128%

Sources: BI and staff estimates

The first column features the aggregate solvency position of the banking sector as declared, showing a surplus of assets as compared with liabilities of 8 percent, which could

<sup>&</sup>lt;sup>31</sup> More details of these issues can be found, for instance, in Cole and Slade (1998).

be considered narrow but still acceptable. However, especially given the accounting deficiencies that were to become apparent and the inadequate levels of provisioning (see below), the real financial condition of the banks was far more fragile, with a surplus of assets over liabilities too thin to cushion any significant macroeconomic shock.

Since the banking and corporate sectors were particularly closely intertwined, with a number of banks being little more than the funding arm of the conglomerates to which they belonged, the second column features, for comparison purposes, the corporate sector's equity position. It shows that the corporate sector posted substantial equity, around six times more than the banking sector. The magnitude of the imbalance in leverage at the onset of the crisis indicated that many banks were being used to serve the needs of their affiliated corporate borrowers, and were not being resourced sufficiently to carry out their task on a sustainable basis.

# B. Phase II: October-November 1997: Macroeconomic Disturbances and Contained Banking Difficulties

After the unpegging of the Thai baht on July 2, 1997, the rupiah came under severe downward pressure. The authorities widened, and then abandoned the band for the rupiah on August 14, and by October 1997 the currency had depreciated by close to 40 percent—at this stage already the largest depreciation of the Asian crisis countries. When Indonesia requested the IMF's assistance in early October 1997, a critical issue was seen to be the impact of the macroeconomic disturbances on the banking sector. Owing to the concerns about the real condition of the banks, a review of a wide section of the banking system was undertaken.

# Sample of banks selected for review

The financial condition of a sample of individual banks, large enough to include all institutions of a meaningful size and capture as many weak and problem banks as possible, was reviewed as part of the preparation of the program. The selected reference date for all data was June 1997 as this ensured the complete availability of all necessary information, together with a range of half-yearly reports and financial statements. Among the 238 commercial banks operating as of October 1997, 92 were selected for individual financial review and analysis on the basis of a number of criteria:

• **State ownership:** all seven state-owned banks. They represented 40 percent of the total assets of the commercial banks as of the end of June 1997.

<sup>&</sup>lt;sup>32</sup> These countries are defined, for the purpose of this study, as Indonesia, Korea, Malaysia, the Philippines, and Thailand, although recognizing that Malaysia and the Philippines managed to avoid a full crisis during this period. For more on the Asian crisis countries, see Lindgren, et. al. (1999).

- History of past financial fragility.
- **CAMEL rating:** all banks rated by BI's internal CAMEL system as "Poor" (17 banks) or "Unsound" (28 banks).
- **Size:** any bank not yet selected and representing at least 1 percent of the total assets of the banking system, or 10 percent of the assets of the category of banks to which it belonged. <sup>33</sup> On this basis, 9 large private banks, and 3 of the 27 Regional Development Banks, i.e., a total of 12 banks, were added.
- **Public information:** banks that were mentioned in the press, either as facing difficulties or as being reviewed by rating agencies for possible downgrading.
- **Growth:** banks that had grown particularly fast over the preceding years.
- Interbank market standing: banks paying the highest rates on the interbank market.
- **Links with problem banks:** an apparently sound bank was included when it was discovered that it had close links, and in particular a massive interbank exposure, with a bank determined to be facing severe financial difficulties.

In total, the sample included 92 banks, comprising 85 percent of the total assets of all commercial banks as of June 1997, and covered the different categories of banks as follows:

	Total Number	Share of Assets	Included in sample	Share of Assets
State banks	7	39.82%	7	39.82%
Private Fx banks	80	43.94%	40	40.08%
Private Non-Fx banks	80	5.49%	30	2.65%
Regional Development banks	27	2.46%	13	1.87%
Joint-venture banks	34	4.74%	2	0.31%
Foreign banks branches	10	3.55%	0	
All commercial banks	238	100%	92	84.73%

Sources: BI and staff estimates

# Objective of the individual assessments

The objective of the individual assessments was to detect any bank that might be insolvent or have been seriously weakened. Insolvency was defined, in line with international

<sup>&</sup>lt;sup>33</sup> Only one exception was made, for the local branch of a major international bank.

accounting standards and established practices, as the financial condition of a bank whose assets, estimated at fair market value, were smaller than its liabilities assessed in the same way. The general accounting principles of materiality and of substance over form were also applied. The most significant resultant adjustment from banks' reported figures was that, to address the widespread "evergreening" of bad loans, impaired assets which had been restructured over a large number of years with a low nominal yield (typically around 1 percent p.a.) were discounted to their present value, i.e., deemed largely valueless.

#### Results of the individual assessments

The review of the condition of the 92 selected banks led to the conclusion that 34 banks were insolvent, including 2 state-owned banks, 6 regional development banks, and 26 private banks.

As part of the IMF-supported program, specific open bank resolution measures were agreed for the two insolvent state banks, which had been until recently the focus of the World Bank's restructuring programs, and for the six insolvent regional development banks.

The 26 insolvent private banks belonged to two distinct groups. The first consisted of 16 banks (market share: 2.5 percent) for which the financial situation was particularly dire, and the prospects for recovery very bleak, and which would have required massive injections of public funds. No exceptions were made at this stage, and all these banks were treated equally and marked for liquidation.

Several banks that were particularly well connected politically were included among the 16, including 3 banks that had direct family links with President Soeharto. These included Bank Andromeda, owned by one of the President's sons; Bank Industri, whose main shareholders included one of the President's daughters, and Bank Jakarta, controlled by the President's half brother. Indeed, the public was so convinced that Bank Jakarta would be protected because of its political connections that up to the day of its closure the bank received an inflow of deposits seeking shelter out of fragile banks.

The 10 other insolvent banks (market share: 3.0 percent) were already engaged in a process of resolution under BI's monitoring. For each of these banks a rescue package, under the auspices of BI, had been put in place earlier, with new investors replacing the former owners and managers. These rescue packages were each detailed in a legally binding contract signed by BI and the new owners. All these packages included the following elements, with slight variations:

- the new investors agreed to take over the bank and to bring in some capital, covering a small fraction of the losses;
- the nonperforming assets were restructured over a long period (typically 20 years) with a low interest rate (usually 1 percent);

- the new investors made a deposit in an escrow account, which constituted the cash collateral for the restructured bad assets. The escrow account was far smaller than the bad assets, but it had a high interest rate, in the order of 15 percent. Thus, at a distant point in time the balance of the escrow would catch up with the restructured bad assets and would make it possible to repay them. The bad assets were then considered as fully collateralized in cash, and reclassified as good assets. Provisioning was no longer required, and the bank appeared solvent again.
- BI provided a long-term, low-interest subordinated loan structured in such a way that the present value of this concessional loan for the new investors was equal to the losses of the banks they were taking over.

Although these banks appeared solvent upon first examination of their balance sheet, they were in actuality still insolvent because their posted equity was smaller than the difference between the present value of their restructured (essentially worthless) assets and that of the escrow account guaranteeing them. These banks were also structurally impaired, burdened by large unallocated losses. Prospects for their survival were bleak, and the likelihood of facing problems again in the future high. However, because the agreements reached between BI and the new owners and managers had been put in formal legally binding contracts that BI could not cancel unilaterally as long as the other party was complying with its side of the agreement, these banks were not closed.

In addition to these 34 insolvent banks, the reviews also identified 16 weak private banks, with problems of varying degrees of seriousness. These included several of the largest banks in the country, and represented together 18.9 percent of the total assets of the commercial banks. The weak banks were placed under conservatorship, or entered into rehabilitation plans addressing their specific weaknesses and contained in a memorandum of understanding, or were placed under intensive supervision.<sup>34</sup>

# October 31, 1997, policy package

A policy package aimed at restoring health to the banking sector was incorporated into the comprehensive adjustment program agreed with the IMF. It included the various measures and decisions described above, both for the insolvent and for the weak banks. It covered 50 banks representing 24.4 percent of the banking system.

At that stage, it was the general assessment that the problems in the banking sector did not have the characteristics of a systemic banking crisis: the state-owned banks' weaknesses appeared manageable in the context of their ongoing adjustment programs; most

<sup>&</sup>lt;sup>34</sup> Radelet and Sachs (1998a) argue in favor of nursing-type arrangements rather than bank closures. The clear failure of this approach—which had been pursued in Indonesia for several years—casts doubt upon this recommendation.

major private banks—among them some highly regarded by the international banking community—still reported comfortable cushions of positive equity; and depositors' limited runs so far had essentially reflected flight to quality.

The section on the banking system of the Letter of Intent signed by the government of Indonesia on October 31, 1997 did not reveal the names of the insolvent and weak banks, for obvious reasons. Therefore, only the measure applied to the 16 insolvent banks not already operating under the so-called "nursing" agreements—namely immediate liquidation—became known to the public when the authorities actually closed them on November 1, 1997. The authorities decided to protect depositors up to Rp 10 million (around \$3,000 at the prevailing exchange rate), which covered some 90 percent of the depositors, but a far smaller share—under 25 percent—of the deposits. A full guarantee of the deposits was not thought appropriate at that stage, in part because of the moral hazard issue: most of the banks that were closed had been offering deposits rates far above market rates while it was widely known to the public that they were in dire financial condition.

The actual process of closure was carried out smoothly. Despite having no significant earlier experience of bank closure, BI was able to carry out the logistics effectively. Eligible deposits were transferred promptly by BI from the closed banks to designated recipient banks.

The immediate response to the announcement of the program was positive. The exchange rate rebounded from its earlier steep falls. The fact that several well-connected banks had actually been closed was perceived as a major turning point for the country. In the following days, the public observed with astonishment the son of President Soeharto, who owned Bank Andromeda, protest loudly but to no avail against the closure of his bank. Similarly, the President's half brother initially rejected BI's decision to liquidate his Bank Jakarta and kept it open, but had to give up after a few days and see it closed.

# C. Phase III: December 1997: The Banking Situation Gets Out of Control

Within a few weeks, however, the positive sentiment was entirely reversed. A number of elements contributed, in proportions which remain a matter of judgment, to trigger the turnaround:

- the rapid deterioration of the situation in Korea, after Thailand and Indonesia, seemed to indicate that the events of the previous months had been only the prelude to serious international difficulties;
- the rapid deterioration in the domestic economic environment, with sharply rising interest rates and a simultaneous depreciation of the rupiah;
- the impact of these developments on bank profitability and on public confidence in the banking sector;

- rumors about the President's health, reinforced by his last minute cancellation of a high-profile trip abroad, added an atmosphere of political instability, particularly given the lack of clarity regarding a successor;
- the credibility of the bank resolution program was shattered when the President's son, whose Bank Andromeda had been closed on November 1, was allowed to take over the tiny Bank Alfa; he then transferred into it most of his former activities, customers, and staff, effectively reopening his former bank under a new name. Domestic and international observers concluded that no real changes had actually taken place. Combined with several other signs that the authorities were not genuinely determined to implement the program agreed with the IMF, this fostered a perception that the root causes of the crisis were not being tackled;
- in response to losses from off-balance sheet trade credits to the closed banks, foreign banks cut lines to the banking sector as a whole;
- trust in the banking sector dissipated. Although it was known that not all problem banks had been closed in early November, the reason why some had been kept open, namely the existence of an ongoing rehabilitation plan signed with BI, had not been made public and explained, triggering suspicion of preferential treatment. The Bank Alfa incident compounded this suspicion. In the fast-deteriorating international and domestic environment, even the best banks in the country began losing the public's confidence.
- the large depositors that had lost money in the closed banks included powerful foundations and pension funds. BI staff were threatened and intimidated, and there were reports of more widespread destabilization.

By early December 1997, bank runs—which earlier had been largely a flight to perceived quality, i.e., transfers of deposits from weak private to state and foreign banks—had become pervasive across the system, along with rumors that a new wave of bank closures was under preparation. By mid-December 1997, 154 banks, representing half of the total assets of the system, had to varying degrees faced some erosion of their deposit base.

The segmentation of the interbank market intensified. At that stage, a group of 24 banks that included state-owned banks, foreign banks, and the largest private banks, transacted mostly among themselves and only exceptionally with the other banks. While these 24 banks had excess liquidity, the other banks—mainly small- and medium-sized private banks—faced a serious situation of liquidity distress and had difficulty borrowing in the interbank market. Average interbank market rates for overnight funds for these banks had increased from 35 percent at end-October to 57 percent by November 7, 1997. However, the average overnight rates of the 24 prime banks decreased from 30 percent to 18 percent during the same period.

BI was reluctant to consider any additional bank closures at that stage, and thus had no other option but to provide liquidity to banks unable to borrow from the market. BI liquidity support increased from about Rp 24 trillion at end-October 1997 (3.5 percent of GDP) to Rp 34 trillion (5 percent of GDP) in mid-December. Insofar as the liquidity support, paid in rupiah, was needed by banks to meet reductions in dollar deposits, it served in effect to fuel the continuing depreciation of the exchange rate. Concerns over banks' safety had merged into broader concerns over the currency and indeed the stance of economic policy overall. Dollar withdrawals from the banks led to concerns about banks' ability to continue to meet the demands for liquidity, prompting further withdrawals. At this point the crisis had become fully systemic.

# D. Phase IV: January-February 1998—Laying the Ground for the Stabilization of the Banking System

During January 1998, the rupiah depreciated steeply: the rate fell from 4,600 rupiah per U.S. dollar at end-December 1997 to 14,000 rupiah per U.S. dollar in late January 1998, with some trades even at 17,000 rupiah.<sup>35</sup> With depositors withdrawing dollar deposits from the banks, and the banks thereupon seeking rupiah liquidity to change in the market to meet their customers' demand for dollars in the absence of a functioning interbank market, BI continued to provide emergency liquidity support to the banking system. This support rose to more than 60 trillion rupiah (7 percent of 1997 GDP) by late January 1998, and the prospect of hyperinflation and complete financial sector meltdown became increasingly real.

On January 27, 1998 the government introduced a new financial sector strategy, the immediate priority being to avoid a collapse and to stabilize the banking sector. A three-point emergency plan was announced. First, all depositors and creditors of all domestic banks were, henceforth, to be completely protected. Second, IBRA was established for a period of five years, under the auspices of the MOF, to take over and rehabilitate ailing banks and manage the nonperforming assets of intervened banks. Third, a framework for handling corporate restructuring was proposed. The impact of the announcement was immediate, with the exchange rate recovering to 10,000 rupiah per U.S. dollar and appreciating further in subsequent days; 4 trillion rupiah of deposits flowed back into the banking system. Restrictions were placed on banks' activities to mitigate the moral hazard effects of the blanket guarantee: for instance, deposit rates were capped.

In the following two months, efforts were made to reestablish monetary control by rationalizing BI liquidity facilities, and developing effective penalties to deter banks from seeking access to these facilities. At the same time, the authorities moved quickly to make IBRA operational. A highly regarded senior MOF official was appointed as its head;

<sup>&</sup>lt;sup>35</sup> Mishkin (1999) has pointed out in his asymmetric information view of the Asian crisis how such currency depreciation exacerbates the distress of the financial sector. This also underlies the framework for analyzing the Indonesian crisis presented in Appendix II.

additional MOF staff, and several hundred BI supervision staff, were seconded to IBRA in order to provide immediate staffing.

Meanwhile, the authorities made efforts to obtain a firmer grasp on the pressures in the banking sector. The problems of depositor withdrawals were being compounded by cuts in interbank lines and the elimination of many trade lines, even after the introduction of the guarantee. In response, BI (with assistance from the IMF) established a system for daily interbank debt monitoring, including reporting daily rollover rates of bank debt by type of instruments, along lines developed during the Latin American banking crises of the 1980s.

By mid-February 1998 IBRA was ready to take action. It proposed that all banks that had borrowed from BI at least twice their capital should be brought under its auspices, with IBRA officials on-site at all head offices and principal branches, and all owners of "IBRA banks" working under MOUs agreed with IBRA restricting their activities. On Saturday, February 14, the owners of 54 banks, comprising 36.7 percent of the banking sector, of which 50 had borrowed heavily from BI and four were state banks under restructuring programs, were summoned to BI, warned about their perilous financial condition, and invited to apply to come under the auspices of IBRA. All the bankers agreed. IBRA officials entered their banks before business began on the following Monday.

While the interventions were determined on a transparent and uniform basis and were carried out smoothly, the government introduced a last-minute change that severely undermined the operation: President Soeharto decided that there should be no publicity. Thus, instead of being able to demonstrate that they had started to take hold of the situation, IBRA officials had to work over the following weeks against a public perception that IBRA was still nonoperational. Also, with the lack of publicity accorded to the operation, IBRA officials in the banks appear to have carried little credibility or authority. They were not able to assert full control over the staff of the institutions, and to make clear to the staff the new direction in which the banks were now to be going. IBRA was weakened further over the following weeks. The first head of IBRA was dismissed in late-February and was replaced by a BI managing director. Meanwhile, some BI staff were withdrawn from their assignment into IBRA. No visible changes were introduced in the management or policies of the banks under IBRA.

# E. Phase V: March-May 1998—First Resolution Initiatives and New Shock

The ensuing three months saw the authorities taking a series of initiatives to resolve the problem of ailing banks, but then facing a major new shock. With monetary conditions progressively being brought under control, the main focus turned to establishing the necessary infrastructure for handling the banking crisis: making IBRA operational, preparing the legal framework, obtaining better information on the financial condition of the banks, and beginning to take action.

In March 1998, BI announced the redesign of its liquidity support facilities. Until then, support had been provided through several windows with the deterrent to usage, in

theory, applied through highly punitive interest rates. Virtually no banks, however, were paying these rates, which were therefore routinely capitalized, causing a rapid further expansion in outstanding liquidity support. The new system involved a single liquidity facility with interest rates generally only a small margin above market rates. The new focus was on nonmarket sanctions: any bank with borrowings outstanding for more than a week would have a special BI inspection that would lead to a report within a further week and increasing restrictions on the bank's activities, culminating in possible transfer to IBRA.

By late-March 1998, the new IBRA management team was ready for more substantive intervention into the most critical of the IBRA banks. On April 4, in its first major public action, IBRA took over the seven banks that had each borrowed more than 2 trillion rupiah (all but two of these had borrowed more than 5 trillion rupiah each, and two of them over 30 trillion rupiah); together they comprised around 16 percent of banking sector assets and accounted for around 72 percent of the total BI liquidity support to the banking system. The focus at this stage was on liquidity, rather than solvency, criteria to determine which banks should be intervened, partly because reliable data on the solvency condition of the banks were not available in the ongoing financial turmoil and the liquidity criteria could be regarded as proxies, and partly because of the urgent need to tackle the provision of BI liquidity support itself in order to stabilize monetary conditions. Of the six private banks among the banks taken over, owners were suspended and managements removed; new managements were put in place through twinning arrangements with designated state banks.<sup>36</sup>

At the same time, seven smaller banks, comprising 0.4 percent of the banking system, which had each borrowed more than 500 percent of their capital, were closed; all deposits were transferred over that weekend into a designated state bank, Bank Negara Indonesia (BNI). Efforts were made to ensure uniform application of objective criteria in the choice of both sets of banks, and there was an intensive and professional public relations campaign over the weekend to explain the moves to the public. As a result, the moves were received favorably in the markets; there were sporadic runs on a few of the taken-over banks, but these tailed off. These actions were a major step to demonstrate the authorities' commitment toward bank resolution and finalize a revised IMF program in late-April 1998.

In mid-May 1998, however, widespread ethnic riots led to a reversal of the recent stabilization of the rupiah and a further loss of confidence by both domestic and foreign investors.<sup>37</sup> In the aftermath of the riots there were massive prolonged runs on Bank Central

<sup>&</sup>lt;sup>36</sup> As noted above, in the remaining state-owned bank, liquidity problems derived from trading losses rather than depositor withdrawals; treasury staff were replaced and investigated for possible criminal prosecution.

<sup>&</sup>lt;sup>37</sup> The riots were directed at Indonesians of Chinese descent, who were blamed by some elements of the public for the economic collapse. Persistent reports indicated that the riots were deliberately instigated by elements of the government and/or the military.

Asia (BCA), the largest private bank, accounting for 12 percent of total banking sector liabilities. Given the circumstances, support was provided relatively smoothly, with BI, in conjunction with two of the state banks, supplying over 30 trillion rupiah in cash to BCA over the week following May 16, as deposits were withdrawn. On May 29, 1998 BCA was brought under the auspices of IBRA, the owners' rights were suspended, and an outside management team introduced. By the end of the month, runs on BCA were tailing off. But BCA apart, total liquidity support to the banking sector had remained by-and-large stable since late-April 1998.

The specific nature of the attacks against BCA was especially devastating to confidence in the banking sector, with many viewing the run on the bank as politically inspired. In this environment, other bankers sought to maximize their immediate liquidity in order to protect themselves in the event of runs. The stock of vault cash increased, intermediation declined even further, and interbank markets became more segmented. With interest rates rising in the face of the uncertainty, banks bid up deposit rates to levels substantially above those that they were able to charge their borrowers. The sizeable negative interest spreads across much of the banking sector caused a continuing erosion of the capital base of the affected banks. Nevertheless, liquidity support from BI—apart from that to BCA—remained limited, and BI was increasingly successful in stabilizing monetary conditions in line with commitments under the IMF program.

Meanwhile, the bank restructuring process was given a fresh impetus. A third head of IBRA was appointed, a finance ministry official with previous experience in international banking. Continuity in the restructuring process was assured with the appointment of the first head of IBRA as Finance Minister in the new Habibie government. The team needed to ascertain the true condition of the banks in order to undertake appropriate remedial action. The banks' own reported figures were clearly deeply unreliable, with many banks still posting profits in early 1998 on the basis of unrealized foreign exchange valuation gains and lack of recognition of the deterioration in their loan portfolios. In March 1998, BI had announced new provisioning and classification guidelines, broadly in line with international standards, but application was very patchy in part because of the lack of expertise both at BI and in the banks. International auditors were contracted—financed by the World Bank in the case of the 54 IBRA banks, and by the Asian Development Bank in the case of the major non-IBRA banks—to conduct portfolio reviews on the basis of international accounting standards and using the new classification and provisioning rules. As these were completed, they confirmed the picture of deep and pervasive problems.

#### F. Phase VI—June-September 1998: Design of a Comprehensive Resolution Strategy

Action toward the resolution of ailing banks resumed when the audit results became available. In June, the results of the portfolio reviews of the six private banks among the

 $<sup>^{38}</sup>$  See Appendix II for a discussion of banks' reported and adjusted financial positions.

seven banks taken over by IBRA in April 1998 showed nonperforming loans of at least 55 percent in each of the banks, with over 90 percent in one large bank. Most of these banks' loan portfolios were dominated by connected lending. Although there was some question as to whether the accountants had been excessively diligent in marking down the portfolios, there could be no dispute of their finding that the examined banks were deeply insolvent. Very soon after their completion, the results of the audits were leaked to the press. There was an immediate shock that the state of the banks was so bad; beyond that, however, the leaks prevented any further denial of the seriousness of the crisis and forced the authorities to recognize that drastic action was urgently needed.

The two largest banks taken over in April (BDNI and Danamon) were listed on the Jakarta stock exchange. Under stock exchange rules, shareholders' stakes could only be written down after a declaration of insolvency of a bank; this in turn required the calling of an extraordinary shareholders' meeting. In July 1998 IBRA obtained a declaration of insolvency for Danamon; the shareholders of BDNI, however, used technical procedures to prevent such a declaration for that bank.

By this time the authorities had begun to develop an overall plan for the eight banks they had taken over. The one bank taken over in May (BCA) was considered inherently sound, and IBRA began considering options for its disposal. The one state bank (Eximbank) was essentially moved out of IBRA, pending merger with other state banks.<sup>39</sup> Two of the remaining banks had been found to have almost no performing loans, and were therefore to be closed. The largest remaining bank (Bank Danamon) was viewed as a sort of "bridge bank"—i.e., a repository for assets and liabilities of other banks, and possibly a source for specified banking services—and was therefore to be kept open under IBRA control. The other two banks were to be merged into the bridge bank in the event that IBRA could not sell them within a specified period of time.

On the weekend of August 20 IBRA therefore closed three banks, representing 6 percent of the deposits of the banking sector. Resource capacity was severely stretched, in part because the earlier mass secondments of staff from BI to IBRA had already been severely cut back. Deposits of the closed banks were transferred over the weekend to BNI. IBRA also intensified its control over its banks that remained open.

In the period thereafter, the IBRA management team in Danamon (and to a lesser extent those in the other banks taken over) made considerable efforts to restore the bank's earlier deposit base. Deposit interest rates were set among the highest of any major bank in

<sup>&</sup>lt;sup>39</sup> Four private banks were tentatively also moved out of IBRA, on the grounds they no longer met the initial entry conditions for IBRA. After remonstrations from the international financial institutions, the authorities reversed themselves and agreed that there would be no exit from IBRA before completion of the full diagnostic investigation into a bank's condition.

the country. Over the following months deposits increased fivefold. While this may have looked good from the point of short-term stabilization of the banking sector, the large volume of additional deposits generated on the basis of a substantial negative interest margin added considerably to the ultimate cost of recapitalizing the bank.

Meanwhile, by early August the results of the portfolio reviews for a first group of 16 large private banks, all of them non-IBRA except for BCA, were becoming available. These showed that the banks were, in general, clearly different from the IBRA banks, in terms of risk controls, compliance with prudential norms, and overall quality of management. Nevertheless, the financial condition of these banks too was shown to be very weak, with many of them insolvent. Given that many of these banks would have been expected to be among the strongest in the country, these reviews confirmed the deep insolvency of the banking system as a whole, at that time estimated at 300 trillion rupiah (about 30 percent of 1998 GDP). While the insolvency of the entire banking system was not surprising to many outside analysts, it was deeply shocking to policymakers, who were very concerned about the impact this information might have upon the public.

During the same period, the authorities pressed ahead with a comprehensive program of measures to address the pervasive problems of the corporate sector. Agreements concluded with the large private creditors—the so-called "Frankfurt agreements"—and the consequent establishment of the Indonesian Debt Restructuring Agency (INDRA) under BI reduced short-term financing pressures on the banking sector, and provided a framework under which the banks would be able to restructure the debts of their distressed borrowers. On August 17, amendments to the Banking Law, designed to give a legal basis to the operations of IBRA, were presented to parliament. Over the following weeks, BI, the MOF, and IBRA officials were intensively involved in working with parliamentarians in seeking to strengthen further a number of the provisions and to ensure passage of a bill providing IBRA with appropriate powers for the restructuring program in prospect. The package of amendments was passed on October 16.

Meanwhile, BI conducted a thorough overhaul of its prudential regulations, including those on connected lending, large exposure limits, off-balance sheet risks, and provisioning for restructured loans. IBRA's Asset Management Unit (AMU) was made operational through the appointment of a management team and, although some delays were encountered, it was able to take over the assets of the closed banks (although not yet to actively manage or dispose of them).

By September 1998, with the legal and regulatory requirements largely in place, the macroeconomic situation more stable, and better information available on the state of the banks, the authorities had devised a comprehensive strategy to restore the banking system to health. There were three central elements in this strategy: first, resolving the banks under IBRA; second, restructuring the state banks; and third, offering joint recapitalization under stringent conditions for private and regional development banks.

As regards the IBRA banks, IBRA was to determine bank-by-bank how to resolve the banks, through liquidation, merger, or recapitalization, with a view to minimizing the public sector cost within the constraint of satisfying the blanket guarantee and maintaining a core banking system in the country.

In late August 1998, the authorities announced that the four state banks under IBRA auspices would be merged into a single new bank, Bank Mandiri, under a management and operational restructuring contract with a major international bank. Bank Mandiri was established on September 29 as holder of 100 percent of the shares of the four-component banks. Mandiri had 30 percent of the assets of the banking sector, and was the biggest bank in the country.

On September 29, 1998, BI announced a plan for the joint recapitalization of those of the remaining private banks and regional banks that met certain specified conditions. The objective of this plan was to retain a residual private banking sector from among the best private banks, recognizing that given the economic turmoil that had affected Indonesia even well-run banks would likely have run into serious difficulties. Also, the plan was designed to foster burden-sharing between the private sector and the government as regards the cost of resolving these banks. Details of this scheme and of its implementation are given in Chapter IV, Section B.

# G. Phase VII—October 1998-December 1999: Slow and Uneven Implementation Leads to a Sharp Increase in Costs

As noted above, by the fall of 1998 the banking system resolution strategy, aiming at establishing a sound and efficient banking system conducive to economic recovery, had been designed. The general thrust was to preserve a residual private banking system, resolve the banks taken over by IBRA, and operationally restructure the state banks, recapitalize them, and prepare their privatization. However, the slow implementation of the strategy over the following year—to the end-1999 cut-off date for this study—has led to sharp increases in the total costs of the bank resolution program.

#### Private banks

From September 1998, BI began to discuss the joint-recapitalization plan with a first group of 16 banks for which the audits had been completed. Reaction from the banks was immediately favorable, with owners of several banks indicating that they would be prepared to provide cash for their 20 percent of the required capital infusion. The plan was to be extended to all remaining private and regional development banks once their audits became available, if they were able to satisfy the conditions for eligibility.

After some delays and reversals, on March 13, 1999, the authorities announced that seventy-three banks, comprising 5 percent of banking sector assets, were in category "A" (i.e., deemed strong enough to continue without government support); nine banks, comprising 10 percent of banking sector assets, were in category "B" and eligible for joint

recapitalization with the government ("B-pass" banks); seven banks, comprising 3 percent of banking sector assets, were "B" category, had failed the criteria for joint recapitalization (which included the presentation of an acceptable business plan), but were taken over by IBRA because of their relatively large size—they all had at least 80,000 depositors; and thirty-eight banks, comprising 5 percent of the banking sector, were below the minimum acceptable (negative) capital adequacy ratio, and were closed.

Subsequent work included verifying the capital injections into those banks that migrated to "A" category status in the weeks before the closures, and in drawing up investment and performance contracts for the "B-pass" banks. Owners of the "B-pass" banks were given until April 21, 1999 to provide their 20 percent contribution for making up their capital shortfalls to achieve the minimum 4 percent CAR. Seven of the nine banks achieved this deadline by themselves; the eighth one, Bank Bali, benefited at the time from the help of a major British bank, Standard Chartered, as a first step of a planned formal acquisition, which eventually did not take place for other reasons; <sup>40</sup> the remaining bank, Bank Niaga, was taken over by IBRA. Revised due diligence figures showed a substantial increase in the aggregate insolvency of these banks. While the owners' share of the recapitalization on the basis of the original figures was secured by end-May, the owners were given until end-June 1999 to meet their 20 percent of the extra shortfall. "Loss" loans from these banks were, in line with the terms of the recapitalization scheme, transferred to IBRA's AMU.

