

**CENTRAL BANK REGULATION AND COPING WITH THE ASIAN FINANCIAL CRISIS:
LESSONS FROM THE BANK OF THAILAND[?]**

by

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1. Introduction

Founded on 10th December 1942, the Bank of Thailand (BoT) became Thailand's central bank and was thus entrusted with a broad range of traditional functions: to issue currency; to safeguard the value of money; to promote monetary stability and a sound financial structure; to promote economic growth; to act as the bankers' bank and provide lender of last resort facilities; and to act as banker and financial adviser to the Government.¹ During most of its history, the BoT played an important role in promoting the development of financial institutions and markets in Thailand. However, following the Asian financial crisis which broke out in 1997, the BoT became vulnerable as Thailand started to experience a severe economic crisis. The crisis derailed all ongoing financial reforms and directly crippled the banking sector, the stock exchange and the foreign exchange market (McKinnon and Pill, 1998). Regarding the banking sector, the major problems associated with the crisis included: failure of financial institutions; insufficient bank liquidity and inadequate capital; high non-performing loans; and loss of momentum in rebuilding confidence among international investors, depositors and economic development organizations, potentially limiting future capital flows into Thailand. In this context, it is interesting to examine how a traditional central bank, like the BoT, is able to cope with a financial crisis of a magnitude far beyond its stipulated role.

This paper examines the role played by the BoT in trying to cope with the financial crisis that hit Thailand in the summer of 1997. The emphasis is on the banking sector rather than the financial markets, but within the broader context of financial reforms and central bank regulation.

In what follows, the paper is structured into six sections. Section 2 describes financial liberalisation attempts and consequences in Thailand, especially with respect to interest rate and exchange rate liberalisation. Section 3 focuses on extensions of the scope of banking and financial institution operations. The financial sector masterplan, that was conceived before the financial crisis, is discussed in Section 4.

¹ These responsibilities are stipulated in the Bank of Thailand Act B.E. 2485 (1942).

Section 5 examines the 1997 financial crisis and its impact on financial reforms. Restructuring and regulatory reform after the crisis are discussed in Section 6. Section 7 concludes.

2. Financial Liberalisation

2.1 The Re-regulation of Commercial Banking

Commercial banks dominate the financial system in Thailand, with a 73% share of both household savings and credits extended by all financial institutions. Local commercial banks and branches of foreign banks are governed by the Commercial Banking Act of 1962 together with the amendments made in 1979, 1985 and 1992. The first two amendments were designed to improve and revise the 1962 Act in order to make it more efficient and suitable to changing circumstances so that public interest could be protected. The main aim of the 1992 amendment was to introduce the capital adequacy standards of the Basle Committee (Lauridsen, 1998).

Prior to the 1962 Act, foreign banks were allowed to open sub-branches; however, after 1962, the banks were not allowed to extend sub-branches in the Thai Kingdom. In addition, BoT became very restrictive in terms of granting licences to new local banks. Hence, domestic banks and branches of foreign banks remained low in number; for example, by the end of December 1993, only 15 local banks and 13 branches of foreign banks were operating in the Kingdom.

The major shareholders of domestic commercial banks mostly belonged to a group of families. For example, Bangkok Bank, the largest bank in the country with a market share of 21%, belonged to the Sophonpanich family. The third largest bank with a market share of 13%, the Thai Farmers Bank, belonged to the Lumsum family. The Bank of Ayuthaya, the fifth largest bank with a market share of 8%, belonged to the Ruthanaruk family. There was only one state-owned bank, the Krung Thai Bank, which was the second largest bank in the Kingdom and held a market share of 15%. The fourth largest bank, the Siam Commercial

Bank, had a market share of 9%; it was owned by the crown property. Family-owned banks were generally managed by a group of family members and mainly extended loans to the businesses of their executives and related persons. However, by 1979 commercial banks had gradually become public companies, although the family group still remained the major shareholders of banks indirectly. By 1994, the local commercial banks had expanded branches to the whole Kingdom with a network of 1,709 branches in 1983 to 2,838 branches in 1994, operating 2,320 ATMs throughout the country (Bank of Thailand, 1999).

Table 1: Bills, Loans and Overdrafts of Commercial Banks, Classified by Sector

Sector	Year	Share	Year	Share
	1994	%	1998	%
1. Agriculture	152.3	4	146.6	3
2. Mining	15.7	1	32.2	1
3. Manufacturing	836.2	24	1,606.3	30
4. Construction	142.0	4	264.8	5
5. Real estate business	364.2	11	506.1	10
6. Imports	115.7	3	192.5	4
7. Exports	166.5	5	174.0	3
8. Wholesale and retail trade	672.7	18	867.5	16
9. Public Utilities	86.3	2	189.7	4
10. Other financial business	245.2	7	263.4	5
11. Services	268.4	8	418.6	8
12. Personal consumption	437.5	13	595.0	11
13. Others	-	-	-	-
14. Total	3,457.7	100	5,238.7	100

Source: Bank of Thailand Annual Report, 1999.

Note: Loan values are in billions of Baht; shares are in sectoral percentages of the total.

It is useful to compare the scenario in 1994 with that in 1998. While, at the end of 1994, Thai commercial banks held a market share in deposits of 98%, by 1998 the figure was 96%. The market share for creditors was 88% in 1994 but had fallen to 85% by 1998; the branches of foreign banks however increased their market share from 12% by 1994 to 15% by 1998, as the confidence in local banks fell. In general, as shown in Table 1, commercial banks lending for personal consumption fell; there was also a decline in lending to real estate business, exports, agriculture, other financial services and wholesale and retail trade. However, the share of total lending to manufacturing, construction, imports, and public utilities increased in 1998 compared to the 1994 base level.² Moreover, in 1998 commercial banks introduced electronic banking by providing deposit and withdrawal services through an on-line system to branches in almost all provinces, with over 2,320 ATMs in two pools namely, BANKNET and SIAMNET; these were used to provide out-of-hours deposit and withdrawal nationwide. Swift, used for the transfer of funds among banks throughout the world, was introduced in 1985.

2.2 Reforming the Exchange Rate System

The main reform of the Thai exchange rate system can be traced back to immediately after World War II when, due to economic difficulties and a serious shortage of foreign exchange, Thailand was forced to adopt a multiple exchange rate system. However, in 1963 the economic situation improved and the exchange rate regime was switched to a par value system such that the value of the Baht was fixed in terms of gold. In order to maintain the Baht parity, the Exchange Equalisation Fund (EEF) was established with the aim of stabilising

² Possibly, the increase in bank lending to some sectors by 1998 compared to 1994 reported in Table 1 may be explained by the fact that the general lending practices of Thai banks were not primarily focused on collateral, such as land and premises, but on the feasibility study. If the business plan for the project was well prepared, the amount of the loan granted would be much higher than the value of the collateral.

exchange rate movements within prescribed margins. The successful operation of the EEF enabled full parity of the Baht to be maintained for 15 years or so.

However, in 1978 the volatility of major world currencies forced the BoT to adjust the exchange rate, and the par value system was abolished. A system of pegging the Baht to a basket of major currencies (in which the US dollar weight was 0.85) was introduced. The new system allowed greater flexibility in exchange rate adjustments to reflect more accurately economic and monetary conditions. It also facilitated the stability of the Baht since the currency was no longer tied to any particular currencies. The system operated smoothly until 1981 when signs of trouble began to emerge due to the strong appreciation of the US dollar relative to other currencies. The Baht depreciated rapidly, and although the government devalued the currency twice in mid-1981, public confidence could not be restored. However, in July 1981, a decision on the daily fixing was made, and the EEF fixed the exchange rate of the US dollar at 23 Baht. This rate was held fixed until 1984 when the government announced a replacement of the dollar-pegging system by pegging the baht to a basket of currencies.

