

THE 1997 KOREAN BANKING CRISIS: ANALYSIS AND IMPLICATIONS

Meenakshi Rishi*
Associate Professor of Economics
College of Business Administration
Ohio Northern University
Ada, Ohio 45810
(419) 772-2076
m-rishi@onu.edu

Liberty King
Senior, International Business and Economics
College of Business
Ohio Northern University
Ada, Ohio 45810

This paper has been prepared for presentation at Fifth International Conference of the Academy of Business and Administrative Sciences, July 2001.

* The George W. Patton Chair for Business and Economics at Ohio Northern University provided funding for the presentation of this paper. The authors are grateful to Ohio Northern University for their support for this project.

THE 1997 KOREAN BANKING CRISIS: ANALYSIS AND IMPLICATIONS

ABSTRACT

Over the last thirty years, (South) Korea witnessed a transformation of its economy from dynamism to retrogression as illustrated by the near-collapse of its financial system during the 1997 financial crisis. This paper argues that the Korean banking crisis originated in government policies of the post-war era of the 1960's through the 1990's. These policies established formal and informal ties amongst the Korean banking sector, the government, and the *chaebols*, which undermined bank growth and independence. Moreover, the lack of prudential supervision and autonomous financial controls made banks highly vulnerable to the 1997 crisis that ultimately led to financial insolvencies and numerous bank closures in the economy. The Korean government instituted a financial reform package in the aftermath of the crisis. This paper describes the key elements of the package and critically evaluates the current status of financial reform in Korea. The paper also surveys current literature on financial liberalization in order to examine the necessary conditions for the success of financial reform—not just in Korea but also in other emerging market economies. The implications of this study emphasize the importance of creating and sustaining effective bank regulatory/supervisory practices to reduce excessive risk taking behavior in the system. Paradoxically, such practices may necessitate *more* rather than less governance in areas of corrective action, financial transparency, deposit insurance, and risk management.

1. Introduction

Over the last fifty years, the world has witnessed (South) Korea's re-birth from civil war, transformation into an economic dynamo, and near collapse during the 1997 Asian financial crisis. During the 1980's, developed nations held up South Korea as an example of how free trade and industrialization can rapidly change a country's status from developing to newly industrialized country. Many in the West applauded the structures and institutions that the South Korean government and banking system adopted, as being more efficient. As the unforeseen 1997 financial crisis shook the country and the surrounding region, many began to question the "Asian miracle" and the Korean development model. By the end of the crisis, South Korea went from being an

example for the International Monetary Fund to being a nation heavily in need of its assistance.

The South Korean government was responsible for implementing the policies that guided and promoted the nation's phenomenal economic growth, and for many decades, it was proven effective. However, the government's stringent control of the banking system and the financial sector also stunted its growth and left the country ill-equipped to deal with the strain of the 1997 financial crisis.

This paper reasons that the seeds of the detrimental impact of the 1997 Asian financial crisis in Korea were sown years before through government control and ownership of banks. The paper analyzes these policies and critically evaluates the Korean financial reform package of 1998. The practical applicability of financial policy recommendations is also examined in the context of necessary preconditions for a sound financial environment not just in Korea but also in all newly liberalized emerging market economies.

The paper is organized as follows. Section 2 examines Korean developmental policy from the post-war era of the 1960's through the 1990's in order to establish the claim that policies that accelerated industrialization and export growth simultaneously stunted the development of the banking system. Section 3 describes the consequences of an underdeveloped banking system and highlights the role of the weak credit culture in transmitting the 1997 financial crisis through the Korean economy. Section 4 offers a critical assessment of the post-crisis financial reform package introduced by the Korean government in 1998. The following section (5) surveys current literature on financial sector reform and draws out lessons for the Korean economy. Section 6 concludes the

paper by underscoring the importance of prudential supervision in the banking sector and by relating the significance of banking reform to the success of financial restructuring not just in Korea but also in other newly liberalized emerging economies