#### IBRA and the IBRA banks

Banking Law amendments providing legal powers for IBRA to exercise its responsibilities were passed in October 1998. However, implementing regulations enabling the law to become effective were not passed until February 1999.

By late 1999, IBRA had assumed responsibility for assets with a face value of 441 trillion rupiah (36 percent of GDP), including loans for 234 trillion rupiah, shareholder settlements of 112 trillion rupiah, and investments in recapitalized banks of 92 trillion rupiah. It had 174,878 debtors, out of which those owing over Rp 50 billion represented 68 percent of the value of the debt, but less than 1 percent of the total number of debtors. Eight shareholder settlements had been signed, and holding companies had been formed in five of the eight cases. However, IBRA had only nominal control over the holding companies' assets, and this control was further compromised by an exceedingly complex structure adopted to oversee the management of the pledged assets, and by severe resource constraints within IBRA's AMI.

At the end-1999, concerns also continued regarding the roles of, and coordination between, IBRA and the Jakarta Initiative Task Force (JITF), the body responsible for facilitating corporate restructuring, as few of IBRA's largest borrowers had elected to

<sup>&</sup>lt;sup>40</sup> See below, Chapter IV, Section B.

participate in the JITF, which is purely voluntary. <sup>41</sup> Meanwhile, IBRA's Independent Review Committee (IRC), which held its first formal meeting in March 1999, had a permanent secretariat, with World Bank funding. IBRA's work program for 2000 was seen as ambitious and was expected to include cash collection targets in the range of 26 trillion rupiah.

By March 1999, IBRA had control of 12 banks representing 22 percent of the banking sector. An additional bank, Bank Bali, was added during December 1999 after Standard Chartered's withdrawal, following sustained staff opposition to the Standard Chartered takeover. Disappointingly, as with the state banks, there was very little progress in any of these banks during 1999 in enhancing loan recoveries, or preparing the banks for privatization, and the costs increased considerably. Although the authorities announced in mid-1999 their intention to use Bank Danamon as a sort of a bridge bank within which to merge eight smaller banks, progress was held up on various technical grounds, as well as repeated rethinking by the authorities, and implementation of this plan did not move forward until very late in the year.

#### State banks

As of mid-1998 there were seven state banks, representing 50 percent of the banking sector and a significantly larger share of the losses. All were deeply insolvent, and would have been categorized as "C" on the basis of the analysis employed for the private banks. However, the government committed to recapitalize all the state banks, with recapitalization to follow operational restructuring.

By mid-1998, it had been decided to merge the four weakest of these banks into a single bank to be called Bank Mandiri. The merger was designed as a vehicle to downsize the banks, and make best use of scarce managerial and advisory resources.

Bank Mandiri was established as a corporate entity during September 1998 and began as a holding company owning the shares of the four banks. Its legal merger with the four component banks took place in late July 1999. Mandiri received a first capitalization tranche in mid-October 1999, and a second tranche in late December to restore it to a 4 percent Tier 1 capital adequacy ratio (CAR) and to an 8 percent total CAR.

Progress as regards the three other state banks was slower, with several blueprints being considered for the restructuring of these banks. Earlier plans to merge the two smallest banks were dropped. Loss loans of these state banks were to have been transferred to the AMU, although the process was not completed by end-1999. BNI—the second largest bank

<sup>&</sup>lt;sup>41</sup> In mid-2000, it was estimated that around one-third of the restructuring of corporate debts, up to that point, had been done within the auspices of the JTTF. The remainder had been concluded on a bilateral basis.

<sup>&</sup>lt;sup>42</sup> It appears that the last of these loans were transferred in April 2000.

in the country—was to be recapitalized in the first half of 2000. For Bank Rakyat Indonesia (BRI) and BTN the process was further behind, with decisions at end-1999 still not reached on the future focus of the institutions.

Further details of the state bank restructuring program are shown in Chapter IV, Section C.

#### IV. SELECTED ISSUES

#### A. Blanket Guarantee and Lender of Last Resort (LOLR)

Although Thailand had introduced a blanket guarantee for all depositors and creditors of the banking system in August 1997, concern mainly at the moral hazard implications and the possible fiscal cost led the Indonesian authorities to decide not to give such a guarantee at the onset of the Indonesian crisis in October 1997. They also took account of the facts that all the banks that seemed to be insolvent at that time were small and their aggregate size was only a small fraction of the banking system—the 16 banks closed at end-October 1997 accounted for 2.5 percent of total banking system assets—and that the deposit protection scheme being put in place would cover 90 percent of the depositors.

In the period after the end-October closings, there was a clear preference among the authorities not to close any more banks, given growing evidence of the increasing fragility of confidence in the banking system. With closures ruled out, and continuing depositor withdrawals, there was little alternative in the short run to supplying central bank liquidity. BI had several facilities in use. From end-October to end-December 1997, over 25 trillion rupiah of liquidity support to banks was supplied. With the authorities not able to sterilize the impact on overall liquidity conditions, much of this finance was converted into dollars. The exchange rate fell from 3,500 rupiah to the U.S. dollar at end- October 1997 to around 14,000 rupiah (and an intra-day trough of 17,000 rupiah per U.S. dollar) by late-January 1998. For the early part of the period there may have been opportunities for "round tripping" by banks, as LOLR lending rates remained sticky and below the rates that banks might be able to earn from investing the funds. Later, LOLR interest rates were made punitive, up to double the JIBOR rate; however, BI accepted capitalization of the interest payments, so the high rate may not have served as much of a deterrent.

The issue whether the blanket guarantee should have been introduced earlier—probably at the time of the October 1997 bank closures—is one of the most contentious issues regarding the handling of the banking crisis. With the benefit of hindsight, there clearly would have been a good case for such a move. But the extent of the banking sector's difficulties was not apparent at the time; nor was the Soeharto's government lack of commitment to carry out many of the supporting measures that had been included in the LOI signed with the IMF. Had the LOI commitments been implemented in full, the original bank strategy might have had a chance of success; conversely, given the revelation over the following months of the government's unwillingness to implement many of the LOI measures, it is quite likely that any bank strategy—including one with a blanket guarantee—

would have failed. A blanket guarantee without the robust implementation of supporting measures would not have been sufficient to stop the crisis.

#### The blanket guarantee

The blanket guarantee announced on January 27, 1998, a cornerstone of the restructuring strategy, followed closely the provisions of that promulgated in Thailand. All depositors and creditors were to be covered, except for claims that derived from transactions with related parties. Both domestic and foreign currency claims were covered, although foreign currency claims, too, would be paid in domestic currency, at the rate of exchange on the day the claim was made. The government committed itself to stand behind payments on all claims. The inclusion of creditors as well as depositors within the guarantee was somewhat controversial, especially after the event, but reflected the fact that credit lines were just as volatile as deposits (in Korea they had been the major cause of the banks' liquidity pressures) and there was a desire to protect the banks as much as possible from all sources of volatility. The issue of payment in domestic currency for foreign currency claims was also somewhat controversial, and some argued that it diminished the value of the guarantee. Against that, the authorities felt that they did not wish to incur a potentially open-ended volume of foreign currency liabilities. In fact the risk remaining to foreign currency holders—in addition to exchange control risk, which the authorities sought to minimize by repeated statements denying any intention to impose controls—was only the risk of currency depreciation during the time between making a claim and receiving payment. This transfer risk was likely to be at its greatest during periods of instability, but would be negligible when stability returned. Hence, an effect of the provision could be to delay foreign currency claims until more stable times. 43 The exclusion of related party transactions seemed innocuous at the time, but contributed in the event to nonpayment of most interbank claims until early 2000, when outside auditors completed a claim-by-claim verification process. Nonpayment of these claims over this period had apparent short-term fiscal attractions, but was a major point of contention with foreign bank creditors, and seriously undermined the credibility of the blanket guarantee in the international community.

The guarantee was given to domestic banks whose owners were willing to sign a contract with BI and the government agreeing to a number of prudential restrictions, and giving the authorities the right to enhance their surveillance of the bank. A small premium—1/2 percent of the value of the deposits—was levied for the guarantee. While originally it had been intended that the joint-venture banks should also be included under the guarantee, these banks complained that paying the premium would put them at a competitive disadvantage relative to the foreign banks, which were exempt on the grounds that they were not covered

<sup>&</sup>lt;sup>43</sup> In the event some banks lost almost their entire dollar-deposit base before the situation stabilized. Whether there would have been less dollar-deposit loss if the guarantee had also been extended to making payments in foreign currency is, of course, impossible to say, but is unlikely. Depositors were largely fleeing from the banks, not specifically from the currency.

by the guarantee,<sup>44</sup> and which the joint-venture banks considered to be their main rivals. After some consideration, the authorities agreed to allow the joint-venture banks to be exempted on condition that they produced a comfort letter from the foreign parent undertaking to provide protection to depositors and creditors, at least as strong as that being provided by the government. In the event, all joint-venture banks produced such comfort letters.<sup>45</sup>

The introduction of a blanket guarantee immediately raises serious moral hazard issues. Depositors are less likely to assess the soundness of a bank when placing their deposits; and bank managements, being aware of this lack of discipline from the depositors, may adopt riskier strategies than otherwise. During a systemic crisis, these concerns become of relatively less concern, thus justifying the blanket guarantee, but it is nevertheless important to recognize them. A number of measures were introduced in early 1998 in order to mitigate these problems, including the placing of limits on interbank activity. Perhaps most importantly, BI introduced a cap on deposit rates to avoid weak banks trying to attract deposits through offering interest rates that they knew they could not afford, given the very limited degree to which they were able or willing to raise lending rates. In order not to stifle the market, it was not considered desirable to place a nominal limit on the interest rate that banks could offer, rather it was to be relative to a market rate or the rates offered by the "best" banks. In Indonesia, in early 1998, there were no nonadministered market rates; hence, any ceiling had to be relative to that of the "best" banks. Here was another difficulty, since it was far from clear which were the best banks. In the event, after initially linking the ceiling to interest rates on central bank bills, the authorities chose to base the ceiling relative to the deposit rates offered by the "JIBOR banks," i.e., the banks included in the calculation of JIBOR. Over the following months, the definition of the JIBOR banks had to be modified, as some fell into difficulty; also, the authorities chose to exclude the foreign banks from the calculation on the grounds that they were subject to different considerations than were the domestic banks.

For the following 12 months, banks were allowed to offer deposit rates up to 500-basis points above the rates set by the JIBOR banks, with the ceiling rate announced weekly by BI. Given that 16 banks were included within JIBOR for most of the period, and some of these were not among the strongest, this allowed a substantial premium above the rate of the "best" banks. Also, with many of the remainder of the 16 banks following the large state banks in the setting of deposit rates, there was considerable scope for the state banks to raise their deposit rates without breaching the cap. While the size of the premium may have been appropriate in the beginning, in view of the lack of confidence in many of the banks, it eventually gave scope to those banks seeking to maximize deposit shares on the

<sup>&</sup>lt;sup>44</sup> Most such deposits were covered by guarantees from the bank's home country.

<sup>&</sup>lt;sup>45</sup> This provision enabled the BI to require in 1999 that the Japanese partner bear the entire cost of closing an insolvent joint-venture bank of which it was co-owner.

back of the guarantee to do so. Chief among these were some of the BTO banks, which achieved a remarkable rebuilding of deposits over the period. While this may have helped to stabilize the banking system to begin with, since deposits were attracted at rates above those the banks could earn from those deposits, pursuit of this strategy increased the losses of these banks, and thus increased the ultimate recapitalization cost. 46

By early 1999, with the banking system largely stabilized, the 500-basis points premium was clearly no longer necessary. In March 1999, BI announced an initial reduction of 50-basis points. On April 19, BI announced a further 100-basis point reduction to a 350-basis point maximum, and after May 1999 it reduced the maximum spread in stages to 100-basis points.

The announcement of the guarantee did not of itself generate credibility that the government would indeed stand behind all depositors and creditors. Depositors continued to withdraw their funds, leading to continuing needs for BI liquidity support (see Table 1). Only after the bank closures of April 1998 had been succeeded by the prompt transfer of deposits from the closed banks to a designated state bank was credibility in the guarantee achieved among the public.

Although the authorities made immediate transfers of nonbank deposits from closed banks, there were serious delays in the payment of interbank claims, as noted above. Responsibility for the administration of the guarantee was passed between IBRA and BI; the continuing nonservicing of the guarantee, which may have been a result of the bureaucratic passing of responsibilities, undermined the credibility of the guarantee in the international community and provided a serious irritant among the international community in their attitude to the country.

Once the private bank recapitalization scheme was in place, the issue of the nonpayments of these banks' claims on the closed banks had to be resolved, since the eligibility of these claims in some cases determined whether a bank was viable or should be closed. In those cases where a bank was to be eligible for joint recapitalization, payment of the interbank claims would determine the residual shares of the owners and the government. In March 1999 the government committed itself to prompt payment for the banks that were eligible for the joint-recapitalization scheme. However, these payments were in some cases not subsequently made, thus generating opportunities for intermediaries to offer to facilitate them. The use of government-connected facilitators by the owner of Bank Bali led to a major

<sup>&</sup>lt;sup>46</sup> A significant problem that arose in the restructuring process derived from the government's public commitment to recapitalize all state banks. With the blanket guarantee in place, and the prospect of unlimited recapitalization, some of the state banks sought to increase their share of deposits by maintaining high interest rates, close to the permitted maximum. Moral hazard was mitigated only to a limited extent by the authorities' undertaking to change these banks' managements before recapitalization.

scandal in August 1999, and perhaps influenced the result of the presidential election under way at that time. Subsequently, international accountants were brought in to verify the eligibility of all remaining claims, and procedures were established to make these remaining payments in the early part of 2000.

Initially, the blanket guarantee was to be maintained for a minimum of two years, with the government indicating that it would give at least six months' notice of its termination. By the summer of 1998, there was a movement to terminate the guarantee on the earliest possible date, out of a feeling that it had proved very expensive, had opened the door to abuses, and that expenditure could be saved by eliminating it at that point. In summer 1999, when the announcement would have to be made if the guarantee was to be eliminated on the earliest possible date, there was some momentum to make such an announcement. After some discussion, however, it was realized that the costs of the guarantee were essentially already sunk, that the banking system was still not sufficiently robust to withstand a serious shock to confidence, and that the announcement of the end of the guarantee might itself provide such a shock. The authorities, therefore, announced that the guarantee would be extended; no termination date was given, but the six-month minimum notice was reaffirmed.

There has been some local criticism of the guarantee, blaming it for the high fiscal cost of the restructuring. This criticism is misplaced. To have tried to force depositors to bear the costs of the banking failures would have led rapidly to the collapse of all the banks in the country to a wasteland of financial intermediation, and return to a cash or barter economy from which it would have taken many years to recover. Much of the cost of banking sector restructuring in fact was for losses that had already been incurred—although not recognized; much of the remainder due to the protracted period before the authorities reached sufficient consensus to carry the restructuring forward. Similarly, to have tried to exclude creditors could have undermined the guarantee—in countries such as Korea it was the cutting of trade lines, rather than the runs of depositors—that caused the banking crisis.

An important criticism of the guarantee is that no procedures were immediately put in place to ascertain whether particular deposits fell outside the guarantee: the main exclusion from the guarantee was insider depositors. Instead, the authorities made no payments on interbank claims, denying certain valid claims and undermining credibility that the guarantee was operational at all.<sup>47</sup>

<sup>&</sup>lt;sup>47</sup> Some observers, such as Goldstein (2000), criticize the guarantee on the grounds that it encouraged bank closures, while open-bank resolution along the lines of the FDICIA of the United States would have been less likely to cause depositor runs. The U.S. parallel, however, is not close, given that there seems always to have been a core of healthy financial institutions in the United States and problems have arisen only in relatively marginal cases. Even more important, there are large numbers of new managers and supervisors who can be brought in to handle an open-bank resolution—unlike the situation in Indonesia.

Table 1. Indonesia: Emergency BI Funding: August 1997-September 1998 (Rp billion)

Bank	Aug-97	Sep-97	Oct-97	Nov-97	Dec-97	Jan-98	Feb-98	Mar-98	Apr-98	May-98	Jun-98	Jul-98	Aug-98	Sep-98
Bank Central Asia	-	_	-		-	3,930	3,915	3,001	-	24,121	32,537	32,449	32,450	34,046
Bank Danamon	2,363	3,461	3,461	3,461	8,647	13,147	14,196	18,297	25,513	25,303	25,349	28,164	30,359	29,486
Bank Exim	_	-	-	-	-	_	7,882	18,472	21,277	19,064	17,790	17,734	17,784	17,784
BUN	_	_	_	1,550	1,696	4,245	4,862	6,734	7,894	8,584	9,246	9,964	10,859	10,861
BDNI	-	-	816	1,716	8,510	18,266	22,635	27,571	29,406	29,221	29,877	31,318	32,308	32,300
Sub-total:	2,363	3,461	4,277	6,727	18,853	39,588	53,490	74,075	84,090	106,293	114,799	119,629	123,760	124,477
Total for the system:	2,900	3,944	6,429	12,910	31,664	61,038	71,842	97,802	109,203	132,738	140,432	144,751	149,420	150,189

Source: Bank Indonesia.

Nevertheless, despite these criticisms, the guarantee has been basically effective. It is likely to have been a major factor in the absence of significant runs on the banks, during the difficult political transition of 1999 and other policy reversals before and since.

#### The provision of central bank liquidity

Table 1 shows liquidity support extended by BI monthly from August 1997 to June 1998, including the amounts extended to some of the main individual recipient banks. Total support outstanding rose from Rp 3 trillion to over Rp 140 trillion over this period—over 15 percent of total pre-crisis deposits. Interestingly, the liquidity support was concentrated in a small number of banks. Out of over 200 banks in the country at the time, of the total liquidity supplied up to June 1998, over 60 percent of the total was accounted for by three banks, and around 80 percent by five banks (BCA, BDNI, Eximbank, Danamon, and BUN). Fourteen banks each accounted for more than about 1 percent of total liquidity support, and together accounted for over 93 percent of total support.

The granting of liquidity support was not constant over this period. Periods of intense liquidity support were interspersed with times when there was no support, or even small repayments. The largest borrower, BCA, with Rp 31 trillion of borrowings, made its entire borrowings between May 15 and June 5, 1998 as a result of runs at the time of the riots and of the replacement of President Soeharto by his Vice-President Habibie. No other bank sought significant amounts of liquidity support at that time. Of the Rp 29 trillion lent to BDNI, the second biggest borrower taken over by IBRA on April 4, 1998, Rp 6 trillion was sought during December 1997; around Rp 10 trillion during January 1998; and almost Rp 5 trillion in the three weeks after March 27, of which over Rp 3 trillion in the first four days of that period. The third largest borrower, Danamon, which also was taken over by IBRA on April 4, had a steadier build-up to its Rp 23 trillion borrowing—it had already borrowed over Rp 3 trillion by mid-September 1997—and was in early December 1997 the largest borrower with Rp 6 trillion outstanding; it too borrowed almost Rp 4 trillion in the three days after March 27, 1998. Bank Exim, the fourth largest borrower, the only state bank among the big borrowers, and whose liquidity problems derived from foreign exchange losses rather than deposit withdrawals, borrowed Rp 13 trillion between mid-February and late-March 1998, and another Rp 5 trillion between then and mid-April, as losses on the bank's forward book fell due.

The operation of a lender-of-last-resort (LOLR) facility to address banks' short-term liquidity difficulties is one of the classic functions of a central bank. Conventionally such lending should be only to banks that are solvent, and banks should provide collateral. There should be restrictions against protracted use of such lending, since this is likely to be an indicator of solvency difficulties. After the bank closures of October 1997, since there was no wish to close more banks in the near future BI was locked in to providing liquidity. Over the following months, as noted above, this liquidity support escalated rapidly. By this time there was no attempt to distinguish liquidity support, and no longer any collateral to be taken.

In order to address the issue of lack of collateral from borrowing banks, BI required personal guarantees from owners of banks that their borrowings were being used to meet liquidity needs, and that their banks were in compliance with all prudential regulations. Those banks that subsequently failed, or were taken over by IBRA, were investigated by IBRA to see if indeed they had been fully compliant. For 10 of the 14 banks taken over or closed in 1998, IBRA found that there had been prudential violations, generally breaches of the legal lending limit. In all such cases, IBRA sought to negotiate with the owners a pledging of the owners' assets that should be sold so that the government could recover its outlays. This process is discussed further in Section E below.

The announcement of the blanket guarantee and establishment of IBRA on January 27 included a commitment by the government to pay the costs of bank restructuring. This was appropriate, and was recognized to include support provided by BI to the banks. A central bank's prime responsibility is the operation of monetary policy, and this might be compromised if it is also in charge of bank restructuring. Also, the banking sector is as much a part of the infrastructure of a country as, say, the transportation network, and similarly costs might be expected to come from the public purse.

At the time of the granting of the blanket government guarantee and the establishment of IBRA, BI began revising the provisions governing the granting of the LOLR facilities.<sup>48</sup> In March 1998 it issued a decree that indicated a major shift in focus. All existing facilities were henceforth consolidated into a single facility. This would have a marginally penal interest rate, so as to ensure that it would be a facility of last resort, although there would be no highly punitive rate, since such a rate would not be credible and would not be paid, and would largely serve to weaken banks that were already very fragile. The major deterrent to the use of the facility was to be nonfinancial sanctions. If a bank borrowed for more than a week, there was to be an on-site inspection from BI; the inspectors would have to report quickly, and could recommend a variety of sanctions, including the transfer of the bank to IBRA. With these sanctions in place, recourse to liquidity support declined, although it picked up as expectations mounted at end-March of a wave of bank closings. 49 After the closings and takeovers of April 4, there were limited runs on a few BTO banks, in particular Danamon, which had been subject to runs since the previous summer, in part because there was limited understanding as to what the BTO status would imply. After a few weeks, however, especially in light of the prompt transfer of the deposits of the closed banks to a designated state bank, the runs—and consequent liquidity support—tailed off. From mid-April onwards there were no more generalized runs—although the targeted run on BCA led BI to have to provide that bank with the highest amount of liquidity support any bank had received, before the bank was brought under IBRA on May 16.

<sup>&</sup>lt;sup>48</sup> This subject is discussed in more detail in Chapter IV, Section D.

<sup>&</sup>lt;sup>49</sup> It is unlikely that the authorities were able to keep the interventions of April 4 completely secret in the days beforehand. The owner of one of the intervened banks was at that time a Minister in the Cabinet; other owners were closely connected to the authorities.

With much of the BI liquidity support becoming revealed as really solvency support, the government's obligation to meet the costs of bank restructuring was recognized to include payment for this support. By March 1998 discussions were held to determine how this payment could be made in a way that would minimize the immediate impact on the fiscal position. While it was intended that payment should be in the form of bonds paying some form of market-related interest rates, there was reluctance to bear the high cost of the current nominal interest payment—interest rates were at this time being raised aggressively and were soon to hit 70 percent—on the current budget. The authorities therefore agreed to pay BI for liquidity support in the form of bonds with the principal indexed to the rate of inflation and to pay interest at 3 percent of the index-linked principal. In exchange for this payment, IBRA, as agent for the government, would take an equivalent claim on the banks. With BI liquidity support totaling Rp 80 trillion in late-March 1998, the government agreed to issue this amount of bonds to BI to settle outstanding liquidity support obligations.

In the event a number of issues emerged, which meant that the actual payment of Rp 80 trillion was not made until November 1998. First, there was some debate over the index-linking, with the MOF exploring the alternative of making the payment without the linkage. Second, there was some dispute over the exact amount to be paid, with the MOF questioning whether it should pay for the high interest charged by BI. Third, there was some question as to whether IBRA could indeed convert its claim into equity and thus use the equity stake to exercise ownership of the bank. Thus, even with the unambiguous government commitment to take responsibility for bank restructuring, technical, and policy issues served to delay the resolution process.

In fact, liquidity support to the banks continued after the Rp. 80 trillion payment had been agreed, with total support outstanding ultimately reaching around Rp 165 trillion. A payment of Rp 20 trillion was made explicitly to meet the liabilities of Eximbank—the only state bank with significant borrowings—and a third payment was made for the remaining outstanding stock of support. All payments were in the form of promissory notes by the government to BI. Since the government and BI had not reached final agreement on the exact amount that was due, a proviso was attached to the promissory notes that, insofar as the claims were not subsequently verified by the auditor, BI would repay the notes.

The main criticism of BI's lender-of-last-resort practices relates to the lack of control over such lending, for example, whether the lending matched a commensurate loss of deposits. While BI did undertake such matching in the latter part of the crisis—in particular in May 1998 when BCA was subject to protracted withdrawals—there seems to have been less control during some of the earlier periods. This has led to investigations into the operation in LOLR facility and the suspicion that BI staff may have colluded in its abuse.

Meanwhile, the government was undertaking a revision of the central bank law. Partly in order to reestablish its credibility after the disaster of the banking crisis, BI was given independence from government in the new law. In addition, it was severely constrained in the amount of finance it could provide to the banks (as well as the government). At

end-1999 transitional provisions providing for the ability to support banks in the event of systemic crisis came to an end. Any further support to the banks would have to be fiscalized, most probably, in the next few years, through an advance from IBRA.

#### B. Private Bank Recapitalization Scheme

Until around April 1998 the authorities' focus was almost entirely on handling the weakest banks in the system, i.e., those that were responsible for the largest infusions of liquidity support from BI. With the takeovers and closures of early-April completed, however, a broader focus was taken—in particular the authorities aimed to identify a "core private banking system" that might be supported to preserve a modicum of domestic bank ownership and to become the nucleus for the banking system after the crisis.

By this time the authorities had—with World Bank financing—already commissioned audits of the largest banks under IBRA. This was complemented by audits—under Asian Development Bank funding—of the non-IBRA private banks. The initial stage of this process was the selection of 16 banks, based on general consideration by BI as to which private banks might be expected to be among the strongest in the system. The remaining banks were to be audited in subsequent waves. Banks with foreign exchange licenses were audited by international auditors; banks without such licenses were audited by a combination of these auditors and BI supervisors.

In June 1998 the results of the largest IBRA banks were leaked to the press. As discussed in Chapter III, these showed nonperforming loans at between 55 percent and 90 percent of total portfolios. While the numbers were open to some criticisms and challenges they did demonstrate that all the banks under examination were deeply insolvent. A period of exchange rate uncertainty and runs on banks ensued, amidst expectations of further bank closures.

The audit results for the IBRA banks set a different context for the results of the private bank audits. The key issue for policymakers regarding the private banks became not so much whether these banks were still solvent, but whether they were significantly better than the IBRA banks, and had retained some expertise and management capabilities. The findings that most of these 16 banks had capital asset ratios between negative 10 percent and negative 20 percent, and NPLs that, although high, were substantially below those of the IBRA banks, was received with some relief. There was concern, however, that the leaking of these results could be devastating to public confidence, since the public believed these banks to be the "best" in the country. 50

<sup>&</sup>lt;sup>50</sup> The leaking of the results of the audits of the IBRA banks was believed to have come from the offices of some of the international auditors. As a result the contracts for the subsequent waves of audits contained tough penalty provisions in the event of any future leaks.

With the findings of the audits of the 16 banks, it had become clear that most of the large banks in Indonesia were technically insolvent. The results were well recognized: no bank intermediation was taking place, and there was a constant risk of loss of monetary control and descent into hyperinflation. The authorities perceived that Indonesia needed to retain and rehabilitate a core banking system, even if in the economic crisis all banks were likely to be under severe strain. Over the summer of 1998 a plan was developed that would enable the country to retain some residual private domestic ownership in the banking sector, the components of which were likely to become the core private banks. This objective was partly derived from a fear that the public perception of Indonesia's bank restructuring would be harmed if all surviving banks were brought within the state sector, and partly from a view that a number of bank owners still had available financial resources, which they might bring into their banks if they had a prospect of keeping them, thus reducing the recapitalization cost below what the government would have had to pay had it had to bear the burden alone.

## Preparation of the plan

The essence of the plan was a conventional triage of the banks. Those above a particular capital asset ratio (CAR) would be considered sufficiently strong that they could be expected to function without government support—the "A" banks. Those with CAR below a certain level would be considered too weak to warrant government support and would be closed—the "C" banks. For those banks between the two categories, there could be government support as long as the owners also brought in a share of the capital, had a viable business plan and satisfied a test of fitness and propriety. The key parameters of the plan would be the boundaries between the three bank categories, and the ratio of government contribution to that of the owners.

A key issue related to the valuation of the banks, with the international consultants displaying a generally more negative view of the banks' profitability than had BI. To address this problem, and also to endorse the recommendations of the outside consultants as to the acceptability of banks' business plans, a four-stage committee process was set up, the Bank Evaluation Committees (BEC), under which BI, the MOF, and IBRA would jointly assess valuations and recommendations presented by the consultants and would come up with a joint policy decision.

In the event of continuous disagreements between the outside consultants and BI as to the valuation of the banks, it was agreed that ultimately BI had to adjudicate on a bank, since it had the statutory responsibility and outside experts could only be advisory. BI was aware, however that if it endorsed a less negative financial position of a bank than did the consultant and was proved wrong, then this would not have helped the bank since it would then be undercapitalized.

Most of the differences in the bank valuations related to the treatment of the loan portfolios, with the consultants substantially more negative about the possibility of recoveries than was BI. While the consultants rejected repayments prospects for large amounts of loans on the basis that documentation was inadequate, BI maintained that this followed local

industry practice—where lending was often relationship based—and that substantial recoveries, even where the documentation was defective, were feasible. A solution to this conundrum would have to lie in the treatment of the loans. It had been agreed that "loss" loans would be taken off the books of the banks at zero price for workout by IBRA. Since it was not fully clear how many of the loans of the banks were in fact loss, it was agreed that those deemed loss by the evaluation committees, acting on the advice of the consultants, should indeed be transferred to IBRA. However, recognizing that this might lead to an overaggressive transfer of loans, all proceeds from the recoveries from such loans, net of the costs of IBRA, would accrue to the owners of the banks. Thus, if indeed the consultants had been overaggressive, this would be demonstrated at the recoveries stage and the owners would be compensated at that time.