But it was not until 21 May 1990 that the BoT took the most important step in the process of exchange rate deregulation by accepting the obligations under Article VIII of the Articles of Agreement of the International Monetary Fund (IMF), and implementing the first phase of exchange control relaxation. The aim was to liberalise the foreign exchange system in line with the globalisation of the economic and financial systems, and allow freedom of international capital movements. Specifically, exchange rate deregulation was implemented in three main phases. Phase I of the exchange control deregulation began on 21 May 1990 by allowing commercial banks to process customers' applications for the purchase of foreign currency for trade-related transactions, i.e., imports and exports without prior approval from the BoT.³ Phase II of the exchange

³The central bank also raised the limit on foreign exchange purchase for travelling expenses overseas to 20,000 US dollars per trip. Commercial banks were also allowed to approve outward transfers of foreign exchange in small amounts not exceeding 50,000 US dollars, for the remittance of loans, the sale of securities, and the liquidation of companies.

rate deregulation began on 1 April 1991 by allowing greater flexibility to private businesses and the general public in the purchase or sale of foreign exchange. All exchange controls were abolished and new forms were introduced for reporting purposes only. A limit of US\$10 million was allowed for an annual investment for one person and for the acquisition of real estate and stocks overseas. Foreign funds, on the other hand, were allowed to move in and out of the country freely. Phase III began on 30 April 1992 to further provide more convenience for the public, and exporters in particular. Exporters were allowed to receive and make payment in Baht in addition to foreign currencies, and to transfer foreign currency deposits for overseas debt payment.⁴

Of all the financial liberalisation measures, the development of offshore banking facilities, known as the Bangkok International Banking Facilities (BIBFs), was the most important for developing Bangkok as a regional financial centre. BIBFs were introduced in 1993 when the BoT perceived that the Thai financial system should be developed as a regional financial centre, given its stable economic conditions, liberal exchange rates and interest rates, as well as high international borrowing transactions. The BoT proposed the establishment of BIBFs in order to facilitate and reduce the cost of international borrowing, while encouraging foreign capital inflows to finance domestic investment as well as investment throughout the Indo-Chinese region. Initially, 46 BIBF licenses were granted. Licensed banks could use foreign funds raised overseas to lend to their domestic customers (known as “out-in” operations), or to overseas customers (known as “out-out” operations). Apart from out-in and out-out operations, which were considered to be the core businesses, BIBFs were also allowed to provide other international banking services, such as cross-currency trading, trade financing on strictly an out-out operational basis, loan syndication arrangements, arranging the issue of debt instruments, and engaging in underwriting in foreign currencies.

⁶ In addition, on 2 February 1994, further relaxation of the exchange control increased convenience for outward transfer of foreign exchange and Baht currency for foreign investments, and lending to subsidiaries, with limits being raised from US\$ 5 million to US\$ 10 million; the repayment of foreign debt was also permitted.

Capital flows responded in stylized fashion (Fry and Murinde, 1998). After the floatation of the Baht currency in July 1997, net capital outflows peaked in the third quarter of 1997 and the Baht currency kept on depreciating against the US dollar until it reached Baht55 per US dollar in January 1998. It then stabilized at around Baht36-40 per US dollar from the fourth quarter of 1998 onward. Although short-term nominal interest rates climbed to more than 20% during the crisis, low confidence and exchange rate uncertainties led to huge capital outflows through non-renewal and repayment of short-term loans towards the end of 1997 through to 1998. The net outflows of private capital at the end of 1997 accounted for US\$8.4 billion and continued to increase to more than US\$16.0 billions in 1998. The banking sector, including the BIBFs, shouldered the biggest impact of the financial crisis. The commercial banks recorded a net outflow of US\$4.7 billion in 1997, but the net outflow dropped in 1998 to US\$4.3 billion. The BIBFs followed with net outflows of US\$1.7 billion in 1997, peaking in 1998 at US\$9.6 billion. Table 2 reports the private financial net flow position in Thailand during 1994-1998.

Table 2 **Net Private Financial Flows into Thailand (billions of US\$)**

	1994	1995	1996	1997	1998
1. Banks	13.9	11.2	5.0	-6.4	13.9
1.1 Commercial banks	3.8	3.1	0.4	-4.7	-4.3
1.2 BIBF	10.1	8.1	4.6	-1.7	-9.6
2. Non-Banks	-1.9	9.6	13.2	-1.9	-2.0
2.1 Direct investment	0.9	1.2	1.5	3.2	4.7
2.2 Other loans	-5.6	1.5	5.5	-3.7	-4.3
2.3 Portfolio investment	1.1	3.3	3.5	4.5	0.5
2.4 Non-resident Baht A/C	2.0	3.4	2.9	-5.9	-2.7
2.5 Trade Credits	0.5	0.3	-0.1	-0.2	-0.5

2.6 Others	-0.6	-0.1	0.02	0.3	0.02
Net Private Capital Inflow	12.0	20.8	18.2	-8.4	-16.0

Source: Bank of Thailand Annual Report, 1999.

By the end of 1999, the surging volume of foreign exchange activities and derivatives trading made it necessary to strengthen prudential supervision in this area. The BoT imposed net foreign exchange position limits and provided guidelines to reinforce existing internal control procedures and practices widely utilised by commercial banks in monitoring and controlling their foreign exchange activities. In 1999, the required ratio for commercial banks was limited within the range of 15% of the net overbought (asset) position to 15% for the net oversold (liability) position.

Financial liberalization through the BIBF considerably increased short-term debts since most of the credits were on a short-term basis and continually rolled over for long-term use. The deterioration of investor confidence and deceleration of economic growth made foreign creditors unwilling to roll over BIBF credits. The volatile exchange rates motivated borrowers to repay loans, resulting in high net capital outflows throughout the second half of 1997 and 1998.

2.3 Interest Rate Liberalisation

As Lensink, Hermes and Murinde (1998) have shown, interest rate liberalisation is the key policy instrument used by many developing countries that wish to embark on financial liberalisation. In Thailand, the liberalisation of interest rates was conceived and implemented as a three-year plan (1990 – 1993) aimed at enabling the banking system to adjust to changing demand and supply, both domestically and externally. With continuous economic expansion since 1987, there was apparent need to mobilise long-term and stable funds for national development. When it was evident that long-term deposits had not expanded in line with borrowing needs, the BoT deemed it appropriate to lift the ceiling rate on term deposits exceeding one-year maturity from the previous ceiling of 9.5 percent to 10.5-11.0 percent per annum in June 1989 in order to

accelerate the process of savings mobilisation. The gradual process of deregulation was aimed at allowing time for financial institutions and the public to make the necessary adjustments without major disruption.

With regard to the ceilings on other types of deposits, the BoT continued the interest rate liberalisation policy. Ceilings on deposits for all maturity periods were abolished on 16 March 1990. On 8 January 1992, the BoT announced the removal of the ceiling on savings deposit rates. In June 1992, the BoT fixed the ceiling rate on promissory notes issued by finance companies and *credit fonciers*⁷. Competition for deposit mobilisation in the form of attractive offer rates followed as a result of the liberalisation process. This factor increased pressure for the ceiling on lending rates to be freely determined according to the prevailing liquidity positions while also minimising adverse impacts on borrowers. After 1992, interest rates followed a downward trend and the timing was right to remove the lending rate ceilings for commercial banks, finance companies and *credit foncier* companies.

The lifting of the lending rate ceiling became effective on 1 June 1992, allowing domestic interest rates to fully adjust in accordance with demand and supply conditions. From January 1993, the BoT began to implement measures to encourage commercial banks to reduce their lending rates for general customers in response to changes in the cost of deposits. It managed to do so by requesting cooperation from commercial banks and cutting the Bank Rate twice, in June and September. As a result, commercial banks responded by reducing both their deposit rates and their lending rates and thus, narrowing the differential between the lending rate for general customers and the one - year time deposit rate to 6.75 percent in September 1993. However, the BoT did not wish to lead or intervene in the operation of commercial banks every time, but wanted to establish an adjustment mechanism for the lending rate for retail customers to automatically adjust to the actual cost of funds, as determined by the market mechanism. The BoT and the Thai Bankers' Association set up a working group to study and determine the benchmark for the lending rate for retail customers. Finally, the working group agreed to introduce the Minimum Retail Rate (MRR) as a reference

lending rate for retail customers.⁵ The commercial banks and branches of the foreign banks began to announce the MRR from the end of October, and the MRR was adopted by all banks in mid-November 1993. During the month when the MRR became effective, the interest margin between the lending rate for retail customers and the one-year deposit rate rose to 7.5 percent, as commercial banks cut the deposit rate by more than the lending rate. Nevertheless, since the profit margin for retail customers was set at not more than 2 percent, banks were forced to adjust by lowering the rates on both loans and deposits. Moreover, the lending at lower interest rates by the BIBF in the domestic market enhanced the stiff competition among banks and enabled borrowers to acquire cheaper loans.