2. Korean Industrial Policy: A Critical Appraisal

Korean industrial policy of the 1960s and 1970s was based on a developmental model that emphasized the role of exports in promoting growth and development. A key element of this plan was the provision of subsidized loans and preferential treatment to certain export-oriented conglomerates known as *chaebols*. Over time, *chaebols* became accustomed to getting low interest rate loans from the government-controlled commercial banks and consequently acquired an enormous amount of debt. Acquiring a highly leveraged status was almost integral to the survival of *chaebols* and according to Kwan Kim (2000) the average debt to equity ratio for these companies was a staggering 400 percent! The *chaebols* were able to operate with such a large amount of debt because they operated under implicit government guarantees of a bail out in case of bankruptcy. This was known as the too-big-to-fail policy and resulted in a highly leveraged *chaebol* sector in the economy. As a matter of fact, the government often pressurized banks to provide *chaebols* with low interest “policy” loans and sometimes to purchase monetary stabilization bonds at substantially below market to prop up sectors deemed important for export.

As consequence of subsidizing *chaebols* via low interests rates, banks were unable to attract new depositors and this encouraged the development of an informal, curb market in the economy. The curb market catered to small businesses and

individuals without political connections. Non-*chaebol* enterprises could get loans, which they could not obtain from the formal banks, and individuals could earn a higher interest rate on their deposits. Although few reliable statistics or data exist for measuring the size or growth of the curb market, a 1972 estimate by Clifford (1998) reveals that the informal system had at least one-third of the value of loans as the formal banking system (Clifford, 1998). Again, this estimate is not accurate, and many believe that it is too conservative. Nevertheless, it illustrates the size of the informal curb market and that smaller borrowers and lenders had to go outside of the formal system to find sources of funds and to gain a better interest rate on their deposits.

As the government directed the loan-process from banks to industry, the banks established few, if any, controls for evaluating or the profitability of the loans they were making. The banks did not have to question the profitability of the *chaebols'* projects, and throughout the years, their projects became increasingly riskier. With riskier loans, the amount of non-performing loans (NPLs) grew and by the end of the 1980's almost one in five loans was classified as an NPL. In the U.S. by contrast, only one or two of every hundred loans is classified as an NPL (Eun Mee Kim, 1998). By way of further comparison, Taiwan, which also experienced heavily export-led economic growth over the same time period, averaged an NPL to total loan ratio of around 15 percent (Holland, 2000).

How could the ratio of NPLs in South Korea grow so large, and why did the banks keep lending? The answer is simple. The banks had little say in the matter. In essence, the banks were the third leg of the triangle in the Korean economy, and they shared this relationship with the government and the *chaebol* (Figure 1). The government

appointed the bank managers, and the government also owned the controlling shares in the banks. During the 1960's, the government confiscated privately held bank stock, stating that private ownership of banks was a source of illegitimate fortunes. Only in the 1980's did the government begin to privatize ownership of bank stock, but any one individual's interest was limited to 4 percent of the total (Thompson, 1999) and the government exercised direct quantity control over stock issues. This offers an interesting example of the coexistence of liberalization and direct control in the Korean economy. By the time of the privatization, the transfer of bank ownership from the government to the private sector was exchanging the bank shares in name only. The triangular system of banking, government, and *chaebols* supported this swap.

Furthermore, the banks had even less control, when the government instituted a program of policy loans, aimed at providing funds for specific export-oriented industries. Originally, the sectors targeted for such loans were based in heavy industry and chemicals. Given the rate of inflation, the real rates on these policy loans were usually negative. Since the government appointed the bank managers, the managers were inclined to distribute policy loans to insure their government-granted posts. More explicitly, in 1974, the government created the National Investment Fund to support a variety of exporting industries. The government required banks to give a percentage of their increases in deposits to this fund (Cho and Kim, 1994). The Bank of Korea then loaned the money to *chaebols*, based on government policy.