Problems arose, however, from the protracted time required to achieve implementation of the scheme. Initial expectations were in this regard a severe underestimate, and served ultimately to weaken the scheme almost fatally. The first of these factors was the lack of commitment on the part of some of the authorities to follow the implementation of the plan as it had been publicly announced by the Governor of BI, on behalf of the government, in September 1998. The subsequent announcement by President Habibie that two specified banks would be the first to be recapitalized suggested that the recapitalization would be on the basis of political rather than financial criteria, and had a marked adverse impact on the exchange rate. Only in December 1998, after a partial retraction by the President, did preparations for the scheme begun in earnest.

The next factor that prolonged the implementation of the scheme beyond earlier expectations was the desire to give the owners additional time to provide any capital shortfall, so as to get the bank reclassified from "B" or "C" to "A" or "B," and subsequently for the owners to provide their share of capital for the joint recapitalization, so that the government would provide its share. These extensive periods caused uncertainty in the markets, risking depositor withdrawals as well as possible asset stripping by the owners. This latter would be particularly likely in those cases where the owners were aware that they would not be able to bring in the needed capital.

With the provisional classification of the banks completed, BI decided that owners of those banks deemed by the BEC to be category "C" should be given one month from that determination to demonstrate that their banks could improve their position sufficiently to be reclassified as "B." During this period there was, in principle, to be a permanent on-site BI presence in each bank, to seek to ensure that owners did not try to strip the assets from the bank.

Those banks determined by the BEC to be "B"-category banks were to be informed that they would be eligible for the recapitalization program if they demonstrated medium-term viability through the submission of a business plan within one month signed by the management, with approval by the major shareholders, and approved by BI.

At the same time, BI assessed, using the information provided from the portfolio reviews and its own experience and knowledge, whether the owners and managers were "fit-and-proper" persons to own or manage a bank. Recapitalization would not be provided to any bank where the owners were deemed not to be fit and proper; where management was deemed not fit and proper, recapitalization could be provided on the condition that management be replaced.

BI supplied the broad macroeconomic assumptions that should underlie the business plans, derived from the macroeconomic projections that underpinned Indonesia's IMF-supported program. Banks were encouraged to provide business plans that involved mergers of two or more banks, with the required projections assessed on the resulting consolidated basis, although in the event none did so. Where revisions in the business plans were called for, banks were given up to two weeks to make them, or less if they were minor or thought unlikely to be forthcoming.

For those banks where the business plan was accepted, BI and the bank needed to reach full agreement on the quarterly benchmarks for the key performance variables, and formalize these through an MOU with each bank.

All capital infusions by the owners were to be on a cash basis, without recourse to borrowing or payments in kind. Government contributions to restore solvency were to be in the form of bonds at a market-related interest rate, and banks under the recapitalization program should be under intensive surveillance by BI for the three-year period of the business plan. BI could also impose certain prudential restrictions on these banks during the period of operation of the business plan—for instance on the rate of growth of lending, of involvement in derivatives business, and as well as other conditions such as restrictions on payment of dividends.

On full analysis of the figures, BI determined that "A" banks would be those with CAR above 4 percent, i.e., the minimum CAR in Indonesia at that time. "B" banks would be those with CAR less than 4 percent, but more than -25 percent; this figure was reached because many of the expected "best" banks were clustered around -20 percent, and there were few banks in the CAR range immediately below it, thus reducing the likelihood that a decision between "B" and "C" banks status would be finely balanced. On the basis of estimating the maximum amount bank owners might be induced to bring into their banks (i.e., not walk away and leave the government to bear the entire cost of resolving the banks), the government agreed to supply up to four rupiah of capital for every rupiah that the owner put in, up to where the bank had capital of 4 percent of risk-weighted assets.

New shares would be issued to the owners and the government, such that the resulting proportions of ownership in the bank would equal to their total respective contributions. Initially it had been agreed that the government's stake would be in the form of convertible preference shares, but the capital markets regulatory authorities (BAPEPAM) raised a

number of objections,<sup>51</sup> so in the end the government took ordinary shares but signed agreements restricting their rights roughly to what they would have had under the preference shares. As part of this agreement, the government retained veto power on certain strategic issues, such as management appointments and dividend distribution. It was agreed that after three years the government would aim to divest its remaining holdings of the shares of the bank as soon as possible, and in any case within two years of the end of the three-year period. It would obtain an independent valuation of the bank, and allow the existing owners to purchase the government's remaining shares at a price in line with that valuation; if the owners declined to buy these shares, the government would sell them in the market.

The scheme was in principle to be available to all private domestic commercial banks, i.e., a total of 128 banks. Thus the resulting "core" private banking system would result from banks' financial conditions and their owners' willingness to share in their recapitalization, rather than from a predetermined set of "core" banks. The number of banks that would survive should thus be determined by market conditions and the strict application of financial criteria, not by ex ante administrative decisions.

## Implementation of the plan

Although the plan was announced by the Governor of BI in September 1998, and the work on the audits was completed in the weeks following, little further progress was made in identifying which banks would be eligible for the joint-recapitalization scheme. Indeed, a number of alternative models were put forward, both by members of the government and by international consultants employed by various agencies. Most damaging of all, however, was the announcement by the Presidency, in early December 1998, that two banks had been identified as the first ones that had passed the test for eligibility—Lippo Bank and one small and barely known bank.

This announcement led immediately to speculation that the selection of banks would be on political grounds, i.e., that the scheme did not mark a break with past practices for managing the banking system. There was a marked depreciation of the rupiah as a result of the announcement, and intense lobbying to get the decision reversed. Eventually, it was announced that it had only been intended that these banks would be "eligible" to be considered for the recapitalization scheme, but that final decisions would depend on the results of the same tests that were being applied to all the banks. Although this outcome served to restore the original scheme, the debates and attempted adaptations of the scheme had led implementation to be delayed by almost three months.

<sup>&</sup>lt;sup>51</sup> Capital markets regulations proved to be a significant impediment to the execution of the private bank recapitalization scheme. A list of some of the problematic areas is given in Box 3.

## Box 3. Capital Markets Impediments to Bank Restructuring

Indonesia's capital markets regulations, and their interpretation and enforcement, proved not to be helpful to the bank restructuring process. Among the issues where difficulties arose: (i) whether the banks would be able to raise additional capital through direct placement rather than the less efficient (but politically more palatable) pre-emptive rights issue; (ii) the requirement that a special shareholders meeting must be called for a bank to be declared insolvent and to approve liquidation; (iii) limitations on the permissible forms of equity holdings; and (iv) the handling of insolvent banks.

The private bank recapitalization scheme required that, in recognition of new capital injected by both the government and existing shareholders, new shares be issued to reflect these contributions. General practice in Indonesia for the issuance of new securities to bolster capital is the use of a preemptive rights issue, which theoretically provides additional shareholder protection. However, the rights issue process is lengthy and cumbersome, therefore creating delays in completion of the recapitalization. Although BAPEPAM issued a regulation that enables banks to raise capital through nonrights issues (direct placement), there was strong opposition within the agency to the actual use of this mechanism, reportedly because of concerns over the protection of minority shareholders. To underscore this sentiment BAPEPAM issued a "policy directive" at the end of 1998 requiring all listed banks that qualified for recapitalization to undertake a rights issue. This prevented banks from raising capital through a direct placement without first going through the rights issue process and led to substantial delays in completing the recapitalization process, which in turn severely complicated the recapitalization, given the speed at which prospects for some of the banks (and hence the price of their shares) improved during the first half of 1999.

Provisions in the Company Law require that a special shareholders' meeting must be called for a company to be declared insolvent and to approve liquidation. Since there is no special bankruptcy provision for banks, they are subject to these liquidation procedures. This introduces significant delays to the bank resolution process and gives substantial powers to the shareholders, as they can appoint the liquidator. The approval is especially inappropriate where there is a blanket guarantee, since the government is essentially financier of last resort.

During the recapitalization exercise, the Governor of BI announced that the government's share of the injected capital would be held in the form of convertible preference shares, in line with practices in other countries. BAPEPAM, however, argued that such shares were inadmissible in Indonesia, although in fact some such shares have been issued, and the Company Law grants authority for the use of other forms of equity issuances. BAPEPAM was reluctant to allow such shares to be issued on the grounds that they would bestow on the government preferential rights to the payment of dividends and any net proceeds in the event of liquidation. Although in the event the government acceded to BAPEPAM's arguments, it signed Memoranda of Understanding with the respective banks restricting its role, essentially as the preference shares would have done. Nevertheless, as a result of the government being forced down this routine, the respective roles of the government and the other shareholders are likely to remain not fully resolved during the period of government ownership.

The handling of insolvent listed banks also caused problems. Ten banks that were frozen (essentially closed, but licenses not revoked) by BI early in 1998 were still listed on the Jakarta Stock Exchange (though trading was eventually suspended) a year later. Delays in the delisting of insolvent banks undoubtedly conveyed a false message to the markets about the banks' condition and prospects. A review of the applicable regulations and procedures showed that a clear process for delisting banks is in place. However, there seemed to be reluctance on the part of both BI and IBRA to address potentially controversial issues. Overall, the effect was to cause delays in recognizing the depth and pervasiveness of the banking crisis, and the urgency for dealing with it.

With the process back on track, it was expected at end-1998 that by end-February 1999 decisions on classification would be made for each of the banks. The "B" banks would be divided into those that had their business plans accepted, had owners and managers who passed "fit-and-proper" tests, had agreed plans for resolving excess connected lending, and had undertaken to provide 20 percent of the needed recapitalization funds—the "B-pass" banks. The others would be "B-fail" banks. The government undertook to close all "C-" and all "B-fail" banks by end-February 1999.

It was recognized as critical for the credibility of the entire reform program that the end-February closures should go smoothly. This would require that: (a) the full force of powers envisaged in Article 37A of the new Banking Law (and its implementing regulations)<sup>52</sup> be available; (b) resources for closures be adequate and well-coordinated; and (c) banks "closed" be truly closed—with all deposits immediately transferred to other institutions. With the authorities working hard to achieve this target, there was intense activity in BI, the MOF, and IBRA, conducting the technical assessment work.

By January 1999, due diligence reports had been completed for all the banks, and the results communicated to the banks. "A" and "B" category banks had been asked to provide business plans, and "C" banks were given a month in order to try to raise their status. As of February 6, five banks formerly categorized as "B" were graduated by BI to category "A," while nine "C" banks were graduated to "B" and invited to prepare business plans to determine their eligibility for the recapitalization plan. Thus 60 banks, representing 3.9 percent of banking sector liabilities were now category "A;" 48 banks, with 16.5 percent of banking sector liabilities were category "B;" and 19 banks, with 2.5 percent of banking sector liabilities were category "C." The "B" category comprised three elements: those banks which had already qualified for recapitalization (6 banks, 9.2 percent of market share), those which had failed and would be handled similarly to "C" banks (16 banks, market share of 2.8 percent), and those for which a final determination had not yet been made (26 banks, market share of 4.4 percent).

By this time it had become widely expected that there would be a wave of bank closings before the end of February. Government ministers had wished to avoid a shock to expectations, and had basically announced their intentions over the previous weeks, although without giving details of the identity or indeed the number of banks to be closed.

With preparations well in train for a wave of closings on February 26, 1999, the authorities decided at the very last minute not to go ahead at that time. It was felt that consensus still needed to be established over the classification, in particular, of some well-connected banks.<sup>53</sup> Although the delay was presented as due to technical considerations, it

<sup>&</sup>lt;sup>52</sup> See Section E.

<sup>&</sup>lt;sup>53</sup> It was believed that there were also some elements within the government who wanted to use the closures and recapitalizations as a means to increase the bank holdings of the (continued)

was widely held in the public media—and indeed confirmed by some officials—that the delay was due to political factors.

Then followed a particularly tense period during which it was far from clear whether the principle of uniformity in restructuring the banking sector would be retained. Strong behind-the-scenes pressure was applied by the international financial institutions that the private bank recapitalization scheme be implemented in its original, transparent form. Several bank owners used the intervening period to report bringing additional capital into their banks. All such claims were verified by BI before being accepted for reclassifying the banks.

Over the following two weeks the various technical committees refined their estimates of the condition of the banks, and political consensus was established on the implementation of the restructuring plan according to the agreed principles. Also, owners of "C" banks were given a final opportunity to provide additional capital to raise themselves to "A" status; "B" banks without acceptable business plans were invited to resubmit plans.

Eventually, over the weekend of March 13, 1999, the implementation of the scheme was announced. Nine banks were declared eligible for joint recapitalization. As of end-March 1999, these banks—Lippo, Bank Internasional Indonesia (BII), Bank Universal, Bali, Bukopin, Niaga, Artamedia, Patriot, and Prima Express—together accounted for around 10 percent of the total liabilities of the banking sector, and had a combined negative net worth of Rp 15.6 trillion, or 5.9 percent of the total negative net worth of the system. Niaga's owners, however, were unable to raise the required capital, and the bank was taken over. The controlling shareholders of the eight banks were informed that they needed to increase their capital contribution so that it reached at least 20 percent of the revised recapitalization amount, based on the end-March 1999 audit results, by June 30, 1999. The government would contribute the remaining capital requirement, up to 80 percent of the total.

On March 13, it was also announced that 73 banks (representing 5 percent of the banking sector) had CARs above 4 percent ("A" category)<sup>55</sup> and could continue to function without government support. Nineteen banks (representing 3 percent of the banking sector) had CARs below –25 percent ("C" category) and were to be closed immediately. Of the

indigenous Indonesian bank owners at the expense of the Chinese owners, and were devising alternatives to the agreed recapitalization scheme in order to seek to bring this about.

<sup>&</sup>lt;sup>54</sup> A review of Indonesia's Fund-supported program, at that time providing financing of around \$1 billion a month, was held up during this period pending a satisfactory resolution of the private bank recapitalization scheme.

<sup>&</sup>lt;sup>55</sup> For one additional bank a full determination had yet to be made. It subsequently passed the tests to achieve "A" bank classification.

remaining ("B" category) banks, as noted above, nine (representing 10 percent of the banking sector) had passed the various tests and were eligible for recapitalization; seven banks (with 1 percent of the banking sector) had failed one or more of the other tests, but had at least 80,000 depositors and would therefore be taken over by IBRA, and nineteen smaller banks (with 2 percent of the banking sector) would be closed with the "C" banks.

The announcement was well-prepared, and included major public relations efforts both from specialist consultants and the principal participants themselves. Market reaction was generally positive, with recognition that this was a careful and comprehensive resolution of the problems of the banking sector. Unfortunately, the closures and transfers of deposits did not occur as smoothly as in the previous closure operations. Although the total number of depositors in the closed banks was less than in the August 1998 operation, the sheer number of banks, their dispersion across the country, and the lack of prior IBRA access into them, made this operation more complicated than the earlier one. Even more seriously, the protracted period during which the closures had been expected provided the opportunity for workers prospectively facing redundancy to organize themselves, and to maximize their leverage in forthcoming redundancy negotiations by denying IBRA's staff access to banks' premises. Thus, while the majority of deposits were successfully transferred by the middle of the following week to five designated recipient banks, in around 20 branches workers prevented IBRA from obtaining access to depositors' records and transfers could not be made. 56 For several weeks IBRA became involved in redundancy negotiations with these workers; senior management were therefore distracted from their core functions. IBRA's position was that it would pay twice the legal mandatory minima; if the workers wanted more, they should negotiate with the former owners of the banks. IBRA was constrained in increasing its offer, in part because of government concern at the precedent that might be set for workers facing redundancy elsewhere in the economy. Overall, it seemed that the workers had little public sympathy, since they had been among the better paid. Also, there were few complaints from depositors, since they understood the reason for the delays in the transfer of their deposits, and were confident that they would have access soon. IBRA gradually overcame the problem, obtaining alternative sources for the needed documentation, and obtaining settlements with the workers.

While the public basically maintained confidence in the banks taken over by IBRA, there was—perhaps surprisingly—a loss of confidence in some of the banks deemed eligible for recapitalization. Apparent confusion among the authorities in the remaining steps necessary for the recapitalization to take place, together with punitive comments by some officials about the requirements being put on these banks, distorted the story that these "B-pass" banks were to be the core of the private banking sector of the future. Significant runs on some of these banks led to severe liquidity squeezes; for a while it seemed that they too

<sup>&</sup>lt;sup>56</sup> The closed banks had employed 20,000 workers. The banks taken over by IBRA at this time employed an additional 10,000 workers—a significant factor in the decision to take them over rather than close them.

would end up falling under the control of IBRA. Confusion as to the distinction between the "B-pass" banks and the BTO banks was heightened by public statements from the well-connected owner of one of the BTO banks saying that he was only temporarily out of his bank and that he expected that the government would be helping him with his bank's recapitalization.

By end-April most of these concerns had been largely resolved. IBRA had excluded the former owners from all the BTO banks, and changed all the managements.<sup>57</sup> IBRA officials had progressively taken control of the assets of the banks. The owners of seven of the nine banks declared eligible for joint recapitalization with the government had provided their share of the capital. One of the other banks was sold to a major international bank;<sup>58</sup> the other bank was taken over by IBRA. In June 1999 the head of IBRA announced that all the taken-over banks (except Bank Niaga, the bank taken over in April) would be merged into Bank Danamon (the "bridge bank") over the coming months.

#### C. Reform of the State Banks

At the outset of the banking crisis the seven state banks accounted for almost 50 percent of the banking sector. To begin with, they served a useful "safe-haven" role in attracting deposits being withdrawn from the weak private banks. As the crisis intensified, however, they lost this function as depositors withdrew from the banking system as a whole. Nevertheless, except for one state bank—Eximbank, which lost over 20 trillion rupiah as a result of loss-making treasury operations in the foreign exchange market—the state banks did not run into liquidity difficulties during the crisis and did not require LOLR support. During the interventions of April 1998 the authorities used state banks in two important ways: first, deposits of the closed banks were transferred over the weekend to BNI, at that time the largest bank in the country, which worked with the authorities to ensure that the new depositors were welcomed and therefore stayed with their new bankers; and secondly, teams of managers were taken from the state banks in order to provide interim management for the banks IBRA had taken over.

<sup>&</sup>lt;sup>57</sup> Except in one bank, which had been taken over by IBRA in March, only because there were no shareholders able to put up their share of the bank's recapitalization requirement.

This takeover led to the discovery of side payments by the bank, Bank Bali to a government-connected company, in order to obtain payments under the interbank guarantee in order to close its capital shortfall sufficiently that the bank would be able to participate in the joint-recapitalization program. The "Bank Bali scandal" dominated the news during the presidential election, then under way, and may have cost President Habibie the election. Officials involved in BI and IBRA were dismissed. Criminal charges were brought against the intermediaries, although no convictions were secured. With Standard Chartered walking away from it (apparently as much because of labor force resistance as because of the payments scandal), Bank Bali was brought under the control of IBRA in December 1999.

Nevertheless, as noted above, the state banks' problems were of long standing. BNI, for instance, had been recapitalized repeatedly over the previous 20 years. During the October 1997 IMF program negotiation, a review of the financial condition of each of the seven state banks was carried out. Based on these reviews, two of the seven banks—Bank Bumi Daya (BBD) and BAPINDO—were insolvent, but only marginally, both holding net assets (after adjustments) representing around 99.9 percent of their liabilities. Two other banks—BDN and BRI—were seriously under capitalized, with adjusted assets representing around 104 percent of the liabilities. Two more—BNI, the largest bank in the country, and Exim—were only slightly undercapitalized (assets covering 107 percent of the liabilities), while the last bank—BTN—had apparently a comfortable solvency margin, with assets amounting to 110 percent of its liabilities. In aggregate, the data provided at that stage indicated that the state banks still had substantial net equity.

At the end of October 1997, the government of Indonesia made public that "the merger of BBD and BAPINDO will be approved by the government and announced by December 31, 1997, together with a government plan for the other state banks, with the merger to be completed soon thereafter." This commitment was not met, as the government announced in December 1997 its intention to first transform BTN into a subsidiary of BNI, and secondly to merge four state banks, namely BAPINDO, BBD, BDN, and Bank Exim, instead of just the originally-identified two.

By April 1998, the policy regarding state banks had changed again, and went back to the original commitment to merge BBD and BAPINDO, this time by June 1998. In the meantime, at the end of March, performance contracts, prepared with World Bank assistance, had been signed by all state banks with the MOF.

While it was believed by the public, until the completion of the internal audits in mid-1998, that most of the state banks were sound, it was apparent that there were serious problems at Eximbank. From late-1997, Eximbank was one of the main recipients of central bank liquidity (over 20 trillion rupiah). Its problems derived not from deposit withdrawals, but from derivatives losses. <sup>59</sup> In mid-1998, the government provided 20 trillion rupiah to recapitalize the bank without external discussion or requiring specific commitments from the bank's management.

In June 1998, the deadline for the merger between BBD and BAPINDO was extended to end-July, and in July it was again extended to August 21. On that date, the government did not proceed with the expected merger, but announced again a change of policy, namely the merger of four state banks—BAPINDO, BBD, BDN, and Bank Exim—plus the corporate activity of a fifth one, BRI, with the assistance of Deutsche Bank as an advisor and a

<sup>&</sup>lt;sup>59</sup> Some outside commentators opined that the authorities were using Eximbank in a failed attempt to support the rupiah.

management contractor. It was also announced that the nonperforming loans of the merged banks would be transferred to IBRA, and that the new resulting entity would be recapitalized as needed. By the end of September, a new legal entity, Bank Mandiri, was established to provide a platform for the merger of the banks.

By this time, however, it was clear that the state banks were in a precarious financial condition. International accounting firms conducted reviews of their portfolios and found that the banks were all deeply insolvent. If the authorities had adopted the same principle in handling them as had been applied in the case of the private banks, all would have been classified "C" and closed. The government, however, announced that they were all too big to fail (TBTF) and would be recapitalized.

The announcement of the TBTF principle for all state banks undoubtedly led to moral hazard losses. With banks' managements indifferent as to the size of the losses, there was no incentive for aggressive loan recoveries. Nonperforming loans rose substantially during the crisis; it will never be possible to tell to what extent this was due to genuine corporate distress or whether to opportunistic nonperformance. These banks also set among the highest levels of interest rates, being indifferent to the resultant negative spreads as they aimed to consolidate their market shares, thereby not only increasing the direct losses of the banking sector but probably also keeping interest rates higher than they might otherwise have been.

Many of these problems are inherent in a situation of blanket guarantees and prospective recapitalization, and the authorities did seek to take measures to mitigate their effects. The main weakness, however, was the length of time taken to introduce key measures that would enable the restructuring process to move ahead. Recapitalization of the state banks will have been one of the most expensive elements of the entire bank restructuring program—total costs will be over 250 trillion rupiah, as against 22 trillion rupiah for recapitalizing the eligible private banks—reflecting both the noncommercial banking practices of these banks in the period before the crisis, as well as the additional losses deriving from their policies during the crisis. With many of the private banks having been closed, the share of the state banks has risen to 70 percent of banking sector liabilities. Their preservation has served to ensure the maintenance of payments and other banking services even during the worst period of the crisis, albeit at an enormous cost.

While private banks were provided with recapitalization funds on the basis of business plans (see section above), repeated past failures with the recapitalization of state banks meant that operational restructuring was to be well under way before recapitalization was to begin, and recapitalization funds were to be tranched in order that the momentum of operational restructuring would be maintained.

In December 1998, a plan for Bank Mandiri was publicly announced by the government and Bank Mandiri. This plan involved "pre-filtering" each of the four component banks and integrating them one at a time into Bank Mandiri. Capitalization was to be phased at each step of the integration process, and was to be completed by end-1999. However, the plan was not implemented, and the authorities decided to proceed with a

simultaneous merger of all four banks before they had made substantial progress in operational restructuring. In the meantime, the financial condition of the banks was fast deteriorating. The four Mandiri banks had a negative net worth of Rp 108 trillion as of end-1998 and were incurring additional losses at a monthly rate of Rp 2.5 trillion, as a result of wide negative interest rate spreads.

After several months during which substantial progress was achieved in operational restructuring, particularly staff retrenchment, the merger between Bank Mandiri and the four legacy banks took place in late-July 1999. Mandiri's opening balance sheet as of end-July showed a positive equity position of Rp 4.3 trillion, including a line "due from government" of Rp 137.8 trillion in place of bonds not yet issued. However, to end up with a balance sheet similar to the proforma balance sheet published prior to the mergers, Mandiri had to underprovision some of its losses. As a result, its real equity position as of end-July was arguably negative by Rp. 1.5 trillion. Subsequently, its capital position deteriorated further. Continued running losses, a huge foreign exchange open short position (with the exchange rate moving unfavorably), and the need for additional provisions on nonperforming loans, increased the estimated negative net worth to Rp 16.6 trillion as of end-August and Rp 18.5 trillion as of end-September 1999.

Shortly thereafter, Mandiri also began to face growing liquidity problems, largely as a result of deposit withdrawals by state enterprises and other public sector institutions, due in particular to regulations requiring diversification of public sector deposits across banks. The bank exhausted all its short-term marketable securities (such as SBIs) and then built up its borrowings from other banks to a worrying level, becoming by far the main borrower on the interbank market. Operational restructuring slowed markedly as Mandiri's management struggled daily for liquidity and was distracted by the delay in capitalization. Meanwhile, the integration of the four legacy banks' management information systems proved more troublesome than anticipated, slowing the gathering of accounting information. Unreconciled items ballooned, from a net debit of some Rp 4 trillion in July to Rp 10 trillion at end-September 1999.

An injection of a first tranche of bonds into Mandiri took place in October 1999, followed by a second tranche in late December. This allowed Mandiri to be in full compliance with applicable solvency norms and its management to focus again on further progress in operational restructuring. On the basis of audited end-1999 figures, a final tranche of capitalization bonds was provided in March 2000. At the same time, the problem

<sup>&</sup>lt;sup>60</sup> Progress was very limited as of end-1999 in the restructuring of the other state banks, although BNI had had its business plan approved by the authorities. Meanwhile, there had been further reversals of earlier decisions, including on the earlier-agreed merger of BTN with BNI. Earlier plans for BRI to divest its corporate loans and to refocus solely on its core microfinance business have been delayed.

of Bank Mandiri's large net-open short-foreign exchange position was resolved through the issuance of part of the bonds as rupiah-denominated foreign exchange linked bonds. <sup>61</sup>

Measures were also taken to relieve the liquidity pressures faced by the bank. BI purchased from Bank Mandiri some of its bonds against cash in an amount sufficient to make it possible for Bank Mandiri to repay completely its interbank borrowings. Thus the bank's solvency was restored (at least for the time being) and its foreign currency exposure problem addressed, and it was expected to be able to operate profitably from early-2000. 62

If indeed the policy of recapitalizing all the state banks served to create high quality banks able to compete in the world economy—as was the intention in particular for Bank Mandiri—then this approach may have been justified, particularly if the banks are quickly privatized. If, however, this were to be merely one in a series of repeated recapitalizations, then it will have been just a waste of money. The degree to which the new managements in the state banks introduce radical operational restructuring will therefore be critical. Plans to monitor state banks' performance after recapitalization have been announced by the authorities. The effectiveness of this monitoring, and continued pressure to ensure that operational restructuring continues, will have a major impact in determining whether further recapitalization is needed in the future. Although there are some grounds for optimism regarding the authorities' commitment to monitor progress, there are bound to be continuing difficulties, particularly as long as these banks remain within the public sector. 63

# D. Prudential and Supervisory Reforms: Strengthening the Financial Sector through Improved Oversight

#### Introduction

BI has come under much scrutiny since the onset of the crisis and the subsequent near collapse of the banking system, with critics charging that weaknesses in its bank supervisory

<sup>&</sup>lt;sup>61</sup> Bank Mandiri, and to a lesser extent other banks, suffered from the fact that although the loans taken off its books had been a mixture of local currency and dollar denominated, the bonds issued in exchange were entirely denominated in local currency. Immediate closing of the resultant net-open position could have had a substantial effect on the foreign exchange market.

<sup>&</sup>lt;sup>62</sup> Nevertheless, Bank Mandiri experienced liquidity problems through much of 2000, in part because continued economic and political instability prevented the further decline in interest rates that would have made Mandiri's bond holdings more profitable and tradable. The problems were addressed in a series of ad hoc measures during the year.

<sup>&</sup>lt;sup>63</sup> The overall record during 2000 was not encouraging in this regard, with a slowdown in operational restructuring in several of the state banks.

program and regulatory framework, and maybe even more importantly the lack of effective enforcement of the regulations, were major contributors to the mounting insolvencies in the sector. At least in part, however, this may have reflected the situation that BI supervisors were far from independent, with their actions constrained by the bankers and the government.

Prior to the onset of the crisis, BI had essentially practiced a "no closure" policy in dealing with problem banks. Still smarting from the poor public reaction to the closure of Bank Summa in 1992 (see Chapter III, Phase I), BI favored instead trying to encourage shareholders to take responsibility and rectify a bank's weaknesses over time. As noted above, this was sought essentially through giving subsidies to the owners of these banks. The process was prone to abuse by some shareholders who made promises that were not kept, resulting in a further weakening of their banks. Meanwhile, BI made only limited attempts to enforce the regulatory framework. Maybe even more seriously, it had only extremely limited powers over the state banks, which were held to be under the sole control of their responsible ministry. There was essentially no BI supervision of the state banks.

#### The regulatory framework

With regard to the adequacy of the existing regulatory framework at the outset of the crisis, two distinct aspects had to be addressed. First, the regulations needed strengthening to bring them to international standards. Second—and probably even more important—was the need to improve the enforcement of the regulations. The independent audits of banks conducted during 1998 revealed a poor record of regulatory enforcement, apparently due either to political interference or the lack of a proactive supervisory program. Also, any enforcement undertaken tended to focus on the application of fines rather than measures aimed at changing behavior and restoring the bank to safe and sound operating conditions.

A review of existing regulations early in the crisis revealed that almost all prudential regulations needed updating. While any revisions to regulations should ideally be undertaken with a focus on normal market conditions, during the crisis it was felt necessary to determine temporary modifications to accommodate efforts to restore stability in the sector. BI sought to ensure that any phasings to achieve international standards should be made explicit, with a clear statement of the expected time period during which the phasing would be applied. The major regulatory gradualism introduced during the crisis involved an initial minimum capital adequacy ratio of 4 percent at end-1999, with the target of achieving the "Basel Standard" of 8 percent CAR minimum by end-2001. In almost all other areas—such as, for instance, most categories of classification and loan loss provisioning (see below)—the new standards had to be achieved at once.