Table 3 Movements in Interest Rates and Exchange Rates during the Reform Period

Year	Interbank interest rate (%)	Exchange rate (Baht per US \$)
1994	6.41	24.99
1995	10.17	25.12
1996Q1	7.30	25.23
1996Q2	7.24	25.28
1996Q3	11.41	25.30
1996Q4	10.97	25.46
1997Q1	11.31	25.84
1997Q2	11.99	25.87
1997Q3	19.32	32.95
1997Q4	20.15	40.71
1998Q1	20.64	47.11

⁵ The calculation of MRR is based on the total cost of deposits, operational cost, and profit margin of 2%. Every category of lending rate to retail customers must be related to the MRR, and commercial banks have to quote a lending rate for retail customers not exceeding MRR.

1998Q2	18.03	40.33
1998Q3	9.52	41.06
1998Q4	3.84	36.05

Source: IMF (2000) *International Financial Statistics*. Washington DC: IMF
(Thailand, country pages).

In May 1997 the MLR (minimum loan rate) and MRR (minimum retail rate) were allowed to move freely according to the market mechanism in order to help stimulate the economy. The BoT asked the commercial banks to set the MLR limit in line with market conditions and the MRR, as well as the cost of funds, to reflect the risk differentials between the wholesale and retail customers. However, as the competition among financial institutions increased and customers were offered higher rates on both deposits and loans, difficulties arose in liquidity management because of the high cost of funds to the banks. In June-July 1997, the BoT temporarily limited the ceiling on time deposit to 12-14% to reduce the high lending and deposit rates in order to maintain stability in the financial system.

Interest rates started to go up by late 1996, when the weakness in economic indicators, especially in the current account deficit, began to appear (see Table 3). The BoT was forced to maintain high interest rates to help support the Baht currency, and to raise funds to bail out ailing finance companies through the Financial Institutions Development Fund (FIDF). The policy continued until the floatation of the Baht in July 1997. Thailand then sought assistance from the IMF and had to follow the advice that high interest rates were necessary to help reverse the outflow of capital and stabilize the currency. As shown in Table 3, the interbank rate peaked in the third quarter of 1997 through the second quarter of 1998 at between 18-20%, and began to fall to only 3.8 % at the end of the fourth quarter of 1998. The interbank rate bottomed out at around 1-2% at the end of 1999.

Nevertheless, in July 1998, when the economy started to cool down, the BoT allowed commercial banks to adjust interest rates more freely by using the reference rate.⁶ Interest payable on saving deposits was made subject to the reference rate plus not more than a 2% mark up, while time deposits of over 3 months were made subject to the reference rate plus not more than a 3% mark up. All the rates had to be disclosed, and the new rules applied to the Head office and all branches. In addition, the central bank issued new long-term government bonds to refinance the liabilities of the FIDF. This helped to support the downward trend of short-term money market rates. Market liquidity improved markedly throughout 1999, allowing market interest rates to decline further. Deposit interest rates peaked at 14-15% in 1998, but fell from 6-7% in early 1999 to 3-4 % at the end of 1999 (Vatikiotis and Keener, 1999).

3. Extensions of the Scope of Banking and Financial Institution Operations

3.1 Encouraging Banks to Open Branches or Participate in Joint-Ventures Abroad

In order to support Bangkok as the financial centre in the region, the BoT allowed the commercial banks to open branches in Laos, Kampuchea, Vietnam, Burma, as well as mainland China. These branches could provide banking services not only to the local community, but also to Thai investors or foreign investors who use Thailand as a gateway or springboard to the region. Also, they would gather or collect prime information or data for new investors in Thailand.

On the other hand, in regions where branches are not permitted or where it was quite risky to open them due to the unfamiliar economic systems or the differences in language, joint-ventures in banking businesses were encouraged to facilitate entry. In addition, local commercial banks were also allowed to open branches or set up wholly-owned subsidiaries in financial centres such as Singapore and the Cayman Islands. These could be used to tap cheap funds for their BIBF offices in Bangkok. This could enable the Thai BIBF offices to compete efficiently with foreign BIBFs.

⁶ This is an average of interest payable on the deposits of the five biggest banks.

3.2 Relaxation of Constraints on Financial Institution Portfolio Management

Since 1970, financial institutions have been required to contribute to rural development and overall development of the economy. Commercial banks, including branches of foreign banks, were required to fulfill the agricultural credit target, and branch opening requirements were imposed on domestic banks. Rural branches of domestic banks were required to extend at least 60% of their deposits as credit to local people, and of this amount not less than 20% must be lent to the agricultural sector. However, from 1990 the structure and economic environment of the country has changed tremendously. Consequently, the BoT deemed it appropriate to diminish its role of intervening in the decision-making process of financial institutions. In retrospect, the intervention policy could be perceived as unfair to the financial institutions concerned as well as to customers and other economic sectors.

During the 1990-1993 three-year plan, the BoT streamlined and eliminated certain requirements imposed on financial institutions while retaining only those needed to maintain the stability and solvency of the financial system. This was intended to provide greater flexibility in the management of financial institutions and thereby to reduce their costs of operation, increase the quality of their assets and engender greater competition.

3.3 Streamlining the Rural Credit Policy

In the past, the BoT set targets for commercial banks, including the branches of foreign banks, to allocate credits in proportion to total deposits for agricultural enterprises. In 1987, however, a new definition and a new set of ratios were imposed on the so-called "Rural Credit" policy. After 1987, the structure of the country's agricultural production shifted towards small-scale industries and the services sector. To give commercial banks greater flexibility in asset management and in responding to the Government's policy to support regional small-scale industries, the BoT modified the rural credit policy to cover a wider scope of

activities than the narrowly defined agricultural activities. Moreover, in January 1991, the BoT broadened the coverage of rural credits to include credits for wholesale trading of agricultural produce and regional industrial estates. In 1992, the definition was further broadened to include credits for the secondary occupation of farmers, and the export of farm products.

3.4 The Change in the Computation of Reserve Requirements

With effect from 23 June 1991, the BoT relaxed the constraints on commercial banks' portfolio management by replacing the reserve requirement ratio with the liquidity ratio.⁷ This provided greater flexibility in relation to investment options and asset management. It should be noted, however, that since the BoT had not made full use of the reserve ratio as an instrument of monetary policy (as distinct from prudential control), the change, in effect, had no significant monetary policy implication.

3.5 Widening the Scope of Operation of Financial Institutions

In the 1990's, the BoT formulated policies to permit financial institutions to broaden their range of activities and to fully utilise their resources and expertise. Consumers of financial services stand to benefit from the greater variety of financial services as well as greater competition among financial institutions. Under existing conditions, where financial institutions compete on the basis of deposit as well as lending rates, the margin between the lending and deposit rates has narrowed from about 6% in 1990 to 4% in 1994, while the cost for administration is not less than 2%. Financial institutions, therefore, had to seek revenue from fee-based income. Hence, broadening the scope of operation of financial institutions will benefit both the public and the financial institutions themselves. Nevertheless, the policy to broaden the scope of operation of financial institutions was undertaken in gradual steps, with due regard being paid to the efficiency and readiness as well as available expertise of financial institutions. The solvency and stability of the financial system, along with

⁷ The liquidity ratio allows commercial banks to substitute other securities for government securities, namely BoT's bonds, and bonds issued by Governmental organizations and state enterprises.

improved procedures for supervision and examination, will also be taken into account, along with customer protection.

With regard to widening the scope of banking business, it is useful to note that financial institutions' supervision in Thailand had always placed great emphasis on prudential control. Commercial banks were therefore not permitted to engage in businesses that were considered highly risky, or in those that required specialised skills. However, the financial liberalisation policy increased competition among commercial banks. The new environment forced commercial banks to change their business perspectives and to seek fee-based income to boost their profits. From 1987, the BoT deemed it necessary to allow commercial banks to conduct business related to banking business. Moreover, in 1992, commercial banks were permitted to jointly establish mutual funds management companies with local finance companies and foreign analysts with expertise in managing mutual funds. In the period 1992-1998 they were allowed to conduct more businesses: for example, to act as agents to sell the government's and state enterprises' debt instruments such as bonds, debenture and commercial papers; to provide economic, financial and investment information services; to provide financial and advisory services; arranging, selling and trading debt instruments; to act as agents for secured and unsecured debenture holders; to act as trustees to mutual funds, securities registrars and as selling agents of unit trusts; to purchase and sell certificates of deposit; to receive orders to purchase or sell unit trusts to be delivered to the security companies or finance and security companies; allowing foreign branches of domestic banks to manage mutual funds for investment or international development; to manage provident funds and personal funds, to act as agents for collecting loans; to manage the project for securitization to be submitted to the Security Exchange Commission; and to purchase or transfer loan debtors. In addition, in June 1999, the BoT granted permission for commercial banks to act as agents to operate securities borrowing and lending business. Furthermore, in 1999, as a result

of debt restructuring, the commercial banks were allowed to engage in the hire purchase and leasing business for a trial period of 3 years.

In terms of widening the scope of financial conglomerates, it should be noted that, in the past, banks' holding in other companies was strictly limited to 10% of the companies' shares sold. Thai commercial banks have, for various reasons, found it necessary to set up subsidiaries or affiliates to perform non-banking businesses. This has led some banks to shield their stake in the form of holding companies or nominees. In May 1994, the BoT recognised the need for transparency and consolidated supervision and announced that banks could seek the approval to hold shares exceeding the 10% limit in the following cases. A commercial bank was allowed to hold an aggregate share value of up to 20% of its first tier capital. Once the BoT relaxed the 10% limit on holding shares as well, so as to allow banks wider business opportunities, it became necessary to review this limitation. The BoT therefore allowed banks to hold an aggregate share value of up to 20% of their total capital (instead of tier one capital). In addition, after the financial crisis of 1997, the proportion of non-performing loans in the financial system grew as a result of the economic deterioration and more stringent regulation on the classification of loans (Doukas, Murinde and Wihlborg, 1998). Debt restructuring helped contain the problem. As a result of debt restructuring, in November 1998, the BoT permitted financial institutions to hold shares exceeding 10% of shares sold and 20% of the aggregate share value on the condition that they reduce the shareholding to the legal limit within 3 years.

4. The Financial System Master Plan (1995-2000)

4.1 The Background

The aim of the Financial System Master Plan was to guide the development of the financial system, facilitate policy coordination, and support the national economic development plans. The plan was set to run for 5 years, from 1 March 1995 - 29 February 2000. It was divided into 2 phases. Phase I, which included short-

term plans, covered the period from March 1995 to February 1997. Phase II covered the medium and long-term plan up to 2000.

The content of the Financial System Master Plan covered 7 major areas.

~~///~~ The first area was the expansion in the scope of operation of financial institutions in order to operate business in line with international best practice and to strengthen their competitiveness.

~~///~~ The second area was the improvement of financial system structure. The aim was to ensure proper functioning of the money market as well as the capital market, in order to support the mobilisation of savings, fund allocation and economic growth.

~~///~~ The third area related to enhancing competition and financial liberalisation. The idea was to end oligopolistic practices and encourage competition in the financial system, paving the way for adhering to Thailand's agreed commitments under the GATS.

~~///~~ The fourth area included measures to support the government's provincial and rural development policy. Specialised financial institutions (SFIs) were to set up a Rural Development Fund to finance projects in the rural areas, particularly for infrastructure and educational projects.

~~///~~ The fifth area was the improvement of the efficiency of supervision of financial institutions, both in terms of regulatory guidelines and techniques of supervision, in tandem with the process of financial liberalisation and administrative expediency.

~~///~~ The sixth area related to human resource development and promotion of business ethics in the financial industry.

~~///~~ Finally, in order to transform Thailand into a regional financial centre, efforts were made to promote the BIBFs. However, the BIBFs later became the major contributors to the 1997 crisis.

4.2 Facilitation of New Entry (BIBFs and PIPFs)

4.2.1 Licensing of the BIBFs

BIBFs were the most important for developing Bangkok as a regional financial center and thus enjoyed some tax concessions. For example, there were both reductions in tax rates and exemptions to help promote BIBFs. Corporate income tax was reduced from 30% to 10 % and stamp duties were exempted. Though BIBFs were required to maintain capital funds of not less than 100 baht million, they were free to maintain the funds in any form of assets. Also, they were subject to setting provisions of not less than 0.25% of outstanding loans, and were required to maintain the liquidity ratio on short-term borrowings of less than 1 year at not less than 6%. However, they were allowed greater flexibility in their operations. The BoT relaxed all prudential regulations for commercial banks (including the branches of foreign banks), such as the capital adequacy ratio, and the single lending limit. The relaxation was consistent with a view that BIBFs were supervised by the authorities of the country where the parent banks of BIBFs were located. In the early stages, the BIBFs' main operations consisted of out-in corporate finance. This indeed helped to alleviate the negative investment-savings gap, which stood at 7% of GDP during the rapid growth of the economy.

Table 4 Credit Granted by BIBFs
(including Thai Banks, Foreign Branches and New BIBFs) (billion Baht)

	1996	1997	1998	Nov.99
Thai banks	330.2	513.2	211.9	108.4
Foreign branches	222.7	691.5	431.9	328.0
<u>New BIBFs</u>	<u>254.5</u>	<u>206.9</u>	<u>121.7</u>	<u>90.7</u>
<u>out-in</u>	<u>807.4</u>	<u>1,411.6</u>	<u>765.5</u>	<u>527.1</u>
Thai banks	16.3	35.4	28.9	21.7
Foreign branches	9.4	264.3	89.2	38.8
<u>New BIBF s</u>	<u>456.6</u>	<u>171.1</u>	<u>30.4</u>	<u>12.4</u>
<u>out-out</u>	<u>482.3</u>	<u>470.8</u>	<u>148.5</u>	<u>72.9</u>
<u>Total</u>	<u>1,289.7</u>	<u>1,882.4</u>	<u>914.0</u>	<u>600.0</u>

Source: Bank of Thailand Annual Report, 1999

At the end of November 1994, total BIBF loans outstanding stood at 481.8 billion Baht (approximately US\$ 19.3 billion), about 14.5% of total loans including commercial banks. Out of that amount, 417.5 billion Baht (or about 86.6 percent) was in out-in activities. The BIBFs of local banks accounted for 39.6 percent, followed by 20.5 percent of the BIBFs of foreign banks' branch, and 39.9 percent of BIBFs previously without branches in Thailand. Among other businesses, the cross currency business was the most active, followed by the loan arrangement business. At the of end 1996, BIBF lending amounted to 1,289 billion Baht, an increase of 80% from the previous year. Out-out lending demonstrated a substantial increase from 165 billion Baht in 1995 to 482 billion Baht in 1996, while out-in lending increased moderately from 541 billion Baht in 1995 to 807 billion Baht in 1996, accounting for 17% of overall domestic credits. After the financial crisis in 1997, the out-in lending slowed down and tended to decline due to the cessation of lending to local borrowers (see Table 4).