#### Classification and loan loss provisioning requirements

A major concern at the outset of the crisis dealt with the accuracy of asset quality information reported by the banks. "Best practice" standards require that classification rules are based upon an analysis of the expected payment capacity of borrowers, with provisioning requirements calculated accordingly. However, loan classification and provisioning

requirements in place at year-end 1997 were not based on these standards. Loan classification was based on the length of time during which payments on the loans had been in arrears, and provisions were relatively limited for given levels of classification, and also were determined after collateral had been taken into account, without adjustment for changes in the value of that collateral. Not only did this lead to substantial delays before bad loans were recognized, but some banks appeared to be resorting to rollovers of nonperforming loans ("evergreening") and to "cosmetic accounting" practices to conceal the real quality of loans and to maintain an appearance of adequate capitalization.

A BI decree issued on February 27, 1998 addressed a number of these concerns, but while it represented a major improvement over the existing regulation by simplifying its application and shortening the time period before arrears led to the various levels of classification for nonperforming loans, it made only a limited step forward in addressing issues of borrower repayment capacity and cash-flow analysis. Furthermore, it was still not clear at which point interest was to be put on nonaccrual status, nor did the new decree address assessment of off-balance sheet activities. No additional guidance on the treatment of collateral was provided.

After further analysis, BI passed a new "Decree Concerning Earning Assets Quality" on November 12, 1998 that recognized the concepts of borrower repayment capacity and cash-flow analysis, as well as the need to incorporate off-balance sheet activities. On the same date, a "Decree Concerning the Allowance for Earning Assets Losses" was issued which adjusted the provisioning requirements in light of the new classification procedures and refined collateral valuation procedures to reflect the potential difficulties for the bank to gain possession upon foreclosure.

BI had been allowing deferral of up to four years of full recognition of the loans classified as "loss" or "doubtful." This practice ended in mid-1998, and banks were required to recognize losses on such loans immediately. A phasing period was permitted in the creation of a general reserve (1 percent of "pass" quality assets) and in provisions to be held against special mention and substandard assets, on the argument that losses on these loans are less certain. The quantitative impact of permitting the phasing was, in practice, small.

## Troubled debt restructuring

The rupiah depreciation and the deep economic recession resulting from the crisis meant that a key element in restructuring the Indonesian financial system would be to set appropriate incentives for banks to restructure nonperforming loans. The prevailing loan workout practices, under which loans could be returned to performing status upon the completion of a workout strategy, with no demonstrated performance requirement, made it relatively easy for banks to abuse "debt restructuring" as a means of cosmetically improving the condition of their loan portfolio. BI therefore promulgated a regulation on troubled-debt restructuring to ensure that it was undertaken in an orderly manner and that banks could not use this mechanism to continue hiding nonviable borrowers.

On November 12, 1998, BI issued a "Decree Concerning Debt Restructuring." Issues covered included the specification of losses as a result of foregone principal or interest, or transfers of assets or equity interests in a loan workout; the establishment of formal policies and procedures for restructuring, reporting, and monitoring; the inclusion of a cash-flow analysis of the borrower in the restructuring process; the application of clear accounting rules; special rules and restrictions for the restructuring of connected loans; and classification requirements for successfully restructured loans. However, there appear to have been some difficulties in applying the regulation, and some abuses were uncovered after its initial issuance. BI subsequently carried out formal and informal outreach programs to familiarize bankers with the regulation. 64

## Capital adequacy

BI began introducing minimum capital requirements in 1988; however, the initial requirements were small. Risk-weighted capital requirements (10 percent minimum requirement; 12 percent in some cases) were introduced in the early-1990s, but the onset of the crisis interrupted the complete phase-in of the program.

In November 1998, BI issued a circular letter which modified the minimum CAR previously in force by temporarily reducing it from 8 percent of risk weighted assets to 4 percent, reflecting the paucity of available bank capital in the crisis. The minimum 8 percent CAR requirement was to be achieved by end-2001. The change was implemented in conjunction with the comprehensive bank restructuring program discussed in Section B above. Banks under the joint-recapitalization scheme had to follow agreed business plans, including achieving 8 percent CAR by end-2001. In late-1999, all the other surviving private banks were required to develop business plans demonstrating compliance with the end-2001 minimum CAR requirement. State banks too were required to produce business plans according to this criterion.

#### Minimum capital requirements

On February 12, 1998, President Soeharto announced that the minimum capital requirements were to be raised more than sixfold to 1 trillion rupiah (roughly \$120 million at prevailing exchange rates) by the end of the year, and then increased further to Rp 3 trillion by end-2003 (one of the highest levels in the world). Although the stated objective of this change was to strengthen the banking sector through forcing mergers, announcement of the new limits prompted widespread concerns, principally regarding the risks of concentrating the banking sector among a very small number of participants.

<sup>&</sup>lt;sup>64</sup> Despite these efforts, however, corporate debt restructuring proceeded very slowly and has been a major factor in increasing overall bank restructuring costs. Prudential regulations on their own clearly have not been sufficient to move the process forward.

From a prudential viewpoint, it is generally acknowledged that minimum capital is not an indicator of the soundness of a bank; indeed, some of the largest banks in Indonesia (including the state banks) had proven to be among the most unsound. Also, effecting a merger during times of turmoil could be particularly problematic, as combining two weak banks would not mean the creation of one stronger bank. Moreover, such a requirement might also serve as a disincentive for owners of institutions with capital below the new minimum requirements to produce their own recapitalization plans.

In April 1998, BI limited the increase in minimum capital requirements to Rp 250 billion by year-end 1998, a 60 percent increase that would maintain rough constancy in real terms. Even at this level, the requirement would place pressure on some banks that had experienced severe capital erosion during the early months of the crisis. However, this was not to be the end of the issue. In September 1998, BI announced a minimum Rp 3 trillion capital requirement for newly established banks. This new minimum is well above that set by most countries, and no existing Indonesian bank met the requirement at that time. A dual capital standard was thereby created. There was no indication of any phase-in period for application of the new minimum standards to all banks, and thus the dual standard was expected to be in place for some time. One objective of the policy was to raise the value of existing licenses and to encourage foreign investors to buy an existing bank rather than establishing a *de novo* presence; however, the impact remains to be seen.

## Liquidity risk

Measuring and monitoring liquidity is crucial for both banks and supervisors to ensure that all liabilities are paid on a timely basis without disrupting banks' operations. Moreover, during a banking crisis, sound liquidity management may enable a bank to weather a deterioration in its condition. The management of liquidity risk requires that bank managers implement a well-developed reporting system that will allow them to have a good understanding of the maturity profile of banks' assets, liabilities, and off-balance sheet activities. On this basis, bank management should be able to measure banks' liquidity on an ongoing basis and also assess banks' ability to cope with crisis scenarios.

In light of these objectives, in October 1998, BI introduced a liquidity-monitoring scheme requiring banks to report cash-flow projections and a maturity-gap analysis, including off-balance sheet activities. The reports were required to be prepared on a consolidated basis, and sanctions would apply in cases of late reporting or misreporting. The "Decree Concerning Liquidity Monitoring of Commercial Banks" also required biweekly submission of projected cash-flow reports and monthly submission of maturity-profile reports. In addition, banks were required to adopt formal liquidity guidelines (policies and procedures for monitoring liquidity). <sup>65</sup>

<sup>&</sup>lt;sup>65</sup> The decree did not include a requirement for banks to prepare "worst-case scenario" projections, although such "stress tests" are central to analysis in many countries.

#### Information disclosure

Public disclosure of accurate financial data facilitates market discipline and, consequently, strengthens banking soundness. In January 1999, BI issued a decree amending the existing regulation on publication of commercial bank financial statements to require quarterly (rather than annual) publication. The amendment also increased the sanctions for late reporting and misreporting.

## Consolidated supervision

It is best practice that all banks be closely monitored on a consolidated basis. In the case of Indonesia this is particularly important, since under the blanket guarantee, deposits and credits in foreign branches of domestic banks are also protected. Experience from a number of countries has shown that the assets of offshore branches or subsidiaries may reveal a significantly greater concentration of risks, such as loans to enterprises which turn out to be connected to the bank-holding group, and foreign exchange exposures.

To perform an effective consolidated supervision, banks are now required to submit to BI periodic consolidated financial statements including not only assets, liabilities and off-balance sheet activities held by branches abroad, but also by local and overseas financial subsidiaries. Asset quality and banks' compliance with capital adequacy requirements and other prudential ratios are being assessed on a consolidated basis to ensure that all risks are monitored and identified properly.

### Foreign exchange exposure (net open position)

BI first introduced a net open position (NOP) limit in 1989, which was set at 20 percent of capital and later increased to 25 percent; however, no limits were maintained on individual currency positions. In addition, the requirements were designed in a way that limited the incentive of the banks to hedge their positions.

On December 31, 1998, following large losses incurred by banks during the year after the sharp depreciation of the rupiah, BI issued a Decree on Net Open Positions (NOP) of Commercial Banks. This decree limits the size of a bank's NOP in aggregate at close of business to 20 percent of capital on a consolidated basis and to 10 percent of capital from an individual currency. Intra-day positions must be maintained "within prudent boundaries." Banks were allowed an 18-month transition period to bring their NOP into compliance. 66

<sup>&</sup>lt;sup>66</sup> In June 2000, BI announced a delay in the date of achievement of full compliance with the NOP requirement.

## Off-balance sheet operations

At the start of the crisis, in line with Indonesian accounting principles, banks were allowed to defer losses deriving from off-balance sheet operations and amortize them within five years. Since this accounting procedure serves largely to conceal banks' actual level of solvency in their financial statements, BI moved to require that such losses should be deducted from banks' capital before they compute their compliance with the minimum CAR.

#### Legal lending limit (including on connected lending)

In Indonesia, as in other countries, loans to parties connected to the bank, i.e., directors, managers, shareholders, and their families, have been a significant contributor to the severity of the banking crisis. The main purpose of many private banks established after deregulation was to serve as a funding vehicle for the conglomerate to which they belonged. The state banks had large exposures to various state-owned enterprises, and many such loans were not subject to prudent underwriting standards.

At the onset of the crisis, BI already had regulations in place covering connected lending and large exposures. However, these regulations fell short in some key areas and were not enforced effectively. On December 31, 1998, BI issued a decree on Legal Lending Limits (LLL) to address some of the main concerns regarding the existing regulation. The new regulation defined better the concept of "connected party" and provided guidelines for banks on how to calculate the legal lending limit. It adopted a consolidated approach to LLL and included off-balance sheet activities.

While this was a major improvement over the previous regulation, some issues remained: (i) the regulation included interbank loans in the LLL calculation, which is not a common practice, at least for shorter maturity loans, and could distort interbank operations; (ii) the decree stated that banks would not be responsible for LLL violations resulting from rupiah depreciation; and (iii) the concept of an "arms-length transaction" was not clarified. Perhaps most importantly, the regulation did not define how the LLL should be calculated in an environment where actual bank capital is small: for instance, for those banks where a substantial part of the assets side of the balance sheet is in the form of bonds, the actual capital requirement is minimal, so a conventionally-calculated LLL gives virtually no scope for providing the requirements of a large borrower.

# Establishment of foreign bank branches

There has been some debate among the authorities on the desirability of allowing foreign banks to establish branches in Indonesia, rather than requiring that an independent legal entity be established. In the early days of banking deregulation, foreign banks were allowed to establish branches in Indonesia. However, in 1978, after ten such licenses had been issued, a moratorium was placed on further licenses, on grounds of "level-playing field" considerations, since branches of foreign banks did not need to provide capital locally.

In May 1999, BI passed a new regulation on the establishment of foreign bank branches, in an effort to create greater access for foreign participants. While this was a step toward a more open banking sector, BI also implemented a Rp 3 trillion asset maintenance requirement for the branches. This was in principle to match the new minimum capital requirement implemented for *de novo* banks. As noted above, the stated intention is to encourage foreign banks to buy existing banks: the overall effect remains to be seen.

## Limitations on domestic bank ownership by foreigners

The Banking Act of 1992 stipulated that foreign investment in a commercial bank could not exceed 49 percent ownership, meaning that foreign investors generally could not have a controlling interest. The Banking Act was amended in 1998 to allow almost full control of listed banks by foreigners; only a very minor local ownership requirement was maintained. However, nonlisted banks were still subject to the original rule, which created a dual regulatory standard, until a government regulation and BI Decree on the Purchase of Shares in Commercial Banks were passed on May 7, 1999. Foreigners were permitted to purchase 99 percent of the shares of an Indonesian bank.

#### Requirements concerning merger, consolidation, and acquisition of banks

In May 1999, a government regulation and an associated BI Decree were issued regarding mergers, consolidation, and acquisitions of banks. The regulation established the procedures that must be observed in each of these activities, with the requirements varying slightly depending upon the underlying purpose of the transaction. The regulation was enacted upon the principle that "in this era of globalization and free trade, it is necessary to encourage banks to build their strength by means of merger, consolidation, and acquisition of banks." It appears that the regulation is primarily directed at mergers or acquisitions that take place at the request of BI or IBRA.

The elucidations to the regulation state that "(t)hrough Merger or Consolidation, it is possible to create synergies between two or more banks with the expectation that a stronger bank will emerge with improved performance." While some observers saw merit in this regulation, others considered that it might presage a return to earlier practice under which BI has often, in the past, chosen "orchestrated mergers" over closure of problem institutions.

#### Revocation of bank licenses, dissolution and liquidation of banks

At the outset of the crisis, bank licenses were granted and revoked by the MOF, and not BI, as the agency responsible for supervision; as there were no special procedures for closing banks, they had to be liquidated under standard liquidation procedures for limited liability companies. Owners of many of the problem banks had relatively little of their own funds at risk, and yet were placed in charge of liquidating their institutions. A general meeting of shareholders had to approve liquidation and appoint the liquidation team, of which one-third of the members could be comprised of shareholders. This structure led to a protracted and apparently rather ineffective liquidation of the 16 banks closed in 1997, prior

to the establishment of IBRA. The liquidations are still in process, but there is evidence of significant asset stripping, and the authorities have acknowledged that recoveries are expected to be minimal.

With the establishment of IBRA and the promulgation of special powers for IBRA, it was possible to take advantage of these special powers in order to effect a more efficient closing and liquidation procedure. These powers included the ability to transfer claims without the consent of the debtor and to take assets of shareholders to compensate for expenditures incurred. In addition, a new regulation on the revocation of operating licenses and liquidation of banks was passed in May 1999, which gave licensing and delicensing responsibilities to BI. Under arrangements worked out between BI and IBRA, when IBRA closes a bank, its assets and liabilities are transferred out leaving only a "shell" bank; when this process is completed, the shell bank is transferred back to BI, where its license is formally revoked and the corporation dissolved.

While the new regulation is a significant step forward, it still leaves the shareholders in charge of the liquidation process; the authorities felt that changing that provision would have been too great a diversion from the Company Law. This has little real effect while IBRA and its special powers are still in place, but IBRA has a limited life and the regulation will need to be reconsidered before IBRA is closed.

At end-1999, the only banks that had officially had their licenses revoked were the 16 closed in November 1997. Licenses had not been revoked for the remaining 48 banks that had been either closed or taken over by IBRA, as this would apparently have invalidated the use of IBRA's special powers in the closure process. There still seemed to be some lack of clarity as to what constituted "completion of the resolution process," and it was, therefore, unclear when the revocation of licenses would actually occur.

#### The fit-and-proper test

BI incorporated a "fit-and-proper" analysis in its assessment of banks' owners and managers in the context of determining eligibility for the private bank recapitalization scheme. Toward the end of 1999, BI unveiled a formal compilation of its new methodology for the fit-and-proper assessment, which is designed to introduce greater transparency, more consistency in application, better documentation, and clearer due process for owners and senior managers potentially failing the assessment.

The fit-and-proper assessment is a critical element in Indonesia's bank recapitalization program, as well as in all stages of the supervisory function—from licensing through to the exit policy. The new methodology lists a number of possible transgressions that might indicate that an individual was not fit and proper. The various transgressions—such as breaching the legal lending limit—are assigned a rating based upon severity, and are further weighted based upon the individual's degree of involvement in a transgression.

Based on supervision and examination findings, generally including an onsite examination and follow-up interviews with owners and managers, the supervisors produce a draft report for a special inter-agency committee, the BEC, summarizing the evidence against those individuals considered to fail the fit-and-proper assessment. Upon the BEC's endorsement, the findings are presented to the bank and the respective individual, who has an opportunity to refute any criticisms. The assessment may be revised based upon additional information provided by the respondent, and the supervisors then determine an assessment status: pass, conditional pass, or failure. This evaluation is then discussed with the BEC and the deputy governors, with formal action and follow up taken as necessary. If found to fail the assessment, managers are asked to resign and owners to either sell or significantly reduce their ownership stake in the bank. Individuals may also be conditionally passed, in which case they will be asked to sign a statement promising corrective action, rehabilitation or restitution as appropriate, and acknowledging that a further transgression of the fit-and-proper criteria is cause for immediate dismissal.

As the fit-and-proper assessment involves consideration of qualitative and quantitative factors, such as whether the individual has been involved in a breach of prudential regulations, and how direct this involvement was, guidelines for consistent application of the framework help to prevent the appearance of arbitrary or selective decision-making. In this regard, several important principles appear to be captured in BI's guidelines. First, all applicable transgressions of the fit-and-proper principles are to be reported. Second, decisions are to be made in a consistent manner as to whether reported transgressions constitute a material violation of the fit-and-proper principle. Third, all data gathered for the evaluations, as well as the formal decision of the Board, are to be fully documented. Finally, the findings are to be reported to the respective bank owner or manager, who should be given a chance to respond.

## Off-balance-sheet activities

BI appears to have made less progress during this period in implementing effective supervision of off-balance-sheet activities. To some extent, this may have reflected prioritization, with the losses from on-balance-sheet activities already overwhelming its supervisory capacity. Nevertheless, the 20 trillion rupiah losses incurred by Eximbank indicated the potential risks in this area. BI sought to counter these risks to itself by amending the blanket guarantee in 1999 to exclude certain types of off-balance-sheet activities. Whether this exclusion provides an effective deterrent to undertaking such activities is, however, far from clear. 67

<sup>&</sup>lt;sup>67</sup> The principal derivatives activity of the banking sector appears to have been with regard to forward exchange rates. Large losses were reportedly also incurred from this source by the corporate sector, particularly in the early stages of the crisis when a rebound of the exchange rate was expected. There is little evidence that the banks had the capacity or understanding to monitor such activity by their corporate borrowers.

# **Enhancing Bank Indonesia's supervisory capacity**

Given the pre-existing weaknesses in the banking sector, described in the sections above, the 1997 crisis overwhelmed many of Indonesia's banks. But at a time when increasing attention needed to be paid to supervisory issues, BI's supervisory resources were substantially depleted. Nearly half of BI's supervisory personnel were seconded to IBRA in February 1998 in order to support IBRA's takeover of 54 banks. Nearly all these staff returned to BI over the subsequent months, but there was no immediate further build up in supervisory resources.

### Coordination between BI and IBRA

There is frequently a tendency for tension between a supervisory and a restructuring agency, given that the creation of the latter institution may well itself be seen as an indictment of the former. Indonesia was no exception. Almost upon its creation, tension between IBRA and BI was evident, stemming in part from a lack of clarity regarding the division of responsibilities between the two institutions. IBRA was designed as a limited life entity that would cease to exist after the crisis, with an expected lifespan of five years. Its purpose was to focus on restructuring troubled banks and managing problem assets removed from banks' books during restructuring or liquidation. In addition, it was initially given oversight responsibility for the banks brought under its auspices—almost 40 percent of the assets of the banking sector as from February 1998.

IBRA's supervisory program was to be more intensive than BI's. At the time of the takeover of the 54 banks, it placed staff on the premises of each bank. It was also to have access to all bank records and was expected to continue onsite and offsite inspection procedures. BI initially maintained that it no longer had supervisory authority over institutions under IBRA's control. However, especially because of the government's refusal to publicize IBRA's operations, it became difficult for the general public to appreciate how responsibilities were shared between the two institutions. Friction between the institutions was evident, for instance, in BI's unwillingness to transfer documentation to IBRA, and by the absence of any formal coordinating mechanisms.

With resentment growing, including among bank owners, about the role of IBRA, in mid-1998 the MOF agreed to transfer supervisory responsibilities for all banks back to BI. IBRA's role was to be more clearly focused on the resolution of problem banks and assets. BI legally retained its responsibilities for license revocation, suspension or liquidation, but agreed essentially to rely upon IBRA as its agent in reaching decisions on and then implementing these actions.

# Beyond the stabilization phase

The economic crisis largely diverted BI's focus and resources from the task of providing comprehensive supervision of the banking sector. It did, however, serve to focus

attention on the weaknesses in BI's bank supervision program. Certain underlying issues were rather promptly addressed, including through the issuance of a series of new prudential regulations on key supervisory topics. While these actions were an important first step in addressing weaknesses in the supervisory program, a much broader transformation was seen to be necessary to establish a comprehensive bank supervisory process that fully incorporated international standards.

## Framework for enhancing bank supervision capacity

The environment for implementation of an aggressive plan to enhance BI's bank supervision capacity was improved with the mid-1999 passage of a new Central Bank Law granting additional regulatory and enforcement authority to BI. The establishment of a new framework for bank supervision created new incentives for broad supervisory reform efforts.

BI initiated a comprehensive assessment of the nine units that formed the core of its Bank Supervision Function—its "Banking Supervision Department" (BSD). This assessment took stock of BI's current overall approach to supervision, identified specific weaknesses, and established a detailed and prioritized action plan for strengthening BI's regulatory, supervisory, and examination activities (see below). BI's Board endorsed the subsequent report, which served as the genesis of BI's Master Plan to Enhance Banking Supervision. This Master Plan was intended to provide a framework for the implementation of the broad reform efforts necessary to establish a bank supervisory process that fully incorporates international standards such as those outlined by the Basel Committee on Banking Supervision in its Basel Core Principles document.

### The Bank Indonesia Master Plan

As noted above, the diagnostic assessment was used as the foundation of BI's "Master Plan to Enhance Banking Supervision." Based upon the plan, a detailed and prioritized action plan was developed for addressing the highlighted weaknesses in BI's current supervisory program. For each strategic objective identified in the assessment, the detailed action plan identified specific tasks and preferred solutions. Responsibility for each task was assigned to a specific unit within the supervision function, and implementation was to be monitored by an appointed task force.

The Basel Core Principles provide the overall framework underpinning the Master Plan. BI's objective is to fully comply with Basel Core Principles by end-2001. The supervision master plan and detailed action plan for implementation focus most particularly on core principles 16–20, i.e., methods of ongoing supervision. Other broad subject areas incidental to plan implementation, such as governance, operational, and human resources issues are also included.

# E. Indonesian Bank Restructuring Agency (IBRA)

The establishment of IBRA in January 1998 indicated a marked swing in the authorities' approach to handling the banking crisis, from one that was essentially ad hoc to one that was highly centralized and set within a comprehensive framework. Over the following months, IBRA was to take over or close banks representing 30 percent of the banking system, including virtually all the large private banks in the country. In line with this, it accumulated assets representing around 20 percent of GDP. Lack of governance in the private sector or the rest of the state sector led IBRA to retain responsibility for working out these assets—plans for private asset management companies were rejected by the authorities on grounds of lack of transparency or governance in their proposed operations. Thus, during the period of this study, Indonesia adopted perhaps the most centralized approach to handling the banking sector aftermath of virtually any country that suffered a banking crisis in recent times. While this strategy was understandable and probably justifiable, in principle, it came increasingly into question as doubts arose about the governance of IBRA itself.

## Operations of IBRA in 1998

On January 27, 1998, Finance Minister Mari'e Muhammed announced a blanket guarantee on all deposits of the banking system, <sup>68</sup> a new framework for corporate debt, and the establishment of the Indonesian Bank Restructuring Agency (IBRA), which would have an expected lifespan of five years. The Director General of Financial Institutions at the MOF, Dr. Bambang Subianto, was appointed as its first chairman. IBRA operated initially under interim regulatory provisions, using staff seconded from BI, and premises lent by BI. Under these initial provisions it assumed responsibility for prudential management as well as restructuring of banks that came under its auspices. Despite earlier advice that IBRA should be an autonomous agency under a high-level interdepartmental committee, it was placed under the authority of the MOF.

With massive liquidity support still being supplied to the banking system, the need for action was urgent. On the weekend of February 14, IBRA placed under surveillance 54 banks, comprising those banks that had borrowed at least twice their capital from BI, plus four additional state banks already marked down for restructuring. The takeover, which the government insisted could not be publicized but otherwise left to be determined on uniform technical grounds, involved many hundreds of officials and security staff and led to the placement of IBRA staff within the premises of each of the banks. This "soft" intervention, however, had a very limited impact despite its ambitious objective. With growing concern

<sup>&</sup>lt;sup>68</sup> All deposits were covered except those derived from connected lending. Under enormous pressure from large depositors in the banks that had been closed in November 1997 (which included a number of powerful foundations and pension funds), the Finance Minister announced in February 1998 that the guarantee would also be applied retrospectively to those banks.

among bankers at the workings of IBRA, President Soeharto dismissed the Chairman of IBRA two weeks later.

In the following month attention focused on the presidential election, where President Soeharto—the sole candidate—was seeking a seventh term, and subsequently on the president's plan to introduce a currency board arrangement. The momentum established at the creation of IBRA seemed to be slipping in the face of hostility from a number of areas, including no doubt those groups that fell threatened. A Managing Director of BI, Iwan Prawiranata was appointed chairman of IBRA, but retained his BI position. MOF staff that had been seconded into IBRA returned to BI. IBRA staff reduced their presence in some of the banks they had taken over.

By early-April, with Indonesia resuming contacts with the IMF, attention refocused on resolving the problems of the banking sector. After exhaustive work to ensure that decisions were being made on uniform and credible criteria, on the weekend of April 4 IBRA took over seven banks that had each borrowed more than 2 trillion rupiah from the central bank (all but two of these banks had borrowed 5 trillion rupiah), and which comprised 16 percent of banking sector assets; it closed seven small banks that had borrowed more than 500 percent of their capital. For the first time IBRA was able to publicize its actions. It recognized the importance of public relations, employing a professional public relations firm, and arranging continuous television and other conferences involving Finance Minister Fuwad Bawazier, IBRA Chairman Iwan, and Deputy Chairman Rini. All deposits of the closed banks were transferred over the weekend to a designated state bank, and were available to customers as from the following Monday morning. Overall there was a strong positive reaction to the moves. Although runs continued on a few of the taken-over banks for about two weeks, these gradually tailed off and at no time during the rest of the period of the study were there ever again sustained pervasive runs on the banking system.

On this occasion, IBRA sought to assume full control of the banks that it had taken over ("hard intervention"). Owners' rights were suspended, and managers excluded. New management teams were brought in from "twinned" state banks. <sup>70</sup> Restrictions were placed on the business that these banks could undertake.

<sup>&</sup>lt;sup>69</sup> Double page advertisements were run in national newspapers, with the left-hand page being an announcement from IBRA listing the seven banks it had closed, and the right-hand page an announcement from BNI welcoming its new customers and summarizing the services that BNI could provide.

<sup>&</sup>lt;sup>70</sup> Each of the banks taken over was "twinned" with a specific state bank, which provided replacement management. Although probably a good idea in principle, few realized that the state banks were in as poor a condition as the private banks with which they were being twinned, and—correspondingly—how weak their own management teams were. In practice, the teams from the twinned banks did little to stop the losses at these banks, and most had to be replaced in the following months.

Throughout this period IBRA's legal powers had been rather limited, and the authorities had to move by use of a series of contracts. In the first contract, in exchange for the blanket guarantee, bankers had to agree to accept more intrusive supervision. The second contract, on February 14, involved bankers' requesting that IBRA place its staff on the bank's premises and take over supervision of the bank. In the third contract, on April 4, owners of the banks that were taken over requested IBRA to take over the full running of the bank. Throughout this period, liquidity support—since there was no collateral that BI could take as surety—was given in exchange for an undertaking from bank owners that their banks were in full compliance with all prudential regulations. It was the breach of this last contract, on the part of most of the banks that led subsequently to the shareholder settlements (see below), which were to form a major part of IBRA's prospective recoveries.

While BI and IBRA could impose contracts on the banks, they had no such power on the banks' borrowers. Although IBRA transferred the liabilities of the banks promptly, it was unable to secure the banks' assets. These were therefore left unminded, until the relevant amendments of the banking law became effective nine months later. This undoubtedly much reduced the ultimate recoveries from these banks.

# The next stage: legal powers and shareholder settlements

By July 1998, IBRA had its third head, Glenn Yusuf, a former banker and finance ministry official. IBRA had released Eximbank, the only state bank among those banks taken over in April 1998, so that it could be restructured with other state banks, and had taken over the largest private bank (BCA, previously thought to be the best bank in the country) as a result of runs during the racially-motivated riots of May 1998 that culminated in the replacement of the President. On August 20 IBRA closed three of the banks taken over (denoted BTO or, later, BTO1) in April. There had been once again a redefinition of the responsibilities of IBRA, with the new Finance Minister—who had been the first head of IBRA—returning supervisory responsibility for all banks to BI. By this time IBRA had essentially withdrawn its presence from the banks it had taken over in February, and had moved from BI on to premises of its own. Problems in the relationship between BI and IBRA seemed to be pervasive, with little formal communication between them and difficulties emerging on regular operational matters such as the transfer of supervisory files on the banks from one institution to the other.

Late 1998 saw developments in two major areas: progress in the amendments to the banking law that would give IBRA its necessary powers; and the first settlements with shareholders of those closed and taken-over banks that had violated their undertakings not to have breached prudential requirements.

On the first of these, IBRA was given, under section 37A of the amended banking law, special administrative powers in recognition of the dysfunctionality of the legal system. Under these powers IBRA was able, for instance, to take control of the loans and other assets of the failed banks without obtaining the approval of the borrowers or owners. It was also

able to threaten owners of failed banks with seizure of their assets for violation of prudential obligations, 71 and to sell assets itself without the use of the state auctioneer.

Regarding the second, IBRA had undertaken forensic reviews into the failed banks in the summer of 1998. Of the 14 banks, 10 were found to have committed prudential violations, usually breaches of the legal lending limit. IBRA negotiated with the owners of these banks, seeking agreement for a pledging of assets sufficient to pay back the liquidity support extended to these banks. On September 4 IBRA announced agreement on a portfolio of assets from the first owners that, on the basis of valuations of IBRA's financial advisors, would be sufficient to pay back the liquidity support. The agreement was, however, rejected by the government coordinating committee, and by President Habibie, who became involved personally in negotiations on the magnitude and the structure of the assets to be transferred. Eventually agreement was reached as regards the owner of BCA—taken as a test case which others would follow—to place specified assets into a holding company to be run jointly by the owner and IBRA and which would liquidate the assets over a four-year period. This agreement was accepted by all parties, although the retention of the former owners within the new management teams threatened governance and conflict-of-interest problems.