As of 1998, the overall lending of BIBFs had fallen dramatically from 1,289 billion baht in 1996 to 914.0 billion baht and it further decreased to 600.0 billion baht by the end of November 1999. Out-out lending dropped sharply from 482.3 billion baht in 1996 to only 72.9 billion baht (a decrease of 85%). Out-in lending also declined to a large extent, from 807.4 billion baht to only 527.1 billion baht (a decrease of 35%), over the same period.

The financial crisis in 1997 was caused, in part, by the operation of BIBFs and could be attributed to the moral hazard induced by the fixed exchange rate system, in the sense that domestic borrowers did not find it necessary to hedge against foreign exchange risk (Abdalla and Murinde, 1997). In addition, the BIBFs were not restricted from lending to domestic borrowers in dollars. Thus, "out-in" lending exposure grew very fast from 456.3 billion baht in 1994 to 1.4 trillion in 1997, much of it in dollars. Shackled by the bad debts

and with the economy moving into mild recession, banks sought to consolidate their balance sheets, restrict new lending and shore up their capital bases. The deepening economic recession caused the asset quality of all financial institutions to deteriorate further. Sharp declines in credit quality and falling earnings negatively impacted upon the efforts of all financial institutions to recapitalize. Given that most of the lending exposure of financial institutions in Thailand was collateral based, the banking system was badly exposed to the risk of asset price deflation.

5. The 1997 Financial Crisis and its Impact on Financial Reforms

There is plenty of literature on the causes and symptoms of the Asian financial crisis in general, and the experience of Thailand in particular; see for example, McKinnon and Pill (1998). Specifically, the poor supervision of commercial banks and finance companies by the BoT is widely seen as a key reason for the Thai economy's rapid collapse after the baht was floated in July 1997 (Vatikiotis, 1999), along with the aforementioned build up of private international debt through the BIBFs. When the property and stock price boom were in full swing, financial institutions did not spend resources on valuing the underlying collateral because they believed that the gains would be substantial should the need for foreclosure arise.

Moreover, in 1998 the BoT tightened the asset classification and provisioning rules, aiming to further strengthen financial supervision and bring supervisory regulations in line with the international standards. The classification criteria would include on and off-balance sheet items and would adopt "3 months past due loans" as the definition for non-performing loans (Doukas, Murinde and Wihlborg, 1998). The provisioning requirement was made such that banks had to set aside provisions of at least 20% in each accounting period, and fully maintain these provisions by 2000. Recognition of accrued interest income was shortened from 12 months to conform with the new definition of non-performing loans. To facilitate the foreign inflow of funds for recapitalization, the restriction on foreign ownership in Thai financial institutions was relaxed, thereby allowing

foreign entities to acquire up to 100% ownership for 10 years, after which they would be “grandfathered” with respect to the absolute amount of their equity holding.

The economic downturn, together with the stringent regulations, made things even worse for the banking system. Heavy losses directly affected the ability to extend credits. Most financial institutions had to recapitalize to cover the increasing amount of non-performing loans. In connection with this, four banks which were financially vulnerable and could not recapitalize by their own, had to be nationalized; while the banks’ management was replaced, and the existing shareholders’ equity written off, to preserve the integrity of the financial system.

In solving the problem of non-performing loans in the financial system, which were continuously rising to an average of over 40% at the end of 1998 due to the new loan classification system and the further economic downturn, new regulations for debt restructuring and collateral appraisal were issued as guidelines for banks. As part of an attempt to monitor the non-performing loans in the system more carefully, financial institutions were ordered to conduct qualitative reviews of their portfolios, both on and off-balance sheet, and to submit a summary of the results to the BOT on a quarterly basis. In order to assist banks to recapitalize, on 14 August 1998 the BoT offered an assistance scheme for financial institutions which could not find partners for recapitalization. If financial institutions could comply with the new loan provisioning rules immediately, they would have the right to apply for assistance from the BOT to recapitalize their Tier 1 capital. Moreover, financial institutions were allowed to apply for assistance in recapitalizing Tier 2, if they undertook debt restructuring.

Apart from this, at the end 1998, privately-owned Asset Management Corporations (AMCs), which were set up by financial institutions solely or jointly with investors, were allowed to segregate their non-performing loans. The Thai Farmer Bank led the way by setting up its own AMC, followed by Siam Commercial bank.

6. Restructuring and Regulatory Reform

6.1 New Institutions Formed to Cope with the Post 1997 Financial Crisis

6.1.1 The Asset Management Corporation (AMC)

The Asset Management Corporation was established in October 22, 1997 in accordance with the Emergency Degree on Asset Management Corporations B.E. 2540. The corporation was established to take over and manage all the assets of the 56 closed finance companies leftover from the Financial Restructuring Authority auctions or from Property Loan Management Organisation, as well as to purchase or receive non-performing assets from the Financial Institutions Development Fund. In order to help improve the quality of loans, it could also lend to debtors to enable them to continue in business. Initially, the capital fund of Baht1,000 million came from the Ministry of Finance, and it was given permission by the cabinet to issue bonds worth Baht 12,000 million to finance the purchase of assets from the FRA.

In March 1999, the AMC purchased assets from the FRA with a principal outstanding value of Baht185 billion for Baht31.2 billion, which was a steep discount. The AMC issued promissory notes of 5 years maturity in exchange for the assets purchased from the FRA. The AMC had a limited number of options in managing the assets, including debt restructuring and debt to equity conversion. It had to follow prescribed steps in order to help liquidate the assets purchased. First, it focused on debt-restructuring deals of about Baht 5-10 billion with real estate developers. Secondly, it sold non-core assets such as vehicles, yachts and resort houses. Thirdly, it sold factories, developed land plots, and assets which could produce cash as soon as possible. Then it sold low-demand assets. For all the sales, the AMC made sure that all assets were sold to buyers on condition that the debtors could buy them back later. Lastly, the AMC calculated the value of non-collateralised assets in order to estimate the proportion of loans which would be converted to equity, rescheduled or written off.

Until about 2004, the AMC will manage the debts, given that some of the promissory notes mature by that date. Therefore, the AMC needs all the debtors to repay loans by 2004. In some cases, debtors need to issue debentures to cover payment to the AMC, which can then sell the debentures.

6.1.2 The Private Asset Management Companies (PAMCs)

The Emergency Decree on Asset Management Companies B.E. 2541 allowed a limited company that wished to register as a PAMC to apply for registration as an asset management company. The scope of business of PAMCs focused on the purchasing of the non-performing assets from financial institution and related businesses; this was limited to no more than either the outstanding debt in contracts or the appraised value of collateral, whichever value was lower. In order to rehabilitate the debtors, PAMCs were allowed to engage in any related businesses, such as lending, collecting interest and fees, securitization, restructuring, holding shares, debt for equity swaps, renting and leasing, as well as property development, or other businesses approved by the BoT. The sources of funds came from borrowing locally or abroad and the issuance of securities, including shares and debentures as well as debt instruments. The rationale behind the issuance of the Emergency Decree was that financial institutions had a lot of low quality assets that obstructed their recapitalisation and also had an adverse affect on their ability to lend. Full economic recovery was impossible unless non-performing loans were reduced and financial institutions were able to resume lending. So it was deemed appropriate to separate low quality assets for sale or transfer to other legal entities. This allowed banks to manage non-performing loans more effectively and press borrowers to restructure credits. In order to attract the establishment of such legal entities, in October 1999 the cabinet deemed it appropriate to give waivers on transfer fees arising from debt restructuring and on specific business taxes levied on interest revenues gained from bank lending to management companies. In 1999, the Thai Farmers Bank started to operate a PAMC called the Thonburi AMC, and this was followed by the Jatujak AMC of Siam Commercial Bank.

The implication of the above experience is that the BoT has to enforce strict regulatory rules and monitor the PAMCs to ensure that their operations and the asset transfers are conducted in line with the regulatory standards. In cases where the commercial banks directly or indirectly hold shares in PAMCs of more than 50%, the commercial banks have to draft consolidated balance sheets, and the assets transferred have to be sold by 2010.