By end-1999 agreement had been reached with six owners, accounting for five of the banks. Fix holding companies had been established. While one or two more settlements were expected to be reached shortly, little progress had been made with the remaining owners. IBRA prepared to refer the cases to the Attorney General for prosecution.

The idea of the shareholder settlements was an imaginative response to seek to recover some of the public sector outlays for insolvent banks in a situation where the courts were unlikely to be of immediate use, and where a number of the owners still retained substantial financial wealth. The nature of the holding companies may, however, have been open to question, since by their nature they did not provide IBRA with full control. It remains to be seen how much can ultimately be collected and, if there are shortfalls compared with earlier expectations, whether IBRA will be able to revert to the shareholders to acquire additional assets. <sup>73</sup>

<sup>&</sup>lt;sup>71</sup> IBRA was at first reluctant to use these powers, which were challenged in the constitutional court. The court ruled in IBRA's favor in late 1999.

<sup>&</sup>lt;sup>72</sup> One bank had two owners who negotiated separately with IBRA.

<sup>&</sup>lt;sup>73</sup> By mid-2000, with the likelihood of serious shortfalls in prospect—and a significant additional burden foreseen on the budget—the authorities indicated their intention to renegotiate the agreement.

# **Operations of IBRA in 1999**

As noted in Chapter III, in March 1999 IBRA took over a further seven banks (denoted BTO2)—all had failed the test to be recapitalized jointly with the government but had more than 80,000 depositors and therefore were not to be closed at once. IBRA subsequently acquired an additional bank, Bank Niaga, when shareholders failed to put up their share of the joint recapitalization.<sup>74</sup> In May 1999 the banks taken over by IBRA in 1998 (BTO1 banks) were all recapitalized to 8 percent capital asset ratios.<sup>75</sup>

IBRA divided its functions into two: asset management of credits (AMC)<sup>76</sup> and asset management of investments (AMI). As part of the bank restructuring program, all loss loans from state, BTO, and jointly-recapitalized banks were transferred to IBRA,<sup>77</sup> in book-value terms the AMC's total assets came to over 400 trillion rupiah (25 percent of GDP), although in reality the value was much less. Documenting and obtaining clear title to these assets became an overwhelming task for IBRA. Sales during this period were restricted to noncore assets, such as motor vehicles acquired from failed banks; for these, IBRA initiated a regular program of auctions, which proved very successful.

Meanwhile, the AMC intensified its pressures against the largest defaulting borrowers. In early 1999 the Finance Minister set out a strategy under which borrowers would be classified depending upon their economic viability and degree of cooperation with IBRA, with strategies for handling them depending upon this classification. A schedule was developed for handling the debtors, beginning with the largest. The process was accompanied by publicity, with the names of recalcitrant borrowers being regularly published.

The managements placed into the BTO banks by IBRA seem not in the main to have been very successful, at least in terms of minimizing the ongoing losses of the banks. In mid-1999, IBRA replaced the management team in Danamon, its second biggest bank. In September IBRA restated its intention to merge the small BTO banks into Danamon, thus

<sup>&</sup>lt;sup>74</sup> The status of Bank Bali in this context was ambiguous—see next section.

<sup>&</sup>lt;sup>75</sup> This was double the minimum CAR at the time, and double the level to which state and private banks were being recapitalized.

<sup>&</sup>lt;sup>76</sup> At the outset, this had been known as the asset management unit (AMU).

<sup>&</sup>lt;sup>77</sup> The initial transfer was for loans classified loss as of the time of the international audits. A subsequent and final transfer was for loans classified as of September 1999. In practice the transfer of these loans was subject to a number of complications, including the reluctance of the banks to actually transfer those loans that they thought they could obtain recoveries on, and legal problems over the transfer of loans from banks that were not in IBRA. These issues were progressively resolved during the early months of 2000.

confirming its earlier intention to use Danamon as a platform bank. Little progress was made, however, in taking forward the merger until near the end of the year, with alternative merger proposals being put forward by various interested parties, and long delays in the confirmation of the new Danamon management team by BI. By end-year, however, the merger proposals had been reconfirmed, and detailed plans had been developed to carry out the mergers during the early part of 2000.

Overall, IBRA's progress in the second half of 1999 was slow, with senior management distracted for much of the time by events concerning Bank Bali. As part of the preparation for the joint recapitalization of the eligible private banks, the government had committed itself to pay eligible outstanding interbank claims on the failed banks (see Section B). With this commitment apparently not being delivered, the owners of Bank Bali reportedly made payments to intermediaries closely connected to the ruling party to facilitate the payment. 78 The revelation of these payments prompted calls for a full investigation of all involved. IBRA, as the agency that had authorized the payment of the interbank claims to Bank Bali, was one of the centers of this investigation, and was largely paralyzed for much of this period. One deputy chairman was dismissed, pending possible prosecution. Bank Bali further impinged upon IBRA when employee resistance led Standard Chartered Bank to pull out of its bid for Bali, worsening foreign perceptions of the willingness of the Indonesians to open up their banks to foreign involvement. IBRA introduced its own management team, pending recapitalization of the bank through a rights issue. Meanwhile, the former owners of the bank initiated legal proceedings against IBRA, challenging IBRA's takeover of the bank.<sup>79</sup>

With the new government taking office in November 1999 and IBRA challenged for its role, particularly on Bank Bali, there was a comprehensive change in its management team, including the appointment of Cacuk Sudarijanto, a senior civil servant, as the agency's fourth chairman.

### Some IBRA issues

#### Governance

IBRA is a particularly large public sector restructuring agency, with a range of tasks that in other countries have been placed with several agencies or in some cases in the private sector. The limited capacity for handling this form of activity, the serious questions about

<sup>&</sup>lt;sup>78</sup> This episode raises questions related to the design of the lender-of-last resort facility, which are discussed in the section on that facility (Section A).

<sup>&</sup>lt;sup>79</sup> These proceedings were dismissed in mid-2000, clearing the way for IBRA to privatize the bank.

governance in the economy, and the absence of much external private investment interest in Indonesia, given the depth of the crisis, all serve to explain this situation.

Bank restructuring agencies will, by their nature, be subject to much public pressure and self-interested vilification, as their task is to effect a major redistribution of the wealth in the economy, usually away from those that had wealth and power in the past. It is, in such circumstances, critical that the highest standards of good governance are observed so that the agency can defend itself against attack.

IBRA's record can be said to be mixed in this regard. Its position under the MOF, and the overturning of several of its technical decisions (such as that on the shareholder settlements) by political bodies, were unhelpful. On the other hand, IBRA's chairmen—particularly since 1999—have been subject to reporting to parliament, and have sought to be open to public presentations on IBRA's activities. Emphasis was placed on uniformity of treatment of banks and assets. An independent review committee (IRC), comprising two eminent Indonesians and three eminent foreigners, sought to exercise ex post oversight with quarterly meetings to examine IBRA's activities. By late 1999, the IRC had a full time secretariat in IBRA, preparing its meetings and keeping it updated on developments. The overall impact of the IRC, however, seems to have been limited.

One area where IBRA came into dispute with outside parties was on the issue of private asset management companies. Several banks, and other bodies, sought to acquire some of IBRA's assets—or to hold on to assets that were to be transferred to IBRA—in order to put them into their own asset management companies and work them out themselves. While the use of private AMCs in some circumstances is highly appropriate, it would have involved a number of serious concerns in this case, with lack of transparency on the prices at which assets would be transferred into or out of the AMCs and the risk of public subsidization of private sector workouts. With the authorities facing enormous private sector pressure on this subject, they decided to seek impartial expert advice. The Financial Sector Volunteer Corps (FSVC)<sup>80</sup> investigated whether it was appropriate, in the Indonesian context at that time, to outsource the loans to the AMCs. It concluded with the clear recommendation that governance considerations required that the loans should continue to be handled by IBRA.

In order to further strengthen governance, in late-1999, the Chairman of IBRA commissioned a World Bank-financed study on how the agency could improve governance.

<sup>&</sup>lt;sup>80</sup> This group of banking experts, headed by Paul Volcker, work essentially *pro bono* aiding the authorities in undertaking specific banking sector projects. The FSVC has to date been most active in Russia and other FSU countries, but also has a presence in some of the Asian countries. As of early-2000 the FSVC was intending to establish a full-time office in Jakarta.

With the results of the study awaited, the government committed itself to establishing a governing board.<sup>81</sup>

### Financial issues

For most of its existence IBRA has not had an explicit budget. Seconded staff were paid by their originating institutions; facilities were provided by other agencies, initially BI; and other expenses were expected to be met out of recoveries. This situation derived largely from the reluctance of the government in the early days to acknowledge the extent of the banking crisis, and hence to obtain sufficient financing in the budget. In addition to lack of transparency, this arrangement undoubtedly led to inefficiencies, for instance, unnecessary constraints on hiring practices.

More recently, IBRA did obtain its own budget. However, with substantial recoveries coming into the agency, additional problems emerged. The absence of clear procedures for transferring revenues to the government led to the risk of leaving resources idle or squandered.

During this period, IBRA kept its assets on its books at face value. While this policy may have some merit to avoid moral hazard effects—i.e., debtors would know that IBRA did not expect to collect 100 cents on the dollar—it served as a deterrent against IBRA negotiating realistic deals. Any resultant deal would appear to the public as causing a "loss" rather than as a recovery from losses incurred earlier. This, in turn, was likely to have been a significant factor explaining IBRA's poor image among the public—it led to a perception that it was selling the country "cheap" and, hence, denied IBRA the popular protection that would enable it to better withstand the powerful vested interests set against it. The introduction of a policy of recognizing "haircuts" and having assets on the books at expected realization values could serve to jump-start negotiations with borrowers, and help put IBRA's finances on a more transparent footing.

#### Asset sales

IBRA has been strongly criticized for being slow in starting major disposals of its assets—both the loans it has taken over and its equity stakes. To some extent this is undoubtedly justified. Sales were far slower than, say, in Korea or in Thailand. In mitigation, one should recall the deep intensity of the crisis and the ongoing political transition, freezing investor interest with regard to any involvement in the country. There were also delays in securing the necessary legal framework, as well as the sheer magnitude of the task of completing full documentation of assets, and preparing them for sale—and the possibility

<sup>&</sup>lt;sup>81</sup> After some delays, the study was completed and the governing board was established in mid-2000.

that, if there had been significant sales during the earlier stages of the crisis, these would probably not have reflected good governance practices.

At end-1999, the program for the future—as regards the sales of its banks and of its other assets—was ambitious. The biggest bank, BCA, and two other banks, were to be brought to point of sale in the first half of 2000; the platform bank was to be merged with nine-small BTO banks and brought to point of sale in 2001. At that point IBRA would have divested itself of all its banks (including the third- and fourth-largest banks in the country). 82

Under the present legal provisions, IBRA is to be wound up in February 2004. It has much to do to meet this target.

## F. Corporate Restructuring

While action on the banking sector has to be taken from the outset, given its critical role in the economy, this is not the only important part of the economy. Banking distress is in general accompanied by corporate distress, since problems experienced by the banks as lenders will mirror those of the corporates as borrowers. It may well take longer to address corporate sector problems, since they are more diffused and because different issues arise in the sharing of the costs, but addressing the corporate sector should be made a priority from the outset. Although the authorities did recognize this issue early on—the announcement of the establishment of IBRA and the granting of a blanket guarantee in January 1998 was accompanied on the same day by the establishment of an initial framework for restructuring corporate debt—two years later, while the banking sector restructuring was well under way, progress in corporate restructuring was a long way behind.

In Indonesia, as in most countries experiencing banking/corporate problems, the authorities have been far more reluctant to be as intrusive in their involvement on the corporate side as they are on the banking side, in large part because they do not wish to assume the costs of corporate restructuring. Nevertheless, with many debtors and creditors negotiating with each other, it was not clear that there was much incentive to reach an agreement quickly, especially if there was the prospect of a "haircut" on the debt if negotiations became protracted or the condition of the corporate continued to deteriorate. If corporate restructuring continues very slowly, this may jeopardize the gains on the banking side, as banks continue to find few profitable opportunities for lending.

The interaction between banking and corporate restructuring remains contentious and difficult to determine. On the one hand, the lack of lending by the banks to the corporates is seen as a "credit crunch," reflecting banks' high degree of caution and the need to achieve stronger capitalization ratios. On the other hand, such lending may be a prudent response to

<sup>&</sup>lt;sup>82</sup> In the event, delays continued on a number of fronts in 2000.

the lack of profitable opportunities in the (unreconstructed) corporate sector. Both factors may have an element of truth.

Corporates largely had to self-finance during the period of this study. Artificial stimulation of lending by reluctant banks would, however in any case, have been dangerous. By end-1999, some of the recapitalized banks were already open for new business. Anecdotal evidence suggested new lending was resuming, although this still had to be picked up to any significant extent in the aggregate figures.

# G. The Proposal for a Currency Board Arrangement

In February 1998 President Soeharto announced that Indonesia would shortly be introducing a currency board arrangement (CBA) at 5,000 rupiah to the U.S. dollar. At first glance the country seemed to be a good candidate for such an arrangement. BI was widely blamed for the ongoing banking crisis, and there was little credibility in BI's ability to resolve it. The currency depreciation of the previous months was attributed to the extensive liquidity support provided by BI. A CBA would replace the existing regime that permitted BI wide operational discretion with a rules-based system. Under such a system a number of controversial operations—in particular the provision of liquidity to the banks—would be severely curtailed or prohibited. The proposed appreciation of the exchange rate would reverse the upward pressures on inflation and on corporate solvency. Several countries—most notably Argentina and Bulgaria—had recently introduced such an arrangement in order to combat their own economic crises. A leading proponent of CBAs, Professor Stephen Hanke, was invited by President Soeharto to base himself in BI and to advise on the CBA's introduction. The immediate effect in the markets was positive, with the exchange rate appreciating almost 10 percent on the news.

The positive sentiment did not last long as analysts studied the proposal in more depth. The other CBAs had been introduced at the exchange rate prevailing in the market, or at a more depreciated rate in cases where estimates indicated that the level of reserves was insufficient to provide adequate monetary cover at the market rate. In Indonesia, by contrast, the proposal was inseparately linked to a 5,000 rupiah exchange rate to the U.S. dollar.<sup>84</sup>

<sup>&</sup>lt;sup>83</sup> Under a CBA, the authorities commit that they will stand ready to convert any component of the monetary base into foreign reserves at a specified rate of exchange. Such a commitment is credible only if the authorities have sufficient reserves to cover the monetary base—and indeed also a (not easily predefined) share of the broader stock of money, as this broader money (for instance, bank deposits) can be easily turned into demand for monetary base by the public. For details on setting up a CBA see, for instance, Enoch and Gulde (1997); and Ghosh, Gulde, and Wolf (1998).

<sup>&</sup>lt;sup>84</sup> One effect of the authorities' continued assertion of their intention to achieve a substantial exchange rate appreciation may have been to discourage borrowers of foreign exchange to (continued)

With the rupiah trading at around 8,000 rupiah to the U.S. dollar at the time of the announcement, the proposal involved an appreciation of around 40 percent, essentially by administrative fiat. It was far from clear that such a move would be credible to the markets; one might expect severe and early testing, particularly since no supporting macroeconomic measures were being proposed and indeed the authorities had already demonstrated a lack of tolerance for such measures. The CBA proposal was in fact attractive to some of its proponents precisely because it appeared as a substitute for the macroeconomic measures that would be needed to generate confidence to induce the desired appreciation of the exchange rate in the market. But the data showed that Indonesia had far too low a level of reserves to resist long in the event of such an attack.

A further major objection to the proposal derived from the condition of the banking sector. It was becoming recognized that there was widespread insolvency in the banks, and the authorities were only just starting to come to grips with how they should address it. While an immediate cessation of the provision of liquidity would be desirable, it was unlikely to be feasible, unless a large number of banks were to be closed immediately. Indeed, the recognition by the public that the authorities would no longer be able to provide liquidity to banks in difficulty could itself provoke alarm among depositors, especially in the very nervous conditions then prevailing. The introduction of a CBA might well undo the incipient benefits of the announcement of the blanket guarantee on bank deposits.

For several weeks the debate over the CBA dominated economic discussions and planning. While many in the government supported the plan, a range of academics<sup>85</sup> and (less visibly) officials voiced concerns.<sup>86</sup> Professor Hanke argued that the banking sector liquidity problems could, if necessary, be resolved through the fiscalization of the liquidity support.<sup>87</sup> However, no detailed quantification of the CBA proposal was ever prepared, thus further undermining the credibility of the proposal. Credibility was also not helped by the fact that

service their debt during this period. This in turn may have contributed to the growing losses in the banking sector and downward pressures on the exchange rate.

<sup>&</sup>lt;sup>85</sup> For instance, articles were published in the press by Professor Emil Salim, who was at that time standing as unofficial candidate for Vice-President in the forthcoming elections against the official candidate B.J. Habibie, and who prepared a detailed critique of the President's proposal.

<sup>&</sup>lt;sup>86</sup> The Governor of BI, Soedrajdad Djiwandono, was dismissed by President Soeharto on February 23, apparently because of his opposition to the CBA proposal and to the President's announcement of a twenty-fold increase in minimum capital requirements.

<sup>&</sup>lt;sup>87</sup> With the authorities already struggling to set up one major new agency, IBRA, it was far from clear that there would be capacity to set up a second at the same time, even if the modalities for its operation could have been determined.

some of those pressing strongest for its introduction were close to the presidential group; there was a suspicion that they wanted the 5,000 rupiah as a peg for capital flight in the short term and did not care that the peg might well not be sustainable. Some estimates indicated that if capital flight did emerge after the pegging of the rupiah at 5,000 to the U.S. dollar, if the flows were of a magnitude similar to those leaving Brazil at that time, the country would have reserves to defend the peg for less than one week.

By this time the IMF had made clear that it would not be prepared to support any program in Indonesia that involved a CBA, at least of the form that was being proposed. It supported the objective of achieving an appreciation of the exchange rate, but argued that this had to be accomplished by a comprehensive and sustained macroeconomic and financial program that would restore credibility among the public in the government's commitment to sound policies. In April 1998 the authorities agreed on a revised Fund-supported program that maintained the float of the rupiah, and where indeed the authorities committed themselves to only very limited intervention. For the remainder of the period of the study the exchange rate thus served as an indicator of credibility in the government's policies, rather than as a policy objective or constraint. Thus while policy reversals were subsequently reflected in renewed currency depreciation, this in itself never led to a currency crisis—as might well have occurred had the CBA proposal been adopted.<sup>88</sup>

## H. Establishing Monetary Control

Among the various ways in which Indonesian experience differed from that in other countries undergoing financial crisis was the authorities' inability to sterilize the liquidity support provided to banks in the early part of the crisis. This, in turn, was due in part to the absence of functioning domestic money markets, resulting largely from the absence of market-determined interest rates. The absence of sterilization, and the fixity of interest rates, is likely to have exacerbated the downward pressure on the exchange rate, thereby much intensifying the crisis.

During the period prior to the crisis, in Indonesia as in several other Asian countries, the monetary framework was anchored to the exchange rate regime. The exchange rate was managed closely vis-à-vis the U.S. dollar and was maintained broadly constant in real terms. Consistent with this policy objective, money market interest rates for rupiah were managed by BI and fluctuated in a relatively narrow range, for the purpose of supporting the exchange rate peg as well as facilitating financial sector stability.

The long-standing exchange rate stability and close interventionist policy toward domestic interest rates also shaped BI's money market operations; instead of active, genuinely market-based open market operations, the central bank provided banks deposit and

<sup>&</sup>lt;sup>88</sup> The CBA proposal has subsequently resurfaced in a proposal for dollarization in Indonesia. See, for instance, K. Schuler (1999).

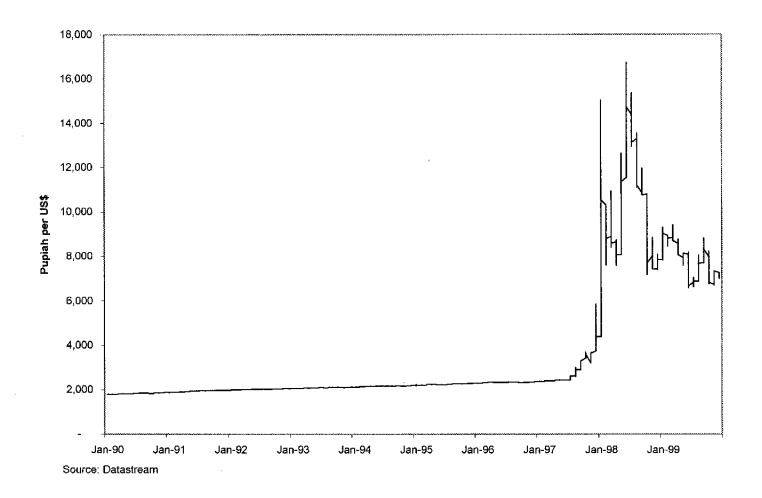
lending facilities at fixed interest rates and at the discretion of the banks. Essentially, the facilities functioned as "windows" and ensured that money-market interest rates were closely in line with the authorities' desired policy rates. However, rather than using a short-term interest rate alone as the key policy rate, BI effectively managed the entire yield curve from seven-day maturity up to 12-months, effectively eliminating much of the role of financial markets and their allocative mechanism in setting rates.

In late 1997 the collapse of the exchange rate peg significantly complicated policy implementation. The authorities had to devise a new, and credible, nominal anchor in order to regain monetary control. In early 1998, reserve money was chosen as the policy anchor within the context of a program that was supported by a Stand-By Arrangement with the Fund. The authorities abstained from intervening directly in the foreign exchange market to support any particular exchange rate level against the U.S. dollar. Rather, an active interest rate policy was used as the main instrument to control domestic liquidity growth and safeguard against further exchange rate depreciation. (See Figure 1.)

This, however, raised another serious problem because the existing operating framework was not well suited for the active monetary policy operations required in the new environment. The authorities had to quickly reform the institutional structure underlining monetary control. First, they urgently needed to contain liquidity growth, with liquidity expanding rapidly as BI replenished deposit withdrawals from the banking sector. Second, BI needed to establish a market-based interest rate that would provide a clear policy signal to the market regarding the monetary policy stance. Clearly, the two policy objectives were not unrelated. To address these considerations, BI reformed its monetary operations, including its liquidity management operations. These are described in more detail below.

While the lack of market-based instruments and money markets was an important factor behind BI's inability to reabsorb liquidity injected through lender-of-last-resort facilities from the banking system, it was not the only factor. The authorities tried to walk a narrow line in the implementation of monetary policy, seeking to resist downward pressure on the exchange rate while at the same time avoiding crippling effects on the financial system and the real economy. The implementation of monetary policy had to take into account the high and increasing debt-equity ratios in the corporate sector, together with systemic and structural problems that made the financial sector vulnerable to rising interest rates. On the other side, large uncovered foreign currency liabilities meant that currency depreciation could have a substantial adverse effect in the real economy.

Figure 1. Indonesia: Daily Foreign Exchange Rates—January 1990-December 1999



With these factors in mind, the authorities were reluctant to raise interest rates. In August 1997, BI had tightened its monetary stance by closing several refinance facilities (including SBPU); requiring state-owned enterprises to hold SBIs; withdrawing deposits from specific banks; and raising SBI interest rates. These measures had had a major impact on the banking system, as call-money rates jumped to about 100 percent. One bank, Bank Danamon, experienced a run, as it raised rates ahead of the other banks in the system, which sparked rumors that it was experiencing difficulties.

Although nominal interest rates rose significantly from late 1997, real interest rates stayed negative until August 1998. High nominal rates reflected the lack of confidence in the authorities' monetary and exchange rate policies. Monetary and credit aggregates continued to grow rapidly (both in nominal and real terms) in the second half of 1997 and the first half of 1998, only to level off in mid-1998 after real interest rates became positive, and inflation began to subside.<sup>89</sup>

## Developing market-based monetary instruments

### Transition to indirect monetary control

Since 1983, BI had introduced measures to reform its monetary operations, breaking away from the use of bank-by-bank credit ceilings and direct interest rate controls, and toward the use of indirect instruments of monetary control. The process was gradual and guided largely by exchange rate regime considerations.

Responding to difficulties in the implementation of monetary policy, BI introduced a new procedure, called "rupiah interventions," in January 1998. It announced that it would deal bilaterally with commercial banks in the interbank money market to absorb excess liquidity from the market at the going market interest rates. Since such interventions targeted banks able to access the interbank market at the lowest interest rates, i.e., those institutions least affected by credit risk and hence the most liquid, this allowed BI to "skim" the market and minimize the interest cost of deposits in its balance sheet. The rupiah interventions were successful in raising the interbank rates, from around 30 percent in early January 1998 to more than 40 percent in mid-February, but had little impact on banks' deposit and lending rates that were linked to the one-month SBI interest rate, which was determined by the President. Bank deposits typically were of one month maturity whereas the maturities of the rupiah interventions were significantly shorter, ranging from overnight to no more than two

<sup>&</sup>lt;sup>89</sup> The issue whether monetary policy was too tight during this period in the Asian crisis countries is examined by Boorman et al. (2000). They find that this was not the case, particularly for Indonesia.

<sup>&</sup>lt;sup>90</sup> For a further discussion of the developments of the monetary instruments in Indonesia, see Alexander, Baliño, and Enoch (1995); and Johnston and Sundararajan (1999).

or three days. It was therefore difficult for the banks to attract new deposits without being exposed to a significant interest rate risk, should SBI rates decline suddenly.

Even more importantly, monetary policy continued to lack transparency. The one-month SBI rate, which was used as the main indicator to signal BI's monetary stance, was no longer relevant as it lagged behind the overnight rate, and the volume of one-month SBIs had fallen sharply. In essence, the rupiah interventions had become the dominant monetary policy instrument. In the absence of a clear policy signal, if an individual bank increased its interest rates, this could have been interpreted by potential customers as a signal of distress or increased bank credit risk. Measures to increase transparency and the effectiveness of monetary policy were deemed necessary, in particular for the purpose of reestablishing the SBIs as the main monetary policy instrument.

In order to prepare for the introduction of the new one-month instrument and to respond to problems associated with the short maturity of its operations, BI moved its interventions to the one-week and one-month maturities, and after March 23, 1998 refrained from interventions in the overnight market. BI also raised the interest rate on one-month SBIs from 22 percent to 45 percent. 91

The SBI auctions become the key monetary instrument

In July 1998, BI introduced weekly auctions of one-month SBIs. At the same time, it terminated the tap sales of SBIs and limited the use of rupiah interventions to the management of short-term liquidity in the money market, principally between the regular auctions. Consequently, the one-month SBI became the key monetary policy instrument and provided an important policy signal to the market.

All commercial banks (both on their own behalf and on behalf of customers) and brokers could participate in the weekly SBI auctions. Bids were to be submitted to BI directly through Reuters, fax, or telephone. Unlike earlier, the target quantity of the SBIs was announced in advance of the auctions, and the interest rate would be determined as a result of the auctions. These auctions would make reserve money targeting effective. BI also opened a repurchase window for the SBIs in order to enhance their liquidity and acceptance in the money market. The window was automatic and open to commercial banks only. The

<sup>&</sup>lt;sup>91</sup> Administrative constraints meant that, as rates on longer maturities could not be raised commensurately, the yield curve peaked at one month. There was therefore hardly any liquidity in the SBI market for maturities longer than one-month.

<sup>&</sup>lt;sup>92</sup> Under this system, BI decides the cut-off interest rate, i.e., the highest rate at which SBIs would be allocated. If the amount demanded exceeds BI's quantity target, prorating is applied. The announced target is indicative, so that in exceptional cases BI can deviate from this target.

maximum amount of SBIs that a bank could repo was 25 percent of the average quantity allocated to the bank in the last three auctions. The discount rate was a weighted average interbank money market rate over the last three working days plus a policy premium. <sup>93</sup>

The operation of the weekly SBI auctions was quickly seen to be successful. The stock of SBIs rose rapidly, and the SBI interest rate became the principal benchmark. This allowed BI, in October 1998, to introduce also monthly auctions of three-month SBIs. As intended, the introduction of regular auctions shifted pressure away from the rupiah interventions and allowed them to be used as a fine-tuning instrument, to complement monetary/interest rate policy.<sup>94</sup>

As BI became more comfortable with the new operating environment, it further modified the institutional arrangements underlying its monetary operations. It began to announce the daily interest rates for its deposits for each maturity (ranging from overnight to one month), to provide guidance as to money market interest rates. Effectively, the introduction of the standing deposit facilities made the rupiah interventions less important as the primary means of intervening in the money market, although on occasion BI entered the market through active rupiah interventions, with the aim of pushing interest rates up above the "floor rates" offered at the standing deposit facility. Reverse rupiah interventions on occasion have been used to provide liquidity to the market.

BI thus achieved a broadly successful transformation in its operating environment to support its new monetary policy framework and to bring its operations into line with those used by other countries (see Box 4). At the same time, overall economic and political conditions are likely to be critical in determining how successful BI can be in developing its monetary operations. An unstable environment would make BI's liquidity management more difficult. Indeed, as a result of general political and economic uncertainties, in late 1999 BI postponed earlier plans to broaden its operations through the introduction of auctions of SBIs of six-month maturities.

<sup>&</sup>lt;sup>93</sup> A number of refinements were subsequently introduced, including increasing the size of minimum bid from Rp 50 million to Rp 100 million in September 1998, and eliminating limits on the number of bids in November 1998.

<sup>&</sup>lt;sup>94</sup> SBI repurchase operations have also been used for fine-tuning.

# Box 4. New Bank Indonesia Money Market Instruments and Credit Facilities

### Money market intervention instruments

#### Regular auctions of SBIs:

- Maturity: one and three months.
- Initiated: by Bank Indonesia.
- Frequency of auctions: weekly (one month) and monthly (three months).
- Counterparties: all banks.
- Provides key interest rate signal to the money market.
- In the tenders, BI sets the quantity, consistent with the reserve money target, while interest rate is allowed to clear the auction.

#### Irregular rupiah interventions and repurchase operations in SBIs:

- These are used to fine-tune daily fluctuations in liquidity and to correct any shortcomings in reserve money target following the regular auctions. 11
- Maturity: very short, ranging from overnight to few days.
- Initiated: by Bank Indonesia.
- Counterparties: banks, with which interventions are conducted bilaterally.
- The instruments are mainly used to manage liquidity.

#### Credit facilities

#### Reserve shortfall:

- These would constitute a violation of the minimum reserve requirement.
- Highly penal interest rate, initially 400 percent of JIBOR, to discourage recourse.
- Penalty would be imposed immediately.

#### Debit position:

- Resulting from a shortfall in the daily clearing.
- Highly penal interest rate, initially 500 percent of JIBOR, to discourage recourse.
- Penalty would be imposed for debit positions lasting more than one day.<sup>2/2</sup>

#### Discount facility:

- This facility is designed to help banks with liquidity difficulties, and to assist them in regulating their borrowing and return back to health.
- The time frame for borrowing varies by bank, reflecting each bank's unique situation.
- Interest rate is penal, initially 150 percent of JIBOR, to discourage continuous use.
- Other measures are important, such as increased enforcement measures, limits on bank's operations, and strengthened supervision, would provide the primary means for limiting liquidity support.
- Periodic reports to BI Management.
- In serious cases, the bank may be transferred to IBRA.

 $<sup>\</sup>frac{1}{2}$  For example, an auction may be under subscribed.

Due to uncertainty in the end-of-day clearing where positions only become known next morning, unintentional and small shortfalls could emerge.

## I. Interbank Market Segmentation and Liquidity Squeeze

At the outset of the crisis, money market activity in Indonesia was concentrated in two instruments, central bank certificates (SBIs) and interbank deposits (CDs). Relatively illiquid markets existed for repurchase agreements on corporate bonds, short-term promissory notes issued by the banks, and so-called SBPUs, operations where BI undertook a repurchase operation with a commercial bank using promissory notes endorsed by the bank as collateral.

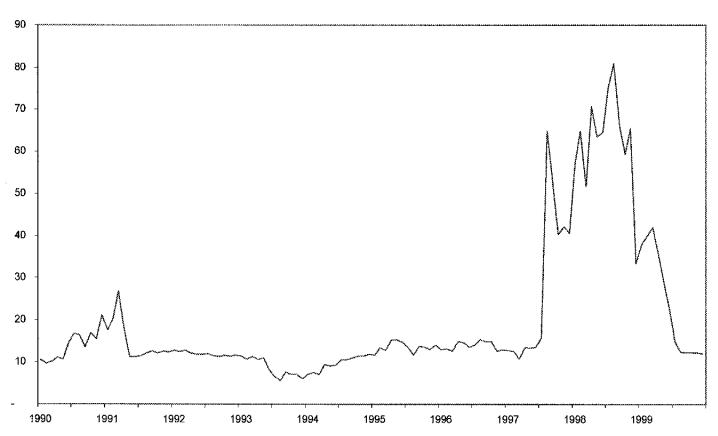
As the crisis unfolded, segmentation in the interbank money market became pronounced. Credit considerations (both the weakness of some banks and the lack of reliable information) induced many banks to limit their exposure, particularly to less-creditworthy institutions. Virtually all placements in the case of foreign banks were with other foreign or state banks and top-tier private banks. 95 The average maturity of interbank lending became much shorter to accommodate the preference for liquidity and a greater sensitivity to credit risk. Virtually all interbank placement was overnight. The average daily volume of transactions increased from about Rp 2.5 trillion during the first eight months of the year, to over Rp 8 trillion in early December 1997. Interest rates had been relatively stable during the first six months of the year, ranging from 5 to 30 percent (reflecting credit quality and market conditions), with a weighted average around 12–13 percent. In mid-1997 rates began to rise, so that the minimum increased to about 12 percent; the maximum rate soared to 300 percent (though for very few transactions), while the weighted average increased to over 60 percent. Thereafter, the general trend in money market interest rates was toward a slight easing, with a spike upward in early November following the announcement of bank closures. The weighed average rate fell to about 35 percent by early December 1997. (See Figure 2)

### Market segmentation and the flow of funds in late 1997

The reluctance of individual banks to place funds at risk, particularly with banks whose creditworthiness was weak, was a reflection of prudent behavior. However, the high interest rates offered by some banks where the perceived risk was greatest was a powerful attraction to those banks able to lend. Rates of 30 percent and above motivated banks to identify opportunities to lend. As a result, some top-tier banks were willing to place funds with some of the more risky institutions.

<sup>&</sup>lt;sup>95</sup> For the purpose of this analysis of the interbank market, the banks operating in the interbank market during the last quarter of 1997 were classified into seven categories, comprising foreign and joint-venture banks, state banks, and five tiers of private domestic banks. These last were segmented on the basis of the interest rates on their borrowing. While such a classification is inevitably to some extent arbitrary, it can provide useful information about the relative distribution of funds in the market and how this pattern changed over time.

Figure 2. Indonesia: Money Market Rates on One Day Loans Between Commercial Banks, 1990–1999 (In percent per annum)



Source: International Financial Statistics

Reciprocity became an important factor. Indonesian banks cut their interbank rupiah lines to foreign banks in response to the elimination of their foreign currency lines. This may have accounted in part for the relatively high rates that some foreign banks at times had to pay in the interbank market. There were also a number of cases of Indonesian banks placing funds with a bank partly because that bank had deposited funds with them when they were short of liquidity.

The primary suppliers of funds to the interbank market were the state banks (which provided on average one-quarter of the funds), foreign and joint-venture banks, as well as the top-tier private banks. Most of the increase in the interbank volume came in the form of placements by foreign and joint-venture banks, and by top-tier private banks, which more than doubled.

Private banks were the main borrowers, with almost one-half of interbank deposits going to banks in the lower tiers. Interbank deposits with the fifth-tier banks rose in nominal terms, but since the average daily volume grew from 5.5 trillion to 8 trillion rupiah, their share declined relative to the whole market. The other four tiers of private banks, especially the top two, experienced both relative and (very large) absolute increases in their deposits. In contrast, interbank deposits in state and foreign banks fell in relative terms, reflecting both the inflow of customer deposits caused by the "flight to quality" and, in the case of foreign banks, some cutting of their lines by domestic banks.

Foreign and joint-venture banks, and state banks lent mainly to other foreign banks, state banks, and each of the top two tiers of private banks in roughly equal amounts, but they did place a modest amount of funds directly with the lower tiers of private banks. The state banks sharply reduced their placements with foreign banks, shifting funds primarily to the second tier of private banks, and to a much lesser extent to the lowest tier.

Roughly 25 percent of the transactions took place at interest rates of 20 percent or less, the rates generally paid by most foreign, joint-venture, state, and the top-tier of private banks. Another 30 percent of transactions occurred at rates between 20 and 30 percent. Most of the remaining transactions were at between 30 and 60 percent, representing deposits in third-, fourth-, and fifth-tier banks. Few deposits were placed at rates over 75 percent, and only very few transactions were done at rates of more than 100 percent.

# A key problem: lack of capacity to intermediate

The capacity of the money market to recycle liquidity was limited because of the small number of available instruments, structural rigidities in the SBI market, and the creditworthiness concerns affecting many banks. As a result, it became much more difficult for many banks to manage their liquidity.

Concerns about the creditworthiness of individual banks were exacerbated by a lack of adequate information. Banks extending interbank lines conventionally received annual financial statements from their counterparts in the market, but it was difficult to obtain

additional information, such as monthly financial statements and detailed material about problem loans and asset/liability management which was particularly necessary in the prevailing crisis conditions. The introduction of a blanket guarantee, in January 1998, in principle eliminated the creditworthiness of the borrower as an important consideration for the lender. In practice, however, the blanket guarantee did not achieve a high degree of credibility, especially among the foreign banks, and particularly in view of protracted delays after the 1998 bank closures in making payments to creditors under the guarantee.

Furthermore, at this stage, use of the principal nonbank credit-based instrument, the SBI, was subject to a number of constraints. The volume of SBIs was limited, and much of it was allotted to banks in bilateral transactions with BI, at the latter's discretion. A bank that had excess liquidity, therefore, was not sure that it could buy the SBIs. Even more important, the SBIs were not very liquid. BI maintained a repo facility, but—again—transactions were at its discretion. A bank that was, for example, holding a one-month SBI maturing in three weeks was consequently not able to turn it into cash freely. In theory, it could have dealt with another bank, but given the SBI's potential illiquidity, other banks were not likely to enter into this kind of transaction. Thus, from the buying bank's point of view, buying outright an SBI with three weeks left to maturity tied-up liquidity for three weeks, when it could have been placed overnight in the interbank market (with prime banks) for only a couple of percentage points lower interest rate return.

SBPUs had been developed during the 1980s, in part in response to the fact that with the government budget always balanced—there was no market for government debt. "Market" SBPUs were in reality secured credit facilities, not tradable money market instruments based on third-party commercial paper. The maturities of the promissory notes or drafts underlying "market" SBPUs did not necessarily coincide with the SBPU itself, so that for example a one-month SBPU may have been based on a three-month promissory note. Consequently, the purchaser of an SBPU was unable to rely on repayment of the underlying note or draft as a source of funds upon maturity of the SBPU. In contrast, most instruments (such as bankers' acceptances), based on self-liquidating third-party commercial paper, had a maturity that coincided with that of the underlying note or draft. The key source of repayment was the note or draft by the issuer (corporate or foreign bank); the bank endorsing the paper was only a secondary source of funds, although as a practical matter the "accepted" note or draft was presented to the bank "accepting" (or endorsing) it, which paid it and then collected from the issuer of the note or draft. Thus the purchaser of self-liquidating third party commercial paper was able to assess the risk as depending at least partly on the issuer of the underlying note or draft, not entirely on the endorsing bank.

Overall, therefore, the size of the interbank market was limited and continued to shrink as banks' creditworthiness deteriorated. With increasing shortages of bank liquidity and few alternative sources, banks increasingly had to turn to BI. As conditions stabilized, and new monetary instruments were developed, interbank activity began to revive to a limited extent. The continuing lack of depth in the interbank market, however, continued to add to the fragility of the banking sector recovery.

### J. The Structure of Interest Rates

One of the most visible consequences of the financial sector crisis in Indonesia was the rapid rise in money market interest rates, in particular during the course of 1998. High interest rates in the money market translated into high deposit and—to a lesser extent—lending rates.

### **Interest rate spreads**

There are several ways to define interest rate spreads, reflecting different purposes for which the concept is used. First, a bank's interest rate spread can simply be defined as the interest rate it pays for its deposits and other funding less the rate that it charges on its loans and other earning assets. This may be seen as the marginal return from expanding activities. A broader definition includes the effective rate of return on old loans (which will be lower than the contract rate if these loans are not performing), taking account also of the cost of increasing provisioning, as greater volumes of such loans become classified. This definition is relevant for assessing a bank's profitability and its ability to perform financial intermediation and to grow.

Important segments of the Indonesian banking system have been characterized by large negative spreads—in the sense of the difference between deposit rates and lending rates—for an extended period since the start of the crisis. Bankers argued that the maximum that they could ask borrowers to pay ranged from 25 to 30 percent, even when there were major variations in inflation and in SBI rates. At the same time, however, banks offered deposit rates well above these levels, even though there were no profitable lending opportunities at such levels of interest. This reflected, in part, the experience of the loss of deposits during the early months of the banking crisis, and the punitive measures applied by BI to those banks that resorted to substantial levels of liquidity support. Private banks that were insolvent and expecting to close, in some cases, offered extremely high interest rates in order to attract new deposits, regardless of any expectation of being able to repay them. Even more importantly, state banks too offered very high interest rates, presumably with a view to maximizing market share, especially after the government made it clear that they would all be recapitalized by the state whatever their level of insolvency.

Meanwhile, buttressed by the lack of effective penalties against nonperforming debtors, loan collection performance deteriorated, which gave rise to ever-higher needs for provisioning. In the case of the state banks, where it was expected that loan losses would be transferred to IBRA's AMU and that the banks would be fully recapitalized, there was little incentive to pursue nonperforming debtors aggressively. Some banks were particularly generous in their deposit rates, while having no evident strategy for enhancing loan recoveries. The overall result was that, even while the nominal interest rate spreads in the banking sector were negative, there was a continued need for banks to make additional provisioning, further worsening the insolvency of the sector.

This structure of interest rates, and the escalation of insolvency, has caused many problems. First, the lack of commercial constraints on deposit interest rates led to increases in the depositor base in state and BTO banks—reflecting their aggressive deposit interest rate policies—thus artificially depriving the remaining, and probably initially solvent, banks of their needed liquidity, forcing them also to raise their deposit rates to uneconomic levels, and increasing their insolvency as well. Second, the acceptance of sub-cost of fund rates as the appropriate lending rates, and the lack of willingness or ability to pursue delinquent borrowers provided such borrowers a de facto fiscal subsidy, delaying corporate restructuring and thus increasing the ultimate cost of restructuring the economy. Third, the structure of rates provided a strong disincentive to engage in a meaningful financial intermediation—it was not surprising, therefore, that there was no new lending by Indonesian banks. Fourth, this structure may have provided the opportunity for "round tripping," whereby borrowers used the funds they had been borrowing from banks to place deposits with other banks—thus generating a risk-free way to obtain government-guaranteed funds.

## Early crisis phase: Explosion of intermediation spreads

With increasing awareness of problems in the banking sector and concerns over developments in the region, bank deposit and lending interest rates started to rise even before the actual crisis hit the economy. In August 1997, interest rates responded to the financial crisis in Thailand, and banks took the first steps to raise their deposit and lending rates. Following the deepening of the crisis, the depreciation of the rupiah, and consequent rise in inflation, the upward movement in interest rates accelerated rapidly, and by mid-1998, banks' deposit interest rates had risen to exceed 40 percent on average, compared with 12 percent before the crisis. Banks' lending interest rates also rose, from around 18 percent to over 30 percent on average, but the upward movement in lending rates lagged behind the rise in deposit interest rates. <sup>96</sup> By this point, banks were generally paying more for their deposits than what they earned on their loans, thereby further eroding their capital base. <sup>97</sup> In general, foreign banks fared better than domestic banks, whereas private banks initially had to raise their deposit interest rates the most.

<sup>&</sup>lt;sup>96</sup> There was a wide dispersion in the interest rates paid by various groups of banks and even within each group. Therefore, averages do not give a full picture of the situation.

The intermediation spread may simply be calculated as the weighted average lending rate less the weighted average deposit rate; if negative and assuming no change in the level of provisioning, this suggests that the banks are making losses in their deposit-taking and lending operations. Since the mandatory reserve balances are not remunerated in Indonesia, the cost of deposits has been adjusted to reflect the 5 percent reserve requirement (this adds about 2 percentage points to the negative spread when interest rates are around 40 percent). Moreover, the rapid increase in nonperforming loans in the books of the banks from early 1998 worsened the situation substantially. The negative intermediation spread rose to 20 percent in July 1998, twice the level excluding the effect of the nonperforming loans.

Significant differences can be observed between groups of banks, reflecting how different banking groups were perceived. In late 1997 flight to quality was from private banks to state and foreign banks (particularly as regards foreign currency deposits). By early 1998, the flight to quality was more widespread, and also affected state banks. The intermediation margins of the state banks deteriorated rapidly from the beginning of 1998, as these banks too offered high interest rates for deposits (see Figures 3, 4, and 5), seeking to retain deposits despite being unwilling or unable to raise lending rates. During the first quarter of 1998 depositors in the private banks were paid a high risk premium for their money, relative to the state banks, as a result of the decline of confidence in them, and with the blanket guarantee not yet credible. State banks were covered by a long-standing implicit government guarantee and were therefore perceived as safer.

As in other countries that introduced a blanket guarantee, BI announced an interest rate cap when the guarantee was introduced in January 1998. However, the process seemed to put little restraint on upward movements in deposit rates, with some banks—particularly state and BTO banks—offering interest rates on deposits of over 20 percentage points above the rates they were charging their borrowers in the latter part of 1998. In particular, state banks were not able to raise their lending rates in line with private and foreign banks, reflecting a client base that was mostly state-owned companies. In 1999, with the weakest banks removed from the system, and confidence increasing overall, the height of the cap was progressively lowered to reach only 100-basis points above the level of the JIBOR banks' rates. While there was some debate about shifting the ceiling to one of the market rates that had by now become available—in particular the SBI rate—no such move had occurred by the end of 1999. 100

<sup>98</sup> See Chapter IV, Section A.

<sup>&</sup>lt;sup>99</sup> It is not clear how vigorously the ceiling was enforced. In late 1998, newspapers were reporting deposit rates by some banks far in excess of the interest rate ceiling.

<sup>&</sup>lt;sup>100</sup> Or indeed by the end of 2000.

Figure 3. Deposit Rates by Bank Group

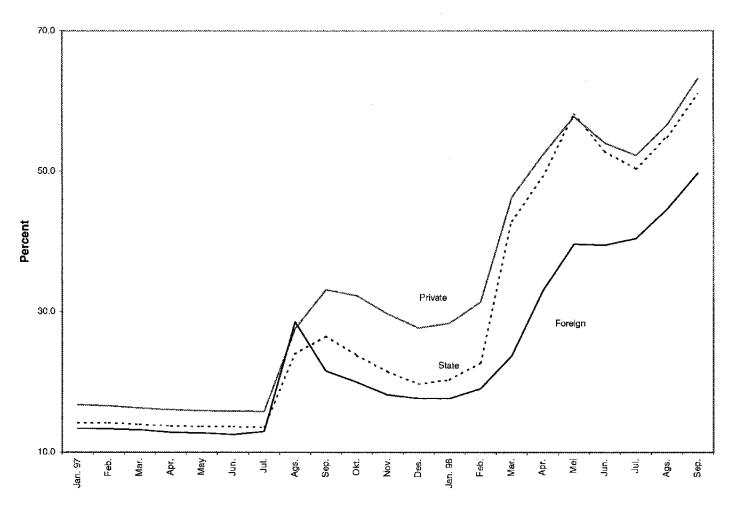


Figure 4. Credit Rates by Bank Group

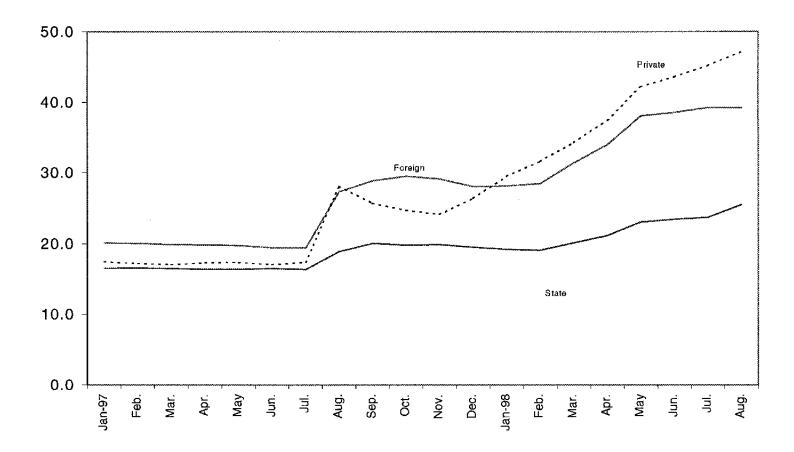
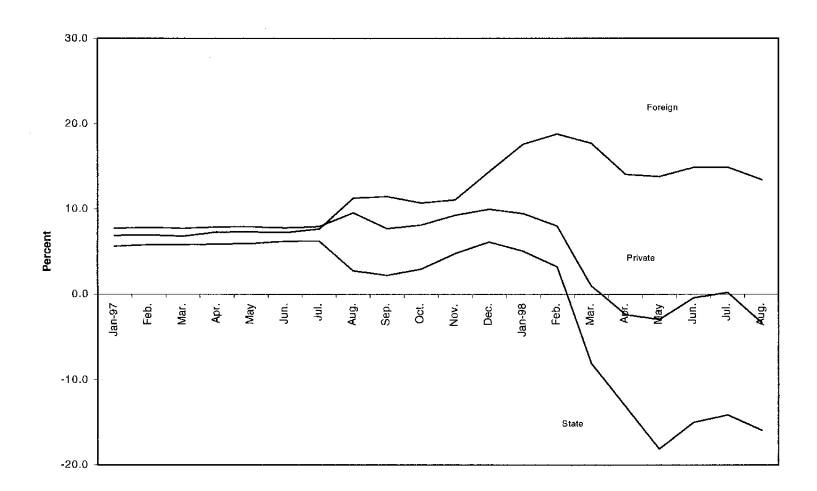


Figure 5. Intermediation Spread by Bank Group



As the banks' liquidity situation improved, and the maximum permitted spreads allowed under the deposit guarantee scheme were cut, the dispersion between the deposit interest rates offered by different groups of banks and the different banks within each group started to decline. Overall, foreign banks were considered the safest and thus posted consistently the lowest deposit interest rates. The risk premium on bank deposits for the domestic banks relative to the foreign banks—an indicator of confidence in the Indonesian banking system—declined from around 2,000-basis points in June 1998 to about 250-basis points at the end of June 1999. The nominal level of interest rates in the second half of 1999 was less than half of that in August 1998, when they were at their peak. The lowering of deposit rates, and of the differential during this period did not lead to disintermediation from the banking system, or to pressures on the exchange rate. Since March 1999, total deposits in the banks began to increase both in nominal and real terms. (See Figure 6.)

### Impact on lending

Total bank claims on the private sector peaked in mid-1998 (see Figure 7) and started to decline thereafter, both in nominal and real terms. In part, this reflected a write-off of bad debts by banks as they were being recapitalized.

At the end of 1999, and as the result of the high interest rates and the economic depression, the value of the outstanding bank loans had declined below the level reached at the beginning of 1995 in nominal terms, and in real terms it was only about one third of the level observed in January 1998. No new lending occurred in the economy, all credit lines were frozen, and banks' only focus on the asset side of their balance sheet was to restructure their loan portfolios.

Bankers reported consistently that they refused to undertake new lending because the widespread corporate difficulties meant there were few creditworthy borrowers. This problem was exacerbated by the absence of any effective bankruptcy procedures. In addition, banks were under pressure to improve their capital asset ratios, and hence did not wish to increase their stock of lending. Accordingly, lending rates reported by banks have mainly reflected the rates at which banks were accruing interest on outstanding loans, rather than the rates charged on new lending. Corporates have largely had to rely on internally-generated funds if they wished to undertake new investments. Private banks on average performed better than the state banks, offering lower deposit rates and posting higher interest rates on loans. Toward the end of 1999, with some banks having been recapitalized and confidence on the rise, some banks began to resume new lending.

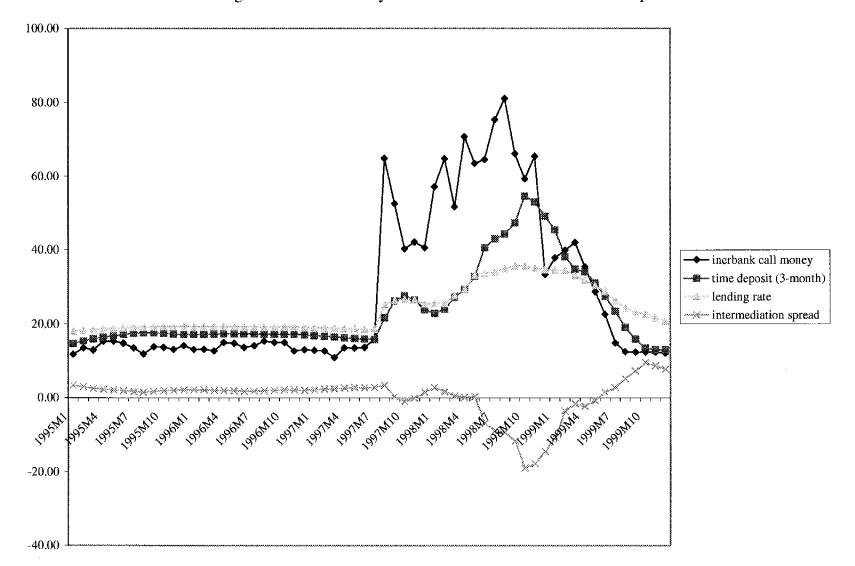
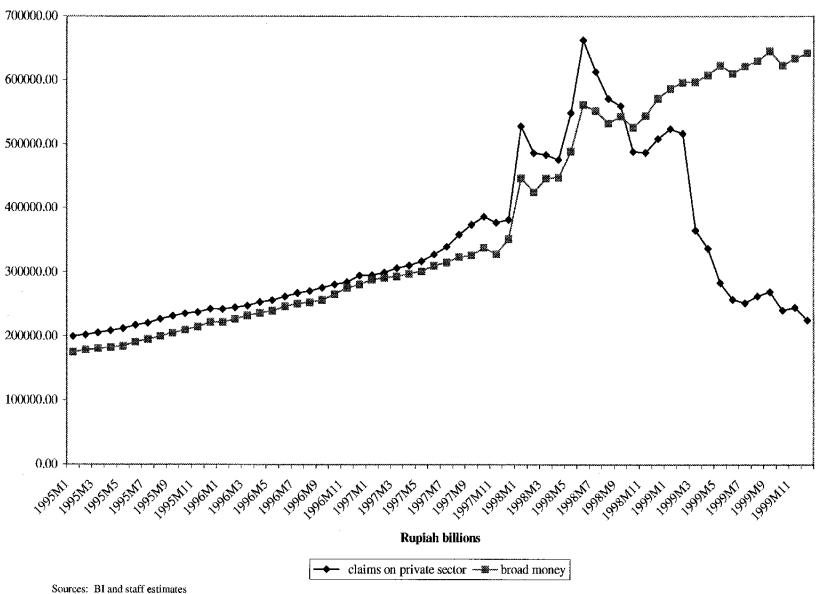


Figure 6. Selected Money Interest Rates and the Intermediation Spread

Figure 7. Money and Credits



### K. Government Domestic Bond Market

### Developing a secondary market for government bonds

Reflecting a lack of liquid secondary markets for corporate debt, intermediation in Indonesia has been primarily conducted through commercial banks. Indeed, the banking sector expanded very rapidly, particularly during the 1988–94 period when the number of licensed banks more than doubled, from 111 to 240. The nonbank financial sector comprising mutual and pension funds, insurance and leasing companies also developed rapidly, but remained much smaller that the banking sector, estimated in 1997 at only 11 percent of the total financial sector.

The domestic bond market remained small in comparison with the equity market, which benefited from large portfolio capital inflows. Mutual funds expanded their operations rapidly, especially after the deregulation of financial services, as embodied in the revised Capital Market Law of 1995, which permitted mutual funds to be wholly foreign owned and granted them exemption from income taxes for nonresident investments.

Due to the absence of fiscal deficits and hence the lack of domestic government securities, the fixed-income market in Indonesia has been dominated by money market instruments (i.e., SBIs and short-term promissory notes issued by banks (SBPUs)). Domestic companies issued commercial paper and banks issued deposit certificates (CDs). <sup>101</sup> There was some liquidity in over-the-counter secondary markets for SBIs and SBPUs. The liquidity of commercial paper was limited, and there was no secondary market for banks' CDs.

Where such a yield curve exists, this provides a risk-free benchmark to investors that is used to price other long-term assets. In the past, interest rates on SBIs offered such a benchmark, but yields extended only to the twelve-month maturity before the crisis and to three-months since then. A domestic long-term debt market will, however, now be needed, if only to manage the debt associated with the recapitalization of the banking sector. For BI, the existence of a liquid secondary market for government debt would expand the instruments of monetary control and enhance the transmission of the policy signal. In particular, it would allow the central bank to introduce open-market operations that rely on the secondary market infrastructure (e.g., reverse operations in Treasury securities as the underlying instrument).

### The rise in domestic government debt

Since 1999, the government has issued large volumes of bonds in the context of the bank-restructuring program. The first of these securities (160 trillion rupiah) were placed directly in BI to replace the lender-of-last-resort support that the central bank provided to

<sup>&</sup>lt;sup>101</sup> State agencies also issued bonds to finance their operations.

banks in distress. Meanwhile, an estimated Rp 400 trillion is being issued to recapitalize the banks. Total bonds outstanding will come to over 50 percent of GDP—a substantial jump-start to the market.

Several types of bonds have been issued. First, on the bonds placed in BI the principal is index-linked, and the bonds carry a nominal return of 3 percent per annum. The principal is adjusted once each year in line with the change in the consumer price index, so as to keep the real value of the debt constant. The maturity of index-linked bonds extends to twenty years, and the amortization of the principal begins gradually, starting five years from issuance. The bonds that have been issued, or will be issued, to banks to replace their negative net worth comprise fixed- and variable-interest rate bonds. Reflecting the close relationship between the interest rates of the SBIs and interest rates offered on bank deposits, the bulk of these bonds are at variable-rates, with interest linked to the three-month SBI interest rate. The maturity of these bonds ranges from three to twelve years. The remaining bonds carry fixed-coupon interest, ranging from 12 to 14 percent, and maturities ranging from five to ten years. In part to address the huge fiscal cost associated with the restructuring, the amortization profile of the bonds is heavily back-loaded.

# Secondary market trading

Secondary market trading in the SBIs and SBPUs is largely conducted over the counter. The SBIs are issued in paper form (Bilyets Depot Simpanan) and are registered in the name of the primary dealer to whom the SBIs are allocated. Investors must register the SBIs in their own names. The SBIs are cleared at BI. The SBPUs are also issued in physical form; their maturities range from a few days up to one year.

Almost all corporate and state-agency bonds are listed on the Surabaya Stock Exchange, but secondary market trading takes place over-the-counter. The Stock Exchange has started to offer a facility called OTC-FIS (i.e., over-the-counter fixed-income service) that provides real-time quotations and trade summaries, among other services, to the participants. Secondary market activity in Indonesia has generally been limited; foreign interest too has been limited.

All government bonds that will be issued to the banks, i.e., variable and fixed-rate bonds, will ultimately be tradable in the secondary market. Trading will be mainly overthe-counter, although these securities might also be listed in the local stock exchange (e.g.,

<sup>&</sup>lt;sup>102</sup> This linkage puts pressure on the banks to address the negative interest rate margin between banks' assets and liabilities.

<sup>&</sup>lt;sup>103</sup> As from February 2000, banks were allowed to place up to 10 percent of the bonds they had received into trading portfolios. Further releases were envisaged for the following months. In the event trading in the first months of tradability was negligible.

Surabaya Stock Exchange). BI is acting as the custodian, and has established an electronic book-entry registry to this effect to record the ownership of the bonds, as well as any changes in the holders of the bonds due to the secondary market trading in these securities. The bond registry will maintain security accounts for BI, the MOF, registered banks, market makers, and the subregistries, which maintain securities accounts for other bondholders.