6.1.3 The Radanasin Bank

The Radanasin bank was established under the Commercial Banking Act B.E. 2505, as amended by the Commercial Banking Act. (No. 3) B.E. 2535 on February 23, 1998. The initial registered capital of 4,000 million baht was fully paid by the Ministry of Finance. It was raised finally to 12,500 million baht at the end of December 1998. The Radanasin bank was mandated to purchase the good assets of 56 closed finance companies from FRA. As well as managing the good assets from the closed finance companies, it could also lend to debtors to enable them to continue their businesses. However, because the Radanasin bank had very limited resources, its main objective was not fulfilled.

In order to efficiently manage and rearrange shareholdings in financial institutions, on March 16, 1999, the cabinet approved the sale of the ordinary shares of Radanasin bank, held by the Ministry of Finance, to the Financial Institutions Development Fund. The transfer took place on July 26, 1999. Furthermore, on October 6 1999, the United Overseas Bank of Singapore made a 75% acquisition of Radanasin Bank. Some 43 billion baht worth of non-performing loans were transferred to an AMC in exchange for bonds guaranteed by the FIDF. The AMC was set up by the FIDF and managed under a loss or profit sharing agreement by United Overseas Bank. Losses of the asset management company would be borne 85% by the FIDF and 15% by UOB; while gains would be shared 95% by the FIDF and 5% by UOB. UOB, in return, would receive a management fee equal to 0.1% of the non-performing loans.

As of March, 1999, the total assets of the new entity accounted for about 61,000 million baht, mainly

comprising of credit extensions; while the liabilities mainly consisted of deposits and capital funds (of 19.8 billion baht).

6.1.4 The Secondary Mortgage Finance Corporation (SMC)

The Secondary Mortgage Finance Corporation was established on June 27 1997 in accordance with the Emergency Decree on the Secondary Mortgage Finance Corporation B.E. 2540 and the Emergency Decree on the Specific Purpose Juristic Person for Securitisation B.E. 2540. The rationale behind the establishment of the SMC was that it was deemed necessary to rectify the problems of real estate businesses in the country, which was in a sluggish stage, by expanding credits on housing. This was considered as one of the measures for the rehabilitation of the national economy as a whole.

The securitisation business was an important financial process which could be implemented to rectify the shortage of both short and long-term capital of businesses. It also helped create a new, highly-stable financial instrument, which could facilitate the development of the country's capital market and the mobilisation of savings. It was therefore expedient to establish a government agency for the development of the secondary market for housing loans by using the securitisation technique to raise funds to accommodate the expansion of demand for housing credit..

The SMC received an initial fund of 1,000 million baht as capital funds from the BoT on February 2, 1998. The major source of funds, however, came from its issuance of bonds, approved by the Ministry of Finance in early 1999, in exchange for the mortgage loans from financial institutions. The mortgage loans were securitised by the issuance of securities to be sold to investors, the returns on which depend on the inflows arising from the assets. By the end of September 1998, the total assets of the SMC amounted to about 1,100 million bath, mainly cash and deposits, with only 300 million baht of credit extension while the liabilities consisted mainly of equity.

6.1.5 The FIDF and the Deposit Insurance Authority

At the time when the crisis broke out, there was no formal deposit insurance scheme in Thailand. However, the FIDF was established under the Bank of Thailand Act B.E. 2485, as amended by the Royal Decree B.E. 2528, which took effect on the 27th of November 1981. The Fund was set up as a separate legal entity managed by the BoT. The rationale behind the establishment of the FIDF was that financial crises had occurred several times in the past 30 years, including the RAJA finance company which was in crisis in 1979 and the 4th April 1984 life boat scheme which was launched to save many banks. All these past crises had created deposit runs in the financial system and public confidence had to be restored. Thus the establishment of the FIDF was a combined effort of the private sector and the government and was created within the BoT to rehabilitate the financial institutions as well as to develop the financial system and restore solvency and stability.

The initial capital of 1,500 million baht came from the BoT, with further annual contributions to help cope with the financial crisis. The Fund was empowered to collect annual insurance fees from financial institutions not exceeding 0.5% of total deposits and borrowings. Initially, it began to collect fees of 0.1% but, in 1998, it was raised to 0.2 % to compensate for the higher risk in the financial system. In addition, the government was responsible for the loss incurred by the Fund since the Fund operated in accordance with government policy. In addition, the BoT was, from time to time, allocating to the Fund any suitable amount from its reserves.

The FIDF sold four nationalised banks. The first sale, on September 10, 1999, of Nakornthon Bank (which is wholly owned by FIDF) to Standard Chartered Bank, was worth 12.38 billion baht (75% of equity) was a major success in privatising the nationalised bank. Furthermore, on October 6, 1999, the United Overseas Bank of Singapore sealed a 75% acquisition of Radanasin Bank for 15.089 billion baht, equivalent to a price of 14.4 Baht per share. There were two more nationalised banks which were privatized

under the scheme, Siam City Bank and Bangkok Metropolitan Bank.

Since the FIDF had to issue a general letter of guarantee to all depositors and creditors in order to restore public confidence in the financial system in 1997, the burden directly impacted on the government, which was responsible for the loss by the FIDF. Therefore, the BoT Act was amended to reaffirm the government's commitment to underwrite the FIDF guarantees for depositors and creditors.

In the context of the above, the FIDF has played a complementary role to the traditional role of financial stability played by the BoT. Specifically, the FIDF has been instrumental in revitalising ailing financial institutions throughout the economic crisis such that the burden of supporting financial restructuring has fallen on the FIDF rather than the BoT. Some of the FIDF's exposure have been converted into equity as part of the recapitalisation of the restructured financial institutions. The Government has promised to take full responsibility for the losses of the FIDF, by converting them into Government debt. This has been a key component of Thailand's overall economic programme, which is supported by the IMF (IMF, 2000).

6.1.6 The Financial Sector Restructuring Authority (FRA)

The FRA was established on October 24, 1997 in accordance with the Emergency Decree on Financial Sector Restructuring B.E. 2540. The FRA was created as an independent body to oversee the rehabilitation of 58 finance companies - whose operations were suspended by the orders of the Finance Minister on June 26, 1997 (16 companies) and August 5, 1997 (42 companies) - and to safeguard the interest of bona fide depositors and investors.

Thus, the FRA provided a support role to the BoT in restoring financial stability to Thailand. Initially, the FRA focused on segregating the good assets from the bad assets of the banking sector. Then the FRA sold most of the good assets to Radasin bank in order to continue the operation of businesses. The bad assets were sold to the AMC in order to improve the value of the assets. However, as the government changed, the policy to deal with the assets of the 56 closed finance companies also altered. In order to attract

more foreign currency and allow foreign investors to manage the assets, the government had to adopt a new policy to allow foreign investors to bid for the assets. After two years of operation, the FRA auctioned 648 billion of the 924 billion principal value of assets of the 56 defunct companies, with 583 billion baht as core assets and 64 billion as non-core assets. With the 6 past auctions of FRA, the value of the sold assets raised around 181 billion baht, about 27% of the total principal value of 648 billion baht. Sales of core assets, loan contracts, yielded 25% of the principal value, while the sale of the non-core assets, such as collateral and other property, yielded 53% of the principal value. There were 229 billion baht of assets unsold, of which 219 billion baht were core and 10 billion baht were non-core. The FRA called bids for assets worth 23.8 billion baht on November, 10 1999. The FRA began distributing returns from the sales to creditors in November, 1999.

With the financial crisis in Thailand now over, the FRA is expected to close its operations soon after paying creditors the money earned from the auctions of the 56 defunct companies.

6.1.7 The Property Loan Management Organisation

The Property Loan Management Organisation (PLMO) was established on the 10th April 1997, in accordance with the Royal Decree on the Property Loan Management Organisation B.E. 2540, in order to deal with the property market bubble that had burst in 1996. The oversupply of property was caused by a lack of reliable and comprehensive information on real estate projects, together with fierce competition among the developers. In order to resolve the problem, the BoT stepped in to remedy the property loans in the financial institutions that extended credits to the property sector.