# Regulatory framework

While the MOF is the issuer of the bonds and hence determines their terms and conditions, BI, as the agent of the government, has been delegated operational responsibility in these matters. On the other hand, the oversight and regulatory role related to the securities markets in general is vested with the securities market regulator, BAPEPAM, which under the Capital Market Law is authorized to regulate and supervise the securities markets in the country. While BAPEPAM will have overall responsibility to supervise and regulate the capital markets in Indonesia, BI will need to license and regulate the primary dealers since these will be the key counterparties for its monetary operations.

#### L. Governance

Governance issues have been at the heart of the banking crisis in Indonesia. At the onset of the crisis, the banking sector was weak because of directed lending, breaches of legal lending limits, and inadequate capitalization. Handling of the crisis was much impeded because of the negative reactions to the interventions of October 1997, when political interference prevented the application of uniform principles in the selection of banks for closure from being followed through. Governance problems have included serious on-going issues with regard to each of the principal institutions involved (BI, IBRA, and the state

<sup>&</sup>lt;sup>104</sup> It is called BI-SKRIP (Bank Indonesia System for Clearing, Registry, and Information for Government Paper). The Surabaya Stock Exchange together with the KSEI (which is a privately-owned clearing center which provides clearing and custodial services to private securities) has also been developing an electronic registry for these securities. Settlements of securities transactions through the KSEI will be channeled through selected clearing banks that have accounts with both BI and the KSEI.

<sup>&</sup>lt;sup>105</sup> It is expected that securities firms and banks will be designated in the government-bond market as primary dealers.

<sup>&</sup>lt;sup>106</sup> BI will pay interest and principal on the outstanding debt, authorize market makers to operate in the secondary market, organize the primary auctions of government securities, and advise the MOF on issues related to the management of the debt.

<sup>&</sup>lt;sup>107</sup> BI, under the Law Number 23, of 1999, has responsibility over the payment system, including settlements and clearing of payment transactions arising from securities trades.

banks), which were reflected in a series of well-publicized events that served to weaken the momentum for restructuring. These issues go well beyond the scope of this study, and reflect the pre-existing structure, where there was no autonomy for individual public sector agencies, and limited adherence to rule of law. Nevertheless, key examples where governance issues affected the restructuring process are briefly covered in this section.

While these examples are rather diverse, nearly all have a key element in common: they indicated to the public that the government was not serious, or not sufficiently committed, to thorough reform. In all these cases, the result was a loss of confidence in the domestic currency reflected in repeated depreciations that tended to wipe out the gains painfully achieved over previous weeks or months. The periods of exchange rate decline over this two-year period closely reflected the periods when governance concerns were uppermost. This weak exchange rate performance not only undermined the credibility efforts themselves, but also had a marked effect on the economy, prolonging the crisis far beyond what otherwise would have been the case.

### Closure of the sixteen banks

At first glance the closure of 16 banks in November of 1997 seemed a serious effort by the authorities to establish credibility for their handling of the banking crisis. Following individual financial reviews of 92 banks, it was determined that 16 banks were in such dire circumstances that they should be immediately liquidated. Several very well-connected banks were included in the grouping, and public sentiment was encouraged when it was noted that those banks were not granted special dispensation but were indeed subject to the same treatment as all others.

As discussed in Chapter III, Section A, however, a son of President Soeharto, who had lost his bank in this first wave of closures, was soon allowed to take over another small private bank, which was given a foreign exchange license by BI. By transferring most of his former customers, staff, and activities to the new bank, he effectively opened his former bank under a new name. Meanwhile, there was a failure to act on important elements of the recently concluded IMF-supported program, for instance, as regards the reform of the rice monopoly and the national car company. Credibility in the commitment of the authorities to reform was seriously undermined.

## Bank Indonesia

Prior to the passage of the new central bank law in 1999, BI had had very little operational autonomy. Direct political interventions in day-to-day decisions regarding individual banks were common. There was no supervision of state banks; private banks practiced egregious violations of prudential requirements, including on legal lending limits, and on classification and provisioning requirements. Tests of fitness and propriety of owners and managers were not applied until mid-1999. Bank's Commissioners rarely exercised proper oversight over the banks to which they had been appointed—indeed, in many cases it was not clear what the Commissioners' role actually was. BI also exhibited deficient internal

control procedures, as set out in the Supreme Audit's report of BI in late 1999. It was thus difficult to document clearly the various financial flows during the crisis, including the funds provided to the banks in late 1997 and early 1998, under the various lender-of-last-resort facilities. This led to protracted squabbling between BI and the MOF as to who would ultimately pay for the support, <sup>108</sup> as well as on-going disputes as to whether all the support provided was really justified.

An example of the lack of independence of BI arose in early 1998 when President Soeharto announced his intention to introduce a currency board arrangement at a highly appreciated exchange rate (see Chapter IV, Section G), as well as some of the highest minimum capital levels in the world for banks in Indonesia. Both proposals raised serious governance concerns, and were opposed by the governor and most of the senior officials at BI. As a result, the president dismissed the governor—the first dismissal of a cabinet-rank appointee during Soeharto's 30 years in office—as well as several of the most senior BI managing directors.

#### **IBRA**

Any bank restructuring or asset management agency comes under severe pressure from powerful outside interests. Where the agency is responsible for restructuring and redistributing as high a share of the country's assets as is the case in Indonesia (at end-1999, the nominal value of the assets under IBRA's control came to over 25 percent of the country's GDP), such pressures will be especially intense. IBRA has been subject to outside interference since its inception; its first chairman was dismissed after only three weeks, reportedly because he had been pursuing IBRA's mandate too aggressively. Delays in the passage of enabling regulations for IBRA to exercise its functions meant that several months passed before IBRA was able to secure assets that had come under its auspices.

# Structure and budget of IBRA

IBRA's structure was affected in the first year of its operation by the reliance that was to be put on its "superpowers." Given the pervasive problems in the country's legal and juridical systems, the law setting up IBRA gave the agency special powers, for instance, to take control of the assets of delinquent debtors without their consent. In order to benefit from the powers, IBRA's asset management unit (AMU, later renamed AMC, asset management of credits) was established within IBRA rather than as a self-standing legal entity. IBRA's reliance on its special powers meant that it could not operate effectively until the law and its

<sup>&</sup>lt;sup>108</sup> From a consolidated public sector perspective, there is no difference whether finance comes from a central bank or a finance ministry. The lack of cohesiveness between the two institutions, however, and public posturing that the central bank might be insolvent if the MOF did not pay for the liquidity support provided by BI, undermined the credibility of BI, no doubt impeding its effectiveness in the early months of 2000.

implementing regulations became effective. For unexplained reasons, each stage of the passage of the law was protracted, and it was not until February 1999 that IBRA was able to use its powers. As a result, it was, for instance, unable to manage the assets of the banks closed in April 1998 for ten months after the closures: the result was undoubtedly a depletion in the value of the assets, and an increase in the ultimate cost of the banking sector restructuring for the public sector.

Out of concern at parliamentary reaction to the expected cost of the bank restructuring, the 1999 budget included only the net cost of the bank restructuring operation in the appropriations sought from parliament. With net costs set at only half the expected gross costs (principally interest payments on the bonds being issued), IBRA was put under pressure to generate substantial early returns. IBRA's own expenses too were to come out of returns. This nontransparency severely undermined the accountability of the operation. Only in 2000 was IBRA scheduled to provide its first audit, and was the overall appropriation for IBRA related to its projected outlays.

Meanwhile, IBRA was seriously affected by inadequacies in the rights of creditors in dealing with defaulting debtors, including bankruptcy provisions for banks and corporates, and the inability of a creditor to seize or transfer an asset of a defaulting debtor without the consent of the debtor. Although legal provisions in this area were amended to improve creditor rights, repeated findings by the courts against the creditors served to undermine severely the credibility of the process; various proposals to circumvent the problem, such as the appointment of "ad hoc" judges had to be put forward.

A more immediate way to address the problem was to give IBRA "superpowers" to by-pass the standard, and dysfunctional, legal channels along the lines of the powers given, for instance, to the tax authorities in some countries. These powers enabled IBRA to take control of the assets of the banks that had been closed, to transfer loss loans out of banks that were being recapitalized, and to threaten to seize assets of those bank owners that were in violation of the guarantees they had given on the prudential compliance of their banks. Some misgivings have been expressed about the extent of these powers, but given their temporary and clearly directed nature, and the inability of the conventional court system to resolve these issues, there seems to have been little alternative to IBRA using these powers aggressively.

In 1998 an Independent Review Committee (IRC) was established as a mechanism to provide oversight of IBRA's activities and to ensure transparency in its transactions. The IRC comprised five independent experts, of whom two were Indonesian and three were foreign. While this committee produced useful reports for IBRA, it was designed to provide an ex post monitoring function rather than act as an Executive Committee. The other obligations of the IRC members meant that the IRC only met quarterly. By 1999, it was operating with a full-time secretariat of independent consultants: also, a respected former finance minister assumed the chairmanship and raised the committee's profile. In late 1999, IBRA management saw the need to increase governance further and appointed (under World Bank financing) consultants to provide recommendations. It was expected that the consultants—

who were due to report in early-2000, would recommend the establishment of a governing board, <sup>109</sup> to exercise day-to-day surveillance over IBRA.

# Private bank recapitalization scheme

The details of the private bank recapitalization scheme were discussed above (see Chapter IV, Section B).

Those involved in the process made efforts to ensure that the scheme was carried out on a uniform and transparent basis. Criteria for eligibility for the scheme were specified in advance, and basically adhered to throughout the process. Calculations of banks' financial positions were undertaken by outside consultants; their recommendations were submitted to a series of four inter-agency committees before final decisions were made. In areas subject to subjective interpretation—such as owners' passage of a "fitness-and-propriety" test, objective standards were devised to assist judgments—although inevitably there has been some questioning of decisions in specific cases.

The two major threats to good governance in the scheme occurred toward the beginning and the end of the process. In the first, after the scheme was announced but before any of the technical work was completed, President Habibie announced the first two banks to be recapitalized—of which one was a small, unknown, bank with a very poor reputation. Under pressure, President Habibie modified his earlier statement, saying that these banks were just eligible for consideration. The second threat occurred when certain powerful groups sought to resist the outcome of the technical work. While the government declared delay in implementing the scheme, these groups sought to reverse the outcome on a number of connected banks, including through trying to define preferential criteria for so-called pribumi banks. With such a preferential criteria threatening to undermine the credibility of the whole exercise, the government backed off once again, and uniform standards were maintained across the sector.

### The state banks

The state banks, in particular, long suffered from a weak credit culture, inadequate loan loss provisioning, and poor risk management. In the past, they were used as the government vehicle for funding projects with questionable profitability or legal basis. They have been recapitalized numerous times. The state banks had not been subject to onsite examinations by BI. This led to a dual regulatory standard—one for the state banks, and another for the private banks.

Reviews of the state banks' operations confirmed their appalling record, with nonperforming loans in some cases in excess of 90 percent of total portfolios; many loans

<sup>&</sup>lt;sup>109</sup> As noted above, this Board was established in mid-2000.

had been extended without a thorough credit analysis as part of the lending decision. Losses continued to rise during the crisis as the state banks—which frequently served as market leaders—raised deposit rates in order to retain and expand their depositor bases.

Meanwhile, there was a lack of clarity regarding which ministry was vested with oversight responsibility—the MOF or the Ministry of State Owned Enterprises (MSOE). In fact, neither ministry exercised much authority over these banks; the government relied instead on key individuals selected for strategic positions in the banks. In an effort to establish a more structured governance framework for the state banks, a new monitoring function was proposed to be established in the MSOE in late-1999. This would serve as the vehicle through which the government would exercise its ownership responsibility in the future. <sup>110</sup>

A major attempt to improve governance at the state banks came with the establishment of Bank Mandiri through the merger of four of the seven state banks; after the announcement of the merger in late-1998, the legal merger was completed in mid-1999. Managements of all four component banks were replaced by a totally new team brought in from outside the state bank sector and advised by a major foreign bank. As a pre-condition for the capitalization of Bank Mandiri, the new management prepared a comprehensive business plan for the bank: the plan was reviewed by a series of committees on which BI, IBRA, and the MOF were represented. With the business plan approved and implementation under way, Mandiri was capitalized in two phases, in late-October and late-December 1999.

### Bank Bali

The so-called Bank Bali affair was a case that received enormous publicity from mid-1999, in which Rp 546 billion (about \$80 million) was transferred out of Bank Bali to the accounts of PT Era Giat Prima (EGP), a finance company run by senior Golkar (ruling political party) officials. The transfer was characterized as a payment for "debt collection services." The management of Bank Bali was at that time desperate to free Rp 904 billion in interbank claims due from a failed bank; these funds were covered by the government guarantee, but much confusion and disagreement over the eligibility of these particular claims had left the funds—much-needed liquidity for Bank Bali—tied up for months. EGP allegedly claimed they could negotiate with the necessary parties to get the funds paid. And indeed, shortly after agreement was reached between Bank Bali and EGP, the disputed transaction was finally approved by BI and IBRA and the funds paid out under the government guarantee scheme. From the EGP accounts, funds were transferred to dozens of other bank accounts in Indonesia and abroad, some of them belonging to Golkar party officials and to former legislators. It was alleged that the Golkar party intended to use the funds to help finance President Habibie's reelection campaign.

<sup>&</sup>lt;sup>110</sup> Prospects for the exercise of this monitoring function were thrown into doubt in early 2000 when responsibility for these banks was transferred back to the MOF.

The revelation of this case prompted a major investigation of the management of the government guarantee scheme by IBRA and BI, conducted by the Supreme Audit Agency (BPK) with the assistance of PricewaterhouseCoopers (PWC). The investigation report claimed that senior officials made at least 11 other attempts to collect fees from banks that were trying to retrieve government guaranteed funds. It cited the involvement of senior members of the government and party in meetings related to the transfer. The investigation report itself became the subject of some controversy.

Based upon the investigation, two senior officials—one each from BI and IBRA—were dismissed on suspicion of corruption. With intense media attention and a series of parliamentary investigations of high government officials under way during the build-up to the presidential election in October 1999, the Bank Bali case seemed to exemplify all the concerns about corruption, and the lack of governance, under the old system. With his popularity plummeting, President Habibie declared that he would not be a candidate in the election. However, while there was much publicity at the time the audit report was released, the case has languished in the court system, and it is still not clear what actions will directly result from the investigation. However, indirect ramifications appear widespread, with senior government officials tainted by association. The fact that Indonesia's first democratic elections in 40 years were held shortly after the Bank Bali case broke, and a wholesale change of government ensued, shrouds the true extent of the fallout from the affair.

The experience of Indonesia indicates how poor governance undermines credibility in an otherwise well thought-out restructuring strategy, and adds substantially to the cost of the strategy. The repeated and protracted periods of currency weakness during the two years of this study mirror closely the periods when governance issues were most in the public's mind, and indicate the serious difficulty of turning around the effects of a banking crisis while governance continued to be defective. Overall, governance issues were at the core of the reasons why the exchange rate at the end of the study was still more depreciated than its level in, say, early May 1998.

<sup>&</sup>lt;sup>111</sup> Investigations continued after the election, with additional senior officials identified as suspects by the Attorney General during the early months of 2000.

<sup>&</sup>lt;sup>112</sup> Such episodes continued during 2000 (for instance, when the President dismissed a senior economics minister for reasons that were not very clear).

## V. FINAL OBSERVATIONS

### A. General

The first lesson from the crisis is how quickly things can get out of hand, and an apparently well-managed and strongly performing economy can be plunged into deep crisis when there is little reliable information on economic and financial trends, when analysts are not watching developments closely, and when the authorities demonstrate a clear lack of commitment at the start to seek to come fully to grips with the crisis.

In Indonesia, clearly not everything was done right in handling the banking crisis. However, overall, a comprehensive and—as long as governance issues did not get in the way—transparent strategy was put in place that served to protect a core banking system and establish conditions for the revival of intermediation, development of financial markets, and recovery of some of the outlays of the public sector. The very depth of the crisis, and the myriad of measures that had to be taken to address it, provide the opportunity to draw a wide set of important lessons.

A banking crisis is bound to be difficult to handle. At the outset there will be limited information and heavy pressures on policymakers for quick decisions and actions. By its very nature, a crisis is a sudden major change in conditions, and there may be reluctance to accept the extent to which conditions have in fact changed. Thus, there is likely to be a tendency to denial and thus to do less than has to be done. In any case, management of a banking crisis will be an evolving process, with additional techniques being brought into play as more information becomes available, deniability less possible, and consensus achieved that robust action is necessary. While policymakers should always be seeking to establish a strategy for handling crisis and to establish credibility from the outset by adopting a comprehensive and transparent approach to handling the crisis, it will be hard—and indeed probably premature and dangerous—to fully enunciate it early on.

Following on from this, it may be dangerous to seek to predetermine the ultimate outcome at the outset. For instance, there was talk, during the earlier part of the crisis, of the optimal number of banks in Indonesia, and what measures one could take to bring the system down to that number. Indeed, the restructuring strategy proposed by some of the government's advisors was based on such an objective. In the event, the initiation of largely market generated solutions has served to avoid excessive, and probably counterproductive, administrative interference in the restructuring process. The likely shape of the future banking sector is being determined as stabilization takes hold.

At the outset, few observers could see the extent of the crisis in Indonesia. While some banks were known to be in difficulty, it was held that virtually all the major banks were sound. Similarly, economic management was held to be good, in large part because of the long history of uninterrupted growth, the sound fiscal position, the general openness of the economy, and credibility in the continuity of the economic policy team, and there was little indication of the depth of the economic problems. To some extent this came from a paucity

of reliable information. The quality of banks' reporting was lamentable, depressed both by inadequate reporting requirements and lack of monitoring or enforcement by BI. Hence high standards of financial disclosure, full adherence to international accounting standards, and regular professional independent audits, would not only serve to provide public information that could generate prompt responses that could avert a crisis, but, if a crisis did emerge, would much facilitate the authorities' handling of the crisis and significantly reduce its length and severity, and the costs that resulted from it.

Handling a banking crisis is made much more difficult if the public does not have full confidence in what the authorities are doing. If there is a lack of confidence in the banking system and no credibility in how the authorities will handle it, or whether they will protect depositors, a natural reaction will be flight from the banking system and maybe the currency. Particularly in this situation full transparency becomes critical. The authorities need to explain clearly to the public what they are doing and why. Decisions have to be on the basis of simple, uniform, credible, and defensible criteria.

Action needs to be taken across a broad front. Ad hoc measures, such as those the authorities had been employing with regard to specific weak banks since the early 1990s (the so-called "nursed" banks), 113 by their nature are not capable of dealing with problems in the sector as a whole. Moreover, the authorities' credibility can be much enhanced by adherence to a comprehensive macroeconomic and structural program. Resolving a banking crisis will be particularly difficult when macroeconomic conditions are not sound, and when the authorities do not demonstrate an ability to organize themselves coherently and to take difficult decisions on a timely and consistent basis. This indeed was a serious impediment during the first months of the crisis.

## B. Handling the Crisis

In response to the crisis in late 1997, the Indonesian authorities put in place, over the following months, a program aimed at restoring the viability of the financial sector. The already formidable challenge was further complicated by the fact that the banking crisis was coupled with a general economic crisis which brought about a severe depreciation of the exchange rate and rapidly rising inflation. Even worse, it was undertaken during a period of political transition during which governance issues were never far below the surface. Progress in addressing banking problems was repeatedly set back, causing the recovery process to be much more protracted than it might otherwise have been.

Addressing a banking crisis is very likely to involve interventions in particular banks—closures or takeovers by the authorities ("open bank resolution"), or a mixture of the two. If these occur at the outset of a crisis, the authorities are likely to have to rely on

<sup>&</sup>lt;sup>113</sup> Those distressed banks subject to intensive monitoring and tight guidance by BI, as explained in Chapter III, Phase II.

liquidity criteria, such as the amount a bank has borrowed from a central bank in order to determine in which banks to intervene. Over time, as more information becomes available, interventions can be determined on solvency grounds—the extent to which a bank has negative equity. In any case, it is important that the criteria for interventions are credible and transparent, are applied uniformly, and explained well to the public.

The immediate costs of such interventions are likely to depend on the skill with which the interventions are carried out—that owners and managers are not given a chance to strip the banks; that the authorities get full access to the premises; and that depositors and other secured liabilities holders can be reassured that they are being fully protected. This will require substantial staff resources—several hundred took part in the interventions in Indonesia—and good coordination among the various official bodies.

Ultimate costs depend on how the authorities handle the banks after interventions. In the case of banks that are closed, the authorities need to secure and manage the assets until sold. With open bank resolution the situation may be even more difficult: a new management team needs to be brought in to run the bank; former owners and managers need to be kept away; and the bank needs to be brought to point of sale. Where the crisis is deep, and where there have been interventions into a significant share of the banking sector, such rehabilitation may take years.

In Indonesia, the ultimate costs will be very much greater than they might have been. Although the interventions in April 1998 were carried out effectively, the inordinate delays in passing and making effective the necessary amendments to the banking law meant that IBRA was unable to fully take possession of the assets of the closed banks until February 1999. As regards the banks taken over, they were initially managed under twinning arrangements with managers from state banks, but with limited success. Seeking to restore their deposit base (see below under moral hazard) these banks offered depositors among the highest interest rates of any banks in the country, far higher than the returns they could make from using the funds. Ultimately, these negative spreads have led to greater costs to the government, either in payments to meet the guarantee obligations to depositors if the bank was closed or in recapitalizing the bank if it was kept open.

In a deep systemic crisis, such as that of Indonesia, where there are interventions into many banks, it is likely to be appropriate to employ a variety of techniques of intervention. Among those used in Indonesia were closure, merger, recapitalization on the basis of operational restructuring, and creation of a platform bank. The new banking sector that is emerging reflects this variety. 114

<sup>&</sup>lt;sup>114</sup> A specific focus on the varieties of interventions in Indonesia is contained in Enoch (2000).

#### C. Moral Hazard

Moral hazard can arise in a number of forms when a blanket guarantee is in place, although during a crisis these become relatively less important. Conventionally, a major risk is thought to be that banks' owners and managers, when facing insolvency, gamble on recovery and undertake especially risky business. In this case, however, the moral hazard seems more to have been as regards depositors, as weak banks sought to recover lost deposits by offering uneconomically high interest rates. Although an interest rate ceiling was introduced at the time of the guarantee, this still offered sufficient room to generate interest rate differentials and a redistribution of deposits toward the weaker banks, as well as an overall level of deposit interest rates that led to negative interest spreads for much of the crisis period. The government commitment to recapitalize all the state banks regardless of their condition also proved costly. With this commitment state banks' managements lost much incentive to aggressively pursue bad borrowers; recognizing this, borrowers had less incentive to continue to service their debts. Loan performance fell dramatically from mid-1998, reportedly even among those with the ability to pay. The prospect of haircuts for borrowers in difficulty added to this trend, with the presumption that it would be hard to distinguish those unable to pay from those merely unwilling to do so, and that therefore it was unlikely to be beneficial for a borrower to continue full servicing of its debts. 115

# D. Costs and Government Responsibility

The government has recognized that bank restructuring, particularly when a blanket guarantee is in place, is a government responsibility. Costs have three main elements: compensation to BI for the liquidity support extended to the banks; compensation to those banks taking over the liabilities of the banks that have been closed; and recapitalizing those banks that are undercapitalized and stay open. In all cases finance is provided by bonds, of which the interest cost appears as a budget item. There is no alternative source of funding of such expenditure in the economy. If the burden were laid with BI, this would likely undermine BI's ability to pursue its monetary policy objectives, and would ultimately lead to equivalent fiscal costs through the need for the government to recapitalize BI. With the cost assumed on the budget, it is demonstrated transparently with other elements of public expenditure, providing appropriate incentives to resolve the banking crisis expeditiously and effectively. Recoveries, through IBRA or other agencies provide a direct offset to these costs on the budget.

One depressing factor in this regard is the apparently ever-increasing estimate of the cost of restructuring. By end-1999, it was estimated that over 600 trillion rupiah (\$80 billion) of bonds would need to be issued. In part, these higher estimates denied from better

<sup>&</sup>lt;sup>115</sup> Krugman (1998) attributes a broader concept of moral hazard—inflation of asset prices due to excessive lending from unregulated banks—as a major factor in causing the overall financial crisis.

recognition of the depth of problems in the banking sector. In part, however, they derive from the protracted nature of the resolution of the banking crisis, deriving from the many delays chronicled in this study, greatly extending the period during which the banking sector was increasing its losses.

Assessment of the condition of a bank depends primarily on an assessment of the value of its loan portfolio. This in turn requires assessment of the likelihood that loans will be properly serviced, as well as valuation of collateral—and assessment of the probability of securing it—if the loans are not serviced. All these elements proved difficult during the Indonesian banking crisis, delaying full recognition of the depth of the crisis, and increasing the cost of addressing it. Valuation of collateral may be difficult at any time. In times when the market—for instance in real estate—has become paralyzed, as is bound to be the case during a banking crisis, it may be almost impossible. In the case of the Indonesian crisis, these valuation difficulties were compounded in at least two ways. First, as nonperforming loans were restructured, there were no clear standards as to what would be the minimum revised payments profile that would allow the bank to declare a loan to be once again performing. Additionally, legal uncertainties over banks' ability to seize collateral made it unclear as to what extent collateral should be recognized in assessments of banks' financial condition. Together these issues had a substantial impact complicating the triage of the banks by the authorities.

# E. Concluding Remarks

At end-1999, most of the critical elements that could protect the core banking system and facilitate the revival of intermediation were in place. Also, the political transition to a newly-elected president seemed completed with inauguration of the new government in December 1999. However, substantial work to complete the restructuring of the banking system was required, and many opportunities for slippage or reversals remained. The new government faced a daunting agenda. On BI's side, a comprehensive program aimed at strengthening the capacity to supervise banks had been drawn up and was set for implementation. The key remaining objectives in bank restructuring include the achievement of an 8 percent capital adequacy ratio and sustainable profitability by all banks; the eventual replacement of the comprehensive deposit guarantee scheme with a self-financed deposit insurance; completion of the restructuring and subsequent privatization of the state banks, and of the banks taken over by IBRA; raising governance and supervision of banks to world standards; deepening bond and equity markets; and accelerating of corporate restructuring by the implementation of a functional corporate restructuring framework.

It is too early to come to definitive conclusions about some aspects of the handling of the Indonesian banking crisis. Indeed, because one can never know the counterfactual of what would have happened had alternative policies been adopted, some issues can never be fully resolved. However, some lessons can be learned. Among these are:

 Initial actions to address a banking crisis will need to be undertaken amidst considerable uncertainty as to the true condition of the banking sector; a high priority has to be to reduce that uncertainty as quickly as possible; in the meantime, close attention must be paid to guiding, monitoring, and responding to, public relations as the true situation is unfolded.

- A blanket guarantee is an indispensable instrument while a systemic banking crisis is resolved; however, the authorities are literally "buying time," and the more time that has to be bought, the more expensive the overall process will be. The huge cost of the resolution of the banking crisis in Indonesia derives in substantial part from the protracted delays in implementing measures right from the beginning of the crisis. These delays seem to have become increasingly more pronounced the longer the crisis continued; the prospects for quick, forceful, aggressive, and irreversible actions are likely to be best in the early stages of addressing the crisis, arguing for a comprehensive, ambitious, and fast-acting plan as close to the onset of the crisis as possible.
- A centralized approach to bank restructuring, establishing a single agency responsible for holding banks taken over, and managing the assets acquired during the restructuring, may well be the least problematic route when there are issues of governance and shortage of skills; however, the success of such an agency can be separated to only a limited extent from the overall environment within which it will operate. High levels of transparency and governance provide the agency with its best protection. Concomitant early action, including on the requisite legal reforms, will be an integral element to ensure that the agency operates effectively.
- The role of the state banks in a banking crisis needs careful watching. Such banks may appear stronger than they really are in that their precarious solvency situation may be disguised by an absence of liquidity problems as depositors seek a flight to safety. In Indonesia the recapitalization of the state banks (and of the banks taken over in the early stages of the crisis) is likely to be the most expensive element of the restructuring, due not only to the initial weaknesses of these banks but also to the policies of these banks during the crisis—in particular, their lethargy in collecting loans or raising loan rates while being aggressive in raising depositor rates. A "too-big-to-fail" policy as regards the state banks has major moral hazard effects and has to be accompanied by very close monitoring of—and, if necessary, interventions in—the operations of the banks if it is not to prove extremely expensive.
- The structure of interest rates—both between banks in the interbank markets, and
  between deposit and lending rates of the banks—provides critical information
  throughout a banking crisis, on the markets' perceptions of the relative strength of the
  banks, bank managements' response to the crisis, and prospective costs of resolving
  the crisis.

Transparency is indispensable throughout in the handling of a banking crisis, first to generate public trust in what the authorities are seeking to achieve, second to generate public support for the resolution strategy and gain public assistance in the implementation of the

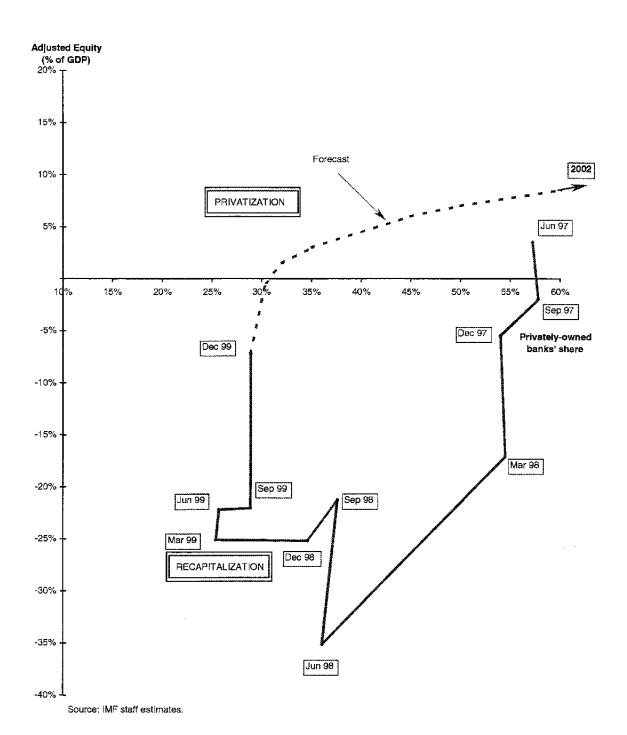
strategy (for instance, as regards noncooperating debtors and noncooperating owners of failed banks), and third to ensure that actions taken by the authorities are irreversible. Nontransparencies (such as the intervention into the 54 banks by IBRA in February 1998, the holding company structure of the shareholder settlements of later that year, or the procedures for making interbank payments under the blanket guarantee) are likely to prove costly, both directly and in undermining confidence in the restructuring strategy overall.