The PLMO was established to purchase property loans with collateral from financial institutions for the purpose of managing and enhancing their value. The aim was to enable the financial institutions to improve the quality of assets while continuing to look after their borrowers through additional credit and loan monitoring process. The PLMO was not intended to directly extend credits to borrowers but was expected

to arrange for a restructuring of debt so that property developers have flexibility to complete their project.

The initial capital of 1 million baht was appropriated from the government budget. Another source of capital was contributed by the 35 participating financial institutions, with an admission fee of 1 million baht for each financial institution. Its working capital, up to 100,000 Million baht, was mobilised through the sale of government-guaranteed bonds as approved by the cabinet. The bonds were sold to general investors. The main objectives were to provide facilities for financial institutions to manage their property loans more flexibly, as well as to assist property developers to continue with their projects through a debt restructuring programme. The PLMO's operating expenses were borne by both financial institutions participating in the scheme and the property developers whose loans had been transferred to the PLMO. Also, a management fee of 0.2% per annum was charged equally to both financial institutions and the property developers.

As of December 1998, the total assets of the PLMO amounted to about 660 million bath, mostly consisting of short-term promissory notes issued by government financial institutions. From the beginning of its operation, the PLMO purchased only 3 property projects worth around 500 million baht. Since its members were mostly the 56 closed finance companies, therefore, the business was no longer viable. The cabinet approved on the 23 of March, 1999 the proposal of the Ministry of Finance to revoke the operation of the PLMO.

Thus, the PLMO provided a short term palliative measure for restoring stability in the mortgage finance market, thus playing a supporting role to the efforts of the BoT in reversing the adverse effects of the financial crisis.

6.1.8 The Thai Credit Bureau Company

The Thai Credit Bureau Company, was set up in September 1999 as a joint venture between the Government Housing Bank (GHB) and the Processing Centre Co. (owned by commercial banks), to operate under the auspices of the Finance Ministry. The aim of this body was to pool information about borrowers among

different financial institutions. The information was expected to cover existing loans, payment and service history, and basic demographic information such as age, assets and dependencies. In the early stage, the bureau focused on consumer loans such as auto leasing, credit cards and personal loans. The bureau relied primarily on information gathered from the Government Housing Bank's vast pool of mortgage borrowers. Information from other participating banks was expected to be put in the system by the end of 1999, adding to the GHB files already entered in the system. It was believed that the absence of a credit bureau was a major cause of poor credit risk management in the past, contributing to the financial crisis. There was limited customer information and hardly any credit scoring within the Thai banking system.

The Thai Bankers' Association also launched its own credit bureau, with support from the BoT, at the end of 1999. The bureau was owned by 13 Thai commercial banks with starting capital of 26 million baht. The bureau was expected to rely on the information from periodic reports on classified loans filed with the BoT, with the main focus on corporate loans. Banks were not permitted to access the information without authorisation from customers. The status of the borrowers was noted in the records, such as if they were under restructuring or in bankruptcy proceedings. The bureau changed banks' lending practices from relationship-based connections and collateral-based values to analysis based on cashflow projections.

Thus, these credit bureaus have complemented the traditional role of the BoT in restoring financial stability in Thailand. It is expected that the bureaus will eventually lead to stronger financial institutions and increased lending as banks gain increased confidence in selecting promising customers. Access to credit files of the credit bureau is limited to participating financial institutions, and then only in cases where they are considering a new loan application. Customers approaching the banks for new loans will be asked to authorise lenders to access their files from the bureau databases. The credit bureau will help speed up loan requests, reduce costs and improve access to credits for customers with good credit histories. Customers with poor credit histories will also find access to credits more difficult in the future.

6.2 Achieving International Regulatory Standards

6.2.1 Basle Capital Adequacy Ratio

In order to comply with the guideline of the Basle Committee on capital adequacy, the BoT proposed to amend the Commercial Banking Act B.E. 2505, as amended by the Commercial Banking act B.E. 2528, with the aim of upgrading the local banking standard to the international standard. The new capital adequacy ratio addressed both on and off balance sheet items. Since the implementation of the Basle Committee standards in 1993, Thai commercial banks have been permitted to include long-term subordinated debts and asset revaluation surpluses as supplementary capital.

During 1990-1995, local commercial banks managed to accumulate their first tier capital internally through the marked increase of retained earnings. To accomplish this, banks decreased their dividend payout to net profit ratio from 47 % in 1990 to 35% in 1995. The banks also succeeded in the accumulation of second tier capital. The increase in tier 2 capital could be attributed to two main factors. Firstly, Thai commercial banks were able to issue long-term subordinated debt in foreign currency denominations since early 1993, at a time when the Thai banking sector was very healthy. Secondly, the rapid expansion of branch networks of Thai banks in the past 10 years had yielded a large amount of new premises.

The BoT implemented the Basle ratios well before the crisis.⁸ The Basle capital accord of 1988, which the BoT adopted, assigned weights for various types of assets, with greater capital required for riskier types of loans. Capital to be maintained divides into two categories, first tier capital, defined as equity and retained earning, and second tier capital, defined as subordinated debts and revaluation from assets such as bank offices. The Basle Committee on Banking and Supervision, in June 1999, issued a new capital adequacy framework aimed at replacing the 1988 capital accord. The objectives of the new capital accord were to

⁸ However, shareholders were still able to receive the same dividend of about 3.32 Baht per share, through the past five years due to high profits. The relatively low price to earnings ratio made bank stocks attractive to investors, thus the sale of stocks was a viable option for Thai commercial banks. Therefore, the high profitability in the banking sector enabled them to increase their core capital via share issuance.

strengthen the stability of the international banking system and ensure a level playing field among international banks. The minimum capital adequacy ratio was initially set at 7% and was gradually raised to 8.5 %; the first tier capital ratio was also raised to 6% in October 1996. Following the devaluation of the baht currency in July 1997, the commercial banks faced the increasing non performing loans and had to set aside provisions to meet the requirements of The BoT. This Capital to asset ratios duly fell below the Basle ratio and the commercial banks were forced to try to recapitalize, but the time was not ripe to do so. In order to solve the problem of continuing decreases in capital, especially Tier 1 capital, on August, 1998, the BoT reduced the Tier 1 requirement from 6% to 4.25%, but still maintained the overall risk-weighted capital adequacy ratio of 8.5% In addition, in March and June, 1999, preferred shares attached with subordinated debts were allowed to be counted as a part of Tier 1 capital, but subject to a limit of not be more than 25% of Tier 1 capital. This was in line with the BIS rule. Moreover, the 1% provision requirement set in the case of normal lending, was also permitted to be counted as Tier 1 capital, but subject to a limit of 1.25 of risk assets.

6.2.2 Asset Classification, Accrued Interest and Appraisal of Collaterals

In the past, the BoT allowed Thai commercial banks to include as assets accrued interest, in the form of revenues, given that the value of collateral covered total debt outstanding. However, the practice motivated banks to focus and rely on collateral (most of which is real estate) in their credit approval process. In an effort to follow international accounting standards, a more stringent income recognition rule for financial institutions was introduced in July 1995 when the BoT ruled that financial institutions could record accrued interest as income only up to 6 months, and if the loans and interest accrued were fully collateralised, accrued interest could then be recorded up to 1 year. Consequently, the period was reduced to only 6 months, and since 1999 only 3 months accrued interest could be recorded in accordance with the “3 months past due” classification.

The classification and provisions of debts were amended. Previously, the BOT classified debts into 4 categories namely, “special mention”, “sub-standard”, “doubtful” and “bad”. For doubtful debts, banks were required to set aside provisions of up to 50%. In order to comply with international standards, in 1998 the classification of debts was improved by dividing them into 4 categories according to the past due date. If within 3 months past due, they were classified as “special mention”, 3-6 months past due as sub-standard debts, 6-12 months past due were classified as doubtful debts and over 12 months past due were classified as doubtful loss. In addition, the provisions were also adjusted; for doubtful debts they were raised to 75 % (100% in 1995) while provisions of 20% and 100% were levied on sub-standard debts and doubtful loss in 1997 respectively, with provisions of 1% for normal debts and 2% for special mention were introduced in 1998.

6.3 Other Post-Crisis Developments

6.3.1 Guidelines for Equity Holding for foreign investors in Thai Financial institutions

The 1962 Banking Act prohibited foreign nationals from holding shares (or being directors) in Thai commercial banks in excess of one fourth of the total shares. It also prohibited directors of one commercial bank from becoming a director in another commercial bank. As the financial crisis broke out in 1997, the public had no confidence in the financial system. The quality of assets was also deteriorating rapidly in line with the slowdown in the economy. It was difficult for financial institutions to raise their own capital. Therefore, in order to attract funds from abroad so as to enhance the stability of the financial system, the 1962 Banking Act was amended on June 28, 1997 to allow foreign entities or foreigners to hold shares in excess of the previous limit and to allow directors from one bank to be directors in another bank as well. However, the Ministry of Finance and the BoT also issued guidelines for equity holdings in financial institutions by permitting foreign entities that have a sound financial status and high potential to help increase the efficiency of the

management of their financial institution, to hold equities in Thai financial institutions of more than 49% of total shares for a period of 10 years. After 10 years, if the share holding exceeded 49%, the foreign entities would be allowed to continue such an amount of shareholdings but they could not purchase or exercise the right to purchase any additional shares, unless the amount of share holdings was less than 49%.

Regarding the policy statement, DBS Bank, ABN AMRO Bank, Standard Chartered Bank and United Overseas Bank were allowed to acquire shares in Thai banks of more than 49% (and up to 75%). Between 10% and 49% of shares in other banks, such as Bangkok Bank, Thai Farmers Bank and Siam Commercial Bank, were allowed to be acquired by foreign entities. Many other Thai banks, such as Bangkok Metropolitan Bank and Siam City Bank etc, were put up for sale.

6.3.2 Mergers, Acquisitions and the Privatisation of state-owned banks

Following the closure of 56 finance companies in 1997, the persistent economic slowdown and liquidity shortage in the money market caused the asset quality of financial institutions to deteriorate. Moreover, the requirement for financial institutions to set aside provisions against classified assets in line with international best practice resulted in many financial institutions experiencing losses, thus requiring recapitalisation in order to strengthen their positions.

In May 1998, the BoT ordered 7 finance companies and 4 banks to write down their capital and reduce their par value per share to one satang to eliminate the loss of the companies. Moreover, in August 1998, the BoT further intervened in 2 banks and 5 finance companies using the same criteria. Thereafter, the financial institutions concerned were expected to raise sufficient capital to increase their capital adequacy ratio to 9%, with the new shares to be sold to the FIDF. The BoT also ordered the removal of the board of directors and the appointment of new directors to oversee the management. Thereafter, Krungthai Thanakit Public Company Limited, a state-owned finance company, merged with 12 finance companies and the Union Bank of Bangkok and became Bank Thai, while the Leam Thong Bank was integrated with the Radanasin

Bank. Another two banks, the Bangkok Bank of Commerce, and the First Bangkok City Bank, was partially or fully acquired by Krung Thai Bank. Two other banks, including Bangkok Metropolitan Bank and Siam City Bank, were offered for sale by the end of year 2000. These procedures were designed to reduce damage to the FIDF because of the potential profits from selling these shares to the private sector in the future.

Following the government's measures to resolve the corporate liquidity situation and strengthen financial sector soundness, the BoT on 14 August 1998 set the criteria whereby a bank or a finance company would be required: to write down capital to 1 satang per share (100 satang equals to 1 Baht); to remove management; and to seek recapitalisation by the FIDF. The institutions would qualify for FIDF recapitalisation if they had incurred large operating losses but they were able to present a clear and credible recapitalisation plan.

In addition, due to slim future prospects to raise new capital to meet the Basle capital adequacy ratio, the government initiated the "capital support scheme" to partly help recapitalise the financial institutions and provide incentives for the financial institutions (especially large commercial banks), to extend more credit to the corporate sector. The Financial Restructuring Authority Committee (FRAC) was set up with a 300 billion Baht budget to help Thai banks recapitalize. The FRAC was expected to support any Thai commercial banks wanting to seek additional tier 1 capital from the BoT in form of preferred shares to fulfill their BIS capital adequacy ratio after setting aside the 100 % provisions required in year 2000 upfront. Should the existing shareholders or management be concerned about the *dilution* effect, they would opt for the tier 2 scheme in order to boost corporate debt restructuring.

Thus, this scheme is working jointly with BoT in a bid to facilitate the recapitalisation of Thai banks.

6.3.3 Proposed Banking and Finance Act Reforms

The Commercial Banking Act and the Act on the undertaking of finance business, securities business and credit foncier business have been effective since 1962 and 1979, respectively. Both Acts have been improved and amended several times during the period 1976 -1992. When the financial crisis broke out in 1997, both Acts were unable to cope with problems. The main objectives of amending the commercial banking act and finance company act were as follows:

~~///~~ Banks and Finance companies were separately supervised with different supervisory frameworks. This created difficulties in efficiently supervising them. In the amendment to the Acts in 1992, the BoT sought to bring both Acts to the same standard.

~~///~~ Financial service conglomerates were permitted in order to modernise the regulatory framework for both banks and finance companies. It allowed financial services, such as insurance, leasing and securities companies etc. to be owned by holding companies. The BoT was responsible for supervising financial institutions while other agencies were involved in regulating the financial services.

Thus, the amendments in the Acts were designed to provide the BoT with more powers to tackle problems in financial institutions at an early stage. It would allow the central bank to tackle problems rather than avoiding them. Previously, the Banking Act had left such matters to the discretion of the central bank governor, but the revised Act called for prompt and thorough action in all cases, thus modifying the traditional role of the BoT in view of the financial crisis.

7. Conclusions and lessons

One important lesson from the financial crisis is that, in Thailand, financial liberalization in an uncontrolled financial sector resulted in misallocation and mismatching of funds. In general, the Thai financial crisis reflected the failure of the banking sector, expressing itself partly in increasing current account problems but mainly in careless lending/borrowing and the accumulation of non-performing loans. By the time the real economy

started to show signs of weakening, with sluggish exports and an increase in the current account deficit, 'hot money' flowed in and covered the deficit; but this also led to careless investments. Consistent with the conclusion by Lensink, Hermes and Murinde (2000), it may be argued that political instability, indecisiveness and mismanagement at the political and administrative level also contributed to capital flight and the financial meltdown in Thailand.

Lack of effective financial regulation played an important role in aggravating the financial crisis. Thus, the important lesson is that failure to impose proper regulatory and legal control over the operations of banks has serious consequences. In particular, excessive lending by domestic banks (sometimes financed by international investors) and a lack of control over the actions of the borrowers need to be addressed. Poor policy making at the central bank and within commercial banks, encouraged over-investment and hence aggravated the fragility of the banking sector as firms were unable to service their debts.

One inevitable consequence of the financial crisis in Thailand has been the renaissance of informal credit in Thailand (Vatikiotis, 1998). New BoT rules introduced at the end of March 1998 to tighten borrowing have led to sharply higher interest rates. The tougher regulations will mean a fundamental - perhaps painful - change in Thailand's business culture. For generations, Thais have taken out loans using assets, rather than cash flow, as collateral. To change all this may require more than a simple decree from the central bank. The personal nature of banking in Thailand means that local branches often act independently of head offices, setting their own interest rates and managing their own clients.

Another important lesson from this paper is that, under a liberalised financial system, the central bank's role in supervision and examination of financial institutions is complex and demanding. Prudential regulation must be robust, up to date and well-balanced in order not to hinder the future development of financial institutions and innovations. Regulation must also be effective in maintaining stable and sound operation of financial institutions.

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