Looking to the future, the authorities need to retain, or regain, a comprehensive vision for further stages of the restructuring program. Ad hoc measures to deal with problem banks in the early 1990s, together with absence of strong supervision and enforcement of banking sector regulations, provided the seeds for the recent crisis. The endless delays in taking necessary remedial measures have added substantially to the cost of the crisis. With vast amounts of public money put into the banking sector, it is critical that there be no recurrence of systemic banking sector problems. While banks have to be able to operate profitably, they must be properly supervised. The full implementation of BI's master plan for supervision is therefore an urgent priority. Proper handling of any further emerging governance issues—through full disclosure and prompt remedial measures—will also be critical.

With the state now having 70 percent of the banking sector, the privatization program will be a central element of the management of the banking sector. An illustrative scenario from the program is shown in Figure 8. Results from this program may determine the nature of Indonesia's banking system for a long time to come, and represent an opportunity for the system to be fully integrated into the world economy.

Inevitably the strategy for handling the banking sector has evolved significantly over time from the initial efforts made on the basis of limited information during the period of deep crisis, although the broad strategy set out in late-January 1998 has remained largely in place. Reversals and delays over the two years of this study added substantially to the cost of the restructuring, but by the end of the period covered by this study, and once the recapitalizations are completed, the foundations for a strong banking sector to support the growth of the Indonesian economy should have been put in place. The coming years will determine whether the potential for a renewal of rapid growth on the back of a strong financial sector—the core purpose of the entire restructuring program—is indeed achieved.

Figure 8. Overview of the Evolution of the Banking System



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20.7% 5/

# **Steps in Bank Resolution**

The following table summarizes the interventions in the banking sector since the beginning of the crisis, with references to some of the steps detailed thereafter:

Closures Taken Over by IBRA Date Number of Number of Market share Market share Banks (liabilities) Banks (liabilities) Step 2 - Nov. 1, 1997 2.5% 16 Step 3 - April 4, 1998 7 0.4% 6 7.9% Step 4 - May 29, 1998 1 12.0% 3 1/ Step 5 - Aug. 21, 1998 4.8% 8 2/ Step 7 - March 13, 1999 38 5.5% 4.3% Step 8 - Spring 1999 0.3% 1 4/ December 1999 1.3% 13 5/

Table 2. Indonesia: Summary of Bank Interventions

Total

13.5%

66

The Indonesian banking sector may be divided into three groups of banks: (a) publicly owned banks, including the state banks, the regional development banks which each belong to one of the provincial governments, and the banks taken over by IBRA; (b) private domestic banks, with or without a foreign exchange license, including also the banks jointly recapitalized; and (c) foreign controlled banks, including branches of foreign banks and joint-venture banks. The data below reflect the banks' positions as declared.

Step 1. As of end-June 1997, before the crisis, the main features of the Indonesian banking were as follows:

June 1997	Publicly Owned	Private Domestic	Foreign controlled	All Banks
Number of banks	34	160	44	238
Assets - Amount (% of GDP)	39.2%	45.8%	7.7%	92.7%
Market share (%)	42.3%	49.4%	8.3%	100%
Liabilities – Amount (% of GDP)	36.7%	42.1%	6.9%	85.7%
Market share (%)	42.8%	49.2%	8.0%	100%
Equity – Amount (% of GDP)	2.5%	3.7%	0.8%	7.0%
Assets/Liabilities ratio	107.0%	108.8%	112.5%	108.3%

<sup>&</sup>lt;sup>17</sup> These three banks were part of the six taken over by IBRA on April 4, 1998

<sup>&</sup>lt;sup>2</sup>/ Including Bank Niaga which had qualified for joint recapitalization, but whose owners declined to participate

<sup>&</sup>lt;sup>3</sup>/ Two joint-venture banks that the foreign partners declined to recapitalize as needed

<sup>&</sup>lt;sup>4</sup>/ Bank Bali, taken over by IBRA following Standard Chartered's withdrawal from its management contract

<sup>&</sup>lt;sup>5</sup>/ After subtraction of the three banks taken over by IBRA on April 4, 1998, and subsequently closed on August 21, 1998.

The banking sector was well developed, with both a large number of banks and sizeable assets, representing 93 percent of GDP. Publicly owned banks had a large, but not dominant, market share (42 percent). As declared, the system appeared fairly well capitalized, with a leverage capital ratio (assets without risk weighing as compared with liabilities) of 108.3 percent.

**Step 2**. As part of the commitments included in the October 31, 1997, Letter of Intent, 50 banks identified as insolvent or weak were subjected by BI to specific resolution measures, including the closure of 16 private domestic banks:

	Number of bank	s Share of assets (.	Share of assets (June 1997)	
Private domestic banks	42	24.4 %		
<ul> <li>closed (5 forex and 11 nonforex)</li> </ul>	16		2.5 %	
<ul> <li>other resolution measures</li> <li>(13 forex and 12 nonforex)</li> </ul>	26		21.9 %	
Publicly-owned domestic banks	8	10.0 %		
<ul> <li>State-owned banks</li> </ul>	2		9.6 %	
<ul> <li>Regional Development banks</li> </ul>	6		0.4 %	
Total	50	34.4 %		
Banking system (before the 16 closures)	238	100.0 %		

By the end of 1997, after the 16 closures, the banking system appeared as follows:

December 1997	Publicly Owned	Private Domestic	Foreign controlled	All Banks
Number of banks	34	144	44	222
Assets – Amount (% of GDP)	47.9%	46.0%	11.8%	105.7%
Market share (%)	45.3%	43.5%	11.2%	100%
Liabilities – Amount (% of GDP)	45.3%	42.2%	10.9%	98.4%
Market share (%)	46.0%	42.9%	11.1%	100%
Equity – Amount (% of GDP)	2.6%	3.8%	0.9%	7.3%
Assets/Liabilities ratio	105.8%	109.1%	108.2%	107.5%

The private domestic banks had lost a sizeable market share, reflected in gains to both the publicly-owned and the foreign-controlled banks.

**Steps 3-**A and 3-B. On April 4, 1998, the authorities took action against the 14 that had the greatest borrowings from BI; all had been placed under IBRA's surveillance since February.

First, with regard to the seven largest borrowers of emergency liquidity support from BI, which had borrowed more than Rp 2 trillion each and accounted together for over 75 percent of the total BI liquidity support to the banking system, IBRA took full control through suspending shareholders rights and (except for the one state bank involved) changing the management:

Name	Category	Share of liabilities (June 1997)
Bank Umum National (BUN)	Forex	1.1 %
Bank Dagang Nasional Indonesia (BDNI)	Forex	3.4 %
Bank Modern	Forex	0.3 %
Bank Danamon	Forex	2.2 %
Bank Tiara Asia	Forex	0.5 %
PDFCI	Joint Venture	0.4 %
Bank Ekspor Impor Indonesia (EXIM)	State	7.7 %
Total:		15.6 %

These seven banks are generally referred to as the first group of banks taken over by IBRA, or "BTO1" banks.

Second, with regard to seven small banks in a particularly critical condition, which had borrowed from BI more than 500 percent of their equity and 75 percent of their assets, the following banks were "frozen"—equivalent to closure—and their deposits transferred to a designated state bank:

Name	Category	Share of liabilities (June 1997)
Bank Surya	Forex	0.15 %
Bank Pelita	Forex	0.11 %
Bank Subentra	Forex	0.08 %
Bank Hokindo	Nonforex	0.01 %
Bank Istismarat	Nonforex	0.02 %
Deka Bank	Nonforex	0.01 %
Centris International Bank	Nonforex	0.02 %
Total:		0.40 %

As a result, the total number of active banks in Indonesia was reduced from 222 to 215, including 7 under full IBRA control.

**Step 4.** On May 29, following relentless runs which led BI to provide it with Rp 30 trillion of liquidity support, Bank Central Asia (BCA), the largest domestic private bank (12.0 percent of the liabilities of the banking sector), was taken over by IBRA, the owners' rights were suspended and the management replaced. BCA became the eighth "BTO" bank.

Around the same period, four private domestic banks (one forex and three nonforex) were merged with other banks, thus reducing the number of active banks to 211.

June 1998		Publicly	Private	Foreign All
	Owned	Domestic	controlled	Banks
Number of banks	41	127	43	211
Assets – Amount (% of GDP)	102.7%	36.0%	22.1%	160.8%
Market share (%)	63.9%	22.4%	13.7%	100%
Liabilities – Amount (% of GDP)	98.2%	34.0%	21.4%	153.6%
Market share (%)	64.0%	22.1%	13.9%	100%
Equity – Amount (% of GDP)	4.5%	2.0%	0.7%	7.2%
Assets/Liabilities ratio	104.6%	106.1%	103.3%	104.8%

These developments changed the nature of the banking system, which had become almost two-third state controlled. Banks were still claiming to be solvent, with a net equity of some 7 percent of GDP, unchanged since the beginning of the crisis. However, some estimates concluded that by that time, the banking system as a whole was insolvent (shortage of assets as compared with liabilities) by more than 25 percent of GDP. The huge increase in assets and liabilities as compared with GDP is the result of the depreciation of the rupiah.

**Step 5.** On August 21, 1998, based on the results of portfolio reviews, the authorities announced that three of the banks taken over by IBRA on April 4 (step 3-A), namely Bank Umum Nasional (BUN), Bank Dagang Nasional Indonesia (BDNI) and Bank Modern would be "frozen", and their deposits transferred to a designated state bank. The situation of the 208 banks still open as of end-September 1998 was as follows:

September 1998	Publicly	Private	Foreign	All
	Owned	Domestic	controlled	Banks
Number of banks	38	127	43	208
Assets – Amount (% of GDP)	63.7%	27.6%	13.0%	104.3%
Market share (%)	61.1%	26.5%	12.4%	100%
Liabilities – Amount (% of GDP)	64.2%	26.3%	12.4%	102.9%
Market share (%)	62.5%	25.5%	12.0%	100%
Equity Amount (% of GDP)	(0.5%)	1.3%	0.6%	1.4%
Assets/Liabilities ratio	99.1%	105.1%	104.6%	101.3%

The state banks had begun to book their losses, appearing slightly insolvent.

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**Step 6.** On October 2, 1998, Bank Mandiri was established in anticipation of its subsequent merger with four state banks (BBD, BAPINDO, BDN, and EXIM). By the end of 1998, the banking system looked as follows:

December 1998	Publicly Owned	Private Domestic	Foreign controlled	All Banks
Number of banks	39	127	43	209
Assets – Amount (% of GDP)	55.0%	22.8%	9.9%	87.7%
Market share (%)	62.7%	26.0%	11.3%	100%
Liabilities – Amount (% of GDP)	63.8%	24.0%	9.8%	97.6%
Market share (%)	65.4%	24.6%	10.0%	100%
Equity – Amount (% of GDP)	(8.8%)	(1.2%)	0.1%	(9.9%)
Assets/Liabilities ratio	86.2%	95.0%	101.0%	89.9%

All categories of banks were booking their losses. The booked losses reached 12 percent of GDP (9.9 percent in the table above plus 2 percent of GDP in the form of recapitalization bonds issued to Bank Exim).

**Step 7.** On March 13, 1999, 38 banks were closed and 8 others taken over by IBRA (BTO2 banks), reducing the total number of banks to 171 and increasing to 47 the number of those controlled by the state:

March 1999		Publicly	Private	Foreign All
	Owned	Domestic	controlled	Banks
Number of banks	47	82	42	171
Assets – Amount (% of GDP)	48.4%	13.3%	10.0%	71.7%
Market share (%)	67.6%	18.5%	13.9%	100%
Liabilities – Amount (% of GDP)	70.3%	14.1%	9.8%	94.2%
Market share (%)	74.6%	15.0%	10.4%	100%
Equity - Amount (% of GDP)	(21.9%)	(0.8%)	0.2%	(22.5%)
Assets/Liabilities ratio	68.9%	94.2%	101.6%	76.1%

The market share of the publicly controlled banks reached its peak, at almost 75 percent in terms of liabilities. Most of the losses were booked by the banks, while the government had begun issuing recapitalization bonds.

**Step 8.** During the spring of 1999, 2 joint-venture banks were closed, reducing the number of active banks to 169:

June 1999	Publicly	Private	Foreign	All
	Owned	Domestic	controlled	Banks
Number of banks	48	81	40	169
Assets – Amount (% of GDP)	40.5%	13.9%	7.9%	62.3%
Market share (%)	65.0%	22.3%	12.7%	100%
Liabilities – Amount (% of GDP)	60.2%	13.2%	7.6%	81.0%
Market share (%)	74.3%	16.3%	9.4%	100%
Equity - Amount (% of GDP)	(19.7%)	0.7%	0.3%	(18.7%)
Assets/Liabilities ratio	67.3%	105.1%	104.3%	76.9%

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The joint-recapitalization program for eligible private banks was implemented, while a number of joint-venture banks were also recapitalized by their foreign partners.

**Step 9.** On July 31, 1999, Bank Mandiri merged with four state banks (Bumi Daya, BAPINDO, BDN and EXIM). The total number of active banks was thus reduced to 165:

September 1999	Publicly Owned	Private Domestic	Foreign controlled	All Banks
Number of banks	44	81	40	165
Assets – Amount (% of GDP)	35.9%	15.3%	10.0%	61.2%
Market share (%)	58.6%	25.0%	16.4%	100%
Liabilities – Amount (% of GDP)	59.2%	14,5%	9.6%	83.3%
Market share (%)	71.1%	17.4%	11.5%	100%
Equity – Amount (% of GDP)	(23.3%)	0.8%	0.4%	(22.1%)
Assets/Liabilities ratio	60.6%	105.4%	104.9%	73.5%

In October and December 1999, Bank Mandiri received two tranches of government capitalization bonds for a total of Rp 178 trillion, equivalent to 14.6 percent of GDP.

Figure 8 (in Chapter V) provides a graphic overview of the evolution of the banking system, indicating the phases of the banking crisis:

- first, the banking system falls into insolvency, and the line in the figure drops deep below the solvency level;
- second, a large part of the system has to be taken over by the government, and the line shifts to the left;

- third, banks are recapitalized through government bonds, and the line begins to rise. With the completion of the recapitalization, the line will rise above the solvency level;
- fourth, as the banks are privatized, the line goes to the right part of the figure.

# **Banking Sector Assessment Framework**

## Initial estimates of bank insolvency

The banking crisis began in the fall of 1997 and became systemic by the end of the year. In January 1998, with the collapse of the rupiah, the country was facing an immediate risk of financial meltdown that led the authorities to declare a blanket guarantee on all bank liabilities and to set up IBRA.

None of these dramatic developments were apparent in the banks' financial statements. On the contrary, the banks were booking growing profits and featuring increased equity positions. When BI was unable to come up with any adjusted figures providing a more realistic picture of the banks' actual position, the Monetary and Exchange Affairs Department (MAE) of the IMF offered, during March 1998, to help design an assessment framework and prepare its own estimates. The MAE framework was structured with a view to setting up a routine to update such assessment on a monthly basis.

#### The need for an assessment framework

As the country was falling ever deeper into a systemic banking crisis, there was a critical need to obtain reasonably reliable data, regularly updated, on the financial condition of the banking system.

Indonesia is an immense country, with a large diversified banking system, and BI's supervisory arm reflects this situation. It is a heavy, complex machinery, employing some 700 staff. Enormous quantities of data are gathered monthly throughout the archipelago and processed to produce a wealth of supervisory information, including a well-developed CAMEL-type bank rating. Every month the Banking Supervision Department (BSD) issues a booklet providing detailed data on the banking system as a whole and on each category of banks, summarizing their accounts and their compliance with every prudential regulation.

However, neither the monthly banking information booklet, nor any other available document could provide the information needed to appropriately monitor the financial condition of the banking sector and its evolution. Several factors contributed to this state of affairs:

- The data collection process favors monetary policy over prudential supervision. The system is set up to quickly obtain data relevant for monetary policy purposes. More detailed, or differently distributed, data catering for the specific needs of supervisors are available only at a substantially later stage.
- The system is naturally based on the analysis of banks' data as reported. However, as financial distress deepened, the gap between banks' reported and real condition had widened, and the relevance of analyzing banks' reports as declared was fast diminishing, and had all but disappeared by early 1998.

- The Indonesian banking supervisory system was heavy on data, but light on analysis. At the central level, the monthly banking information booklet provided numerous figures and some ratios, but no qualitative analysis nor comments; a global, analytical and qualitative picture of the system's condition was already missing before the crisis. At the operational level, most of the supervisory teams focused mainly on data gathering, administration of formal compliance with regulations, and on-site inspections of their banks, at the expense of the actual prudential analysis of financial data.
- In addition, by early 1998 the supervisors had been overworked and under heavy
  pressures of all kinds for a number of months, so that their already limited analytical
  work had almost totally stopped, precisely at a time when such work was of critical
  importance.
- Also, insufficient attention was paid to flows, as compared with stocks, in whatever financial analysis was performed. Clearly, the comparison of amounts (stocks) of each type of assets and liabilities as part of a standard approach to financial analysis was not enough, under the then-prevailing crisis conditions, when huge and sudden shifts of financial flows were frequent. A more detailed type of analysis was required, with a particular focus on flows (sources and uses) of funds, split by currency as well as by type of transaction.

Since most of these issues could not be addressed in the short term and BI had proved unable to set up a temporary simplified procedure to address the pressing need for data, it was agreed to design and test a stop-gap assessment framework.

## Design of the banking sector assessment framework

The framework (developed by IMF staff) had to be simple, immediately operational, relying only on existing and readily available data, and easy to update on a monthly basis, while providing a reasonably accurate picture of the financial condition of the banking sector. It was meant to be used for assessing both individual banks and the system as a whole, both for explaining past evolutions and projecting future developments. It was seen as a temporary complement, not a substitute, to the existing banking supervisory routines.

The framework relied on the existing monthly summary data provided by each of the 222 banks. After adjustments to these data, it provided adjusted financial statements, ratios, and analytical tables with a special focus on the flows of funds, and a series of graphs illustrating the results.

The focal point of the framework was the set of adjustments carried out on the data as declared by the banks. A first group of adjustments was made to correct all technical inaccuracies—some of them quite sizeable—and questionable accounting practices that the staff had had the opportunity to detect. The common factor linking this first group of

adjustments was their objective nature, requiring little, if any, judgment, and thus leaving limited room for discussion.

The second group was adjustments of substance, relying heavily on judgmental assumptions. These were inevitably fragile, reflecting the staff's views at a given point of time and based on the prevailing level of information. Two main adjustments were made. First, the quality of the loan portfolio: on the basis of the staff's previous experience with the banking sector in Indonesia and of discussions held by BI supervisory staff, it was assumed that the nonperforming loans as of the end of June 1997 were under reported by one-third, and that their proportion increased as the rupiah depreciated by 50 percent of the rate of depreciation for loans denominated in rupiah, and by 150 percent for loans denominated in foreign currencies. Second, since some major banks had hidden their foreign exchange losses among their miscellaneous assets in late 1997, it was assumed that any sudden increase of such assets in other banks at the same period also reflected similar hidden losses.

# Testing of the assessment framework

To prepare the assessment of the overall condition of the banking sector, retrace the path of its evolution, and try to fine tune the assumptions made, the assessment framework was—in late March 1998—tested on the banking system as a whole, for each month from June 1997 until January 1998.

The framework indicated that, as of June 1997, the banking system was already seriously undercapitalized, with a ratio of assets to liabilities (a simplified proxy to capital adequacy) of only 104.1 percent and expected losses of 8.3 percent of the gross loans. Thus, even before the crisis, the banking system's financial structure was already shaky. The framework identified three phases in the process of deterioration of the financial condition of the Indonesian banking system up to end-January 1998: a silent phase beginning with the depreciation of the rupiah in July 1997 and lasting until end-November, followed by an open, acute phase in December 1997, and an explosive phase during January 1998, when the domestic currency value of the dollar more than doubled.

## Silent phase: July to November 1997

During the five months of this period, the rate of the dollar expressed in rupiah increased by 49 percent, from 2,450 to 3,648 rupiah per U.S. dollar. The repayment capability of banks' borrowers was severely impacted, directly for those with loans denominated in foreign currencies and no dollar earnings and, indirectly, through a change in the country's macroeconomic prospects, for those with loans in rupiah.

However, banks' loan classification and provisioning was not adapted to take into account the impact of the rupiah's depreciation. On the contrary, as posted in their accounts, banks expected lower loan losses in November (4.92 percent of gross outstanding amounts) than in June 1997 (5.52 percent). As a result, they reduced their provisions by Rp 1.1 trillion, while the staff estimates indicated that these provisions should had been increased by

Rp 10.4 trillion. This created a significant gap between banks' reported and real financial condition.

The second main deterioration factor over this period was a growing shortage of resources resulting from customers' loss of confidence. The banking system was weakened by losses of rupiah deposits (Rp 5.4 trillion or 2.2 percent). Although these losses seem limited, they marked a sharp contrast with the previous trend: rupiah deposits grew by 27 percent in 1995, and 32 percent in 1996. Meanwhile, foreign exchange deposit growth slowed almost to a stop (plus Rp 0.9 trillion or 1.1 percent), again a sharp change from earlier growth (23 percent in 1995 and 20 percent in 1996).

Banks reacted by slowing their lending, which prior to the crisis was growing at a pace commensurate with that of the deposits, but not sufficiently: during this five-month period, loans increased by Rp 14.7 trillion (5.3 percent) in rupiah and by Rp 4.6 trillion (5.2 percent) in foreign currencies, i.e., by a total of Rp 19.3 trillion. The loans to deposits ratio rose sharply, from 113.1 percent to 119.2 percent, indicating a loss of self-sufficiency and a growing need for additional resources.

A large fraction of the additional financing need of Rp 23.8 trillion for loans and deposits was covered by BI, which provided net new (and costly) resources of Rp 17.4 trillion, and thus became a net supplier of funds to the banks by Rp 11.2 trillion instead of being a net user of their resources by Rp 6.2 trillion. To meet their liquidity shortage, banks also sold securities by a net Rp 2.1 trillion. According to the banks' figures, the balance of needed resources came mainly from their own funds, which increased by Rp 4.3 trillion: Rp 3.0 trillion of additional paid-in capital and Rp 1.3 trillion from profits. Most of the booked profits, namely Rp 1.1 trillion, came from the above-mentioned reduction in the stock of provisions for nonperforming loans. The staff's tentative interpretation was that, with the needed additional provisions of Rp 10.4 trillion, and some other minor adjustments, the posted profit was fictitious and the banks in fact lost Rp 10.3 trillion. Taking into account the additional capital for Rp 3.0 trillion, the banks' equity was reduced by Rp 7.3 trillion.

The framework also determined the destination of BI funding during this first period: according to the banks, almost all of this funding (98.6 percent) was used as liquidity support, whereas the framework concluded that 81.6 percent was effectively for liquidity support, but that the balance of 18.4 percent was used for solvency support, i.e., to absorb losses.

These hidden losses also brought about a complete change of perspective on the outlook for the banking system. On the basis of the end-November 1997 foreign exchange rate level, far from being profitable as posted, the banking system as a whole was facing massive losses and stood only months away from insolvency.

Nevertheless, their absence of provisioning allowed most banks to issue financial statements as of the end of November 1997 that presented a situation that looked largely

under control. As a whole, the banking system pretended to be still profitable, and even demonstrated an ability to raise new capital. It continued its normal lending activities. The obvious weak spot, namely the loss of deposits, was concentrated in a limited number of banks and financed without apparent difficulties through BI's liquidity support. This support looked still manageable as it represented only 6.2 percent of banks' total liabilities. There were no obvious sign of system-wide financial distress. This first period of the banking crisis could thus be called the silent deterioration phase.

# Open, acute phase: December 1997

During December 1997, the rate of the dollar expressed in rupiah increased by a further 27.5 percent, from 3,648 to 4,650, bringing the total increase for the second half of the year to around 90 percent. This represented a second major blow to the banks and their borrowers. However, not only was this additional deterioration of repayment capacity again not taken into account for loan classification and provisioning purposes, but the declared amount of loans classified as nonperforming was reduced, and so were the corresponding provisions, by Rp 2.8 trillion. The tentative conclusion was that the banks had resorted to this move because they were desperate to improve their year-end reported financial position. This was in itself a sign that the deterioration had reached such a stage that it was becoming increasingly difficult to hide and that the banking crisis was reaching an open, acute phase.

The framework-induced estimates were that provisions for nonperforming loans should have increased by Rp 4.0 trillion instead of decreasing by Rp 2.8 trillion, a difference of Rp 6.8 trillion reflected in the banks' profits and equity, and resulting in a further widening between the published accounts and the financial reality.

Regardless of these estimates, the most obvious sign of banking distress was the increase of BI funding to banks by Rp 27.7 trillion (Rp 38.9 trillion from Rp 11.2 trillion) during that period. This support had become so large that BI worried that the publication of banks' year-end financial statements could trigger a panic. BI designed a specific—and highly disputable—accounting procedure to hide a large part of its emergency support, instructing banks to net out a large fraction (Rp 29.7 trillion) of it with their loan portfolio.

At the same time, there was a major shift in the destination of the central bank's support. The figures indicate that transactions with customers, i.e., loans and deposits, hardly generated any financing need during December: only Rp 0.9 trillion. Globally, the increase in loans of Rp 6.3 trillion was almost entirely covered by an increase in deposits of Rp 5.4 trillion. In rupiah, there was a financing need of Rp 4.9 trillion, resulting from an increase of Rp 15.1 trillion in loans (plus 5.1 percent) compared with the increase in deposits of Rp 10.2 trillion (plus 4.3 percent). On the other side, foreign currency denominated loans and deposits generated net resources of Rp 4.0 trillion, as loans were reduced by Rp 8.8 trillion (6.4 percent) while deposits decreased by only Rp 4.8 trillion (8.2 percent). Interbank operations generated a need of Rp 4.7 trillion, most of it in foreign currencies, resulting both from the repayment of previous borrowing and from additional new

placements. On the other side, further net sales of securities again provided net resources of Rp 1.1 trillion.

Thus the question arose of the destination of the Rp 27.7 trillion provided by the central bank during December 1997. According to the banks, most of these resources—together with an increase in equity—went into the miscellaneous assets, which required net additional funding of Rp 26.5 trillion during December. According to the framework estimates, however, the banks lost Rp 18.4 trillion in December, when foreign exchange losses were added to the need for provisioning loan losses, and the banking system as a whole fell slightly below the positive net worth line, with adjusted assets representing 99 percent of the liabilities. Therefore, as indicated in the assessment framework, most of BI funding during December 1997 was solvency, not liquidity support, i.e., financed losses. Solvency support was estimated to have been 72.7 percent of BI funding according to the framework.

Another important consequence of the growing gap between the banks' reported condition and financial reality related to the net open position (NOP). According to the banks' reports, their NOP as of the end of December was long by Rp 10.4 trillion. According to the framework, since significant amounts of items denominated in foreign currencies and considered as assets by the banks were worthless (in particular the fraction of loans which could not be repaid and the foreign exchange losses booked as miscellaneous assets), the real position was short by Rp 9.3 trillion as of the end of December 1997.

## Explosive phase: January 1998

During January 1998, not only were the previous episodes of severe currency depreciation not reversed, but the rupiah's fall resumed at a catastrophic pace, with the rate of the dollar expressed in rupiah rising by a multiple 2.23, from 3,648 to 10,375 by the end of January, bringing the total increase since June 1997 to a factor of 4.23. The resulting additional, and even stronger, shock on the banks and their borrowers was of cataclysmic proportions, with the banking system falling into deep, system-wide insolvency.

Again, the banks' reported figures failed to show the impact on their loan portfolio. Expected loan losses rose to 4.35 percent, a small increase as compared with the 4.19 percent December 1997 level, but still lower than at any other time over the previous several years, and totally out of line with reality.

The banks' predicament was as simple as it was hopeless at the end-January exchange rate: the massive depreciation of the rupiah had left them with foreign currency denominated loans and deposits estimated to be more than four times their July 1997 levels. But, while the deposits represented a certain liability and were being repaid at more than four times their previous rupiah amount, a high proportion of the loans had become irrecoverable because their repayment was far beyond the financial capacity of the borrowers. This massive gap between the real economic value of banks' assets and liabilities had wrecked the banking system's financial structure.

The framework-induced estimates, based on the assumptions mentioned above, led to the conclusion that at the end-January exchange rate level around 18 percent of the rupiah loans and 40 percent of the foreign exchange denominated loans would not be repaid. And these were moderate estimates: for foreign exchange denominated loans, a 40 percent average loss meant that for each loan of an amount of 100 extended in June 1997 or before, now worth 423 in rupiah equivalent, 60 percent—or an amount of 254 on average—would be eventually repaid. Clearly, more pessimistic assumptions might well have been justified.

On the basis of these estimates, additional provisions for nonperforming loans of Rp 110.2 trillion were needed for January alone, generating equivalent losses. For comparison purposes, for January the banks themselves reported a need for loan loss provisions of only Rp 1.7 trillion. The question of the destination of the massive (Rp 27.0 trillion) additional support from BI extended during January 1998 arose again. According to the banks' reports, this BI support provided, as in December, for the increase in miscellaneous assets (the bulk consisting of the accounts where foreign exchange "differences" are booked by the banks). According to the framework based estimates, on the other hand, the banks accumulated total losses of Rp 133.2 trillion on the loan portfolio and on foreign exchange positions and transactions, and BI funding was absorbed to fund part of these losses.

Furthermore, the banks themselves reported that they had a long position of Rp 10.4 trillion as of end-December 1997, and on this basis, they booked a foreign exchange gain of Rp 12.8 trillion in January 1998. As of end-January, the banks declared a net long open position of Rp 43.1 trillion, whereas the framework indicated that the real position was short in the order of Rp 86.8 trillion, thus generating substantial additional losses as the rupiah continued to depreciate.

In conclusion, whereas, as of end-January 1998, the banks posted a positive equity of Rp 47.4 trillion, the assessment framework concluded that their equity was negative by Rp 151.3 trillion. Such a degree of insolvency of the banking system is self-accelerating: the wide gap between liabilities and assets creates a sizeable funding need, the cost of which increases with the level of interest rates, generating additional losses which in turn deepen the degree of insolvency. At a time when banks were still pretending to be long in foreign currency, profitable and solvent, the assessment framework assisted in determining that they were actually so deeply insolvent that a deadly spiral of mounting losses had already come into play.

### Subsequent use of the assessment framework

This framework was subsequently expanded considerably by a Fund resident expert. Fund staff had to continue to rely on it until late 1999.

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