As for the *chaebols*, one of their characteristics that directly impacted the banking system was that the firms cross-guaranteed each other's loans (Eun Mee Kim, 1998). The companies formed a tightly woven network, so that if a South Korean bank would

even attempt to evaluate the ability of one *chaebol* to repay its loan, the bank would get lost in a web of *chaebol*. In this way, assessing the ability of a *chaebol* to repay a loan before it was made was nearly impossible, especially considering that few procedures existed for evaluation.

Politically, during the 1970's, both the *chaebols* and the banks were courting the government overtly. Banks and chaebols gave huge amounts of money to support the causes of various government officials. For example, in 1975, banks in South Korea had given a total of \$2.1 million to a defense fund, established by a corrupt politician. One of the chaebol, Daewoo, had wanted to give over \$200 million to the same fund, but the company could barely break-even that year (Clifford, 1998). Although there were no explicit guarantees that the government would help a bank or a firm because of its large donations, many institutions believed that it was in their favor to donate to such causes. Such practices only reinforced the triangular relationship between the government, the banks, and the *chaebols*. This mode of operation characterized Korean developmental strategy leading up to 1997. It is now believed that while the above mentioned government policies were successful in maintaining macroeconomic stability via direct control of financial flows, they also engendered many caveats in supervision that ultimately rendered the economy financially fragile and vulnerable to crisis (Dooley, 2000). This point is elaborated upon next.

3. The legacy of Korean Industrial Policy: An Underdeveloped Banking System

The foregoing suggests that Korea's rapid growth and development owed much to the nexus amongst the banks, government, and *chaebols*. The legacy of the Korean

developmental model undermined the governance structure of Korean banks and consequently, banks did not develop the string “credit culture” that has become the norm in OECD countries. To increase export growth, the government imposed controls on interest rates that undermined price competition. Considerable restrictions on product innovation further undermined banks’ ability to control credit policy or costs. Banks had little concern for insolvency no doubt abetted by implicit assumptions of government-sponsored bailouts. In such an environment, it was no surprise that banks were usually more concerned with garnering profits through asset growth with little regard to asset quality.

Tables 1 and 2 illustrate some of the arguments made in the paper thus far. Table 1 demonstrates the low and declining role of on balance sheet lending by commercial banks in total financial intermediation. As a consequence of low interest rate policies imposed on commercial banks, there was an excess demand for funds that was increasingly met by non-bank financial intermediaries (NBFIs). Table 1 clearly shows a rising share of the latter in total financial intermediation in the economy. Table 2 tracks certain key indicators of profitability in the Korean banking system. As judged both by returns on assets as well as by return on equity, Korean banks score low on profitability and asset growth. The low interest rate margins are another indicator of sub par performance and partly reflect higher competition from NBFIs.

It is perhaps worth mentioning that the Korean banking system did have some favorable attributes especially when compared to other emerging market financial systems. One, there is less of a conflict between ownership and control in Korea, because interlocking directorships were proscribed by governmental policy. Also, unlike other

economies that suffered from banking crises in the 1980s, Korean banks did not have much direct exposure to the real estate sector. However, owing to the large amount of lending that was collateralized by real estate Korean banks did have an indirect exposure to the real estate sector.

The poor profitability and asset quality of Korean banks combined with their direct/indirect exposure to the *chaebol* sector made them vulnerable to financial strain, the first signs of which became apparent with as chaebols began posting losses in late 1996. By early 1997, several chaebols had failed and the debt/equity ratio of the 30 largest chaebols had reached a colossal 600 percent. By mid-1997 the signs of strain in the chaebol sector were threatening to spill over into the financial sector and Governmental policy response was too meager to avoid the complete devastation of the Korean banking system by end-1997. In 1997 alone, approximately 20 percent of the entire banking industry's working capital was lost and two major banks, Korea First and Seoul Bank were forced to declare insolvency.

The crisis in the Korean Banking sector forced a policy response from the authorities and the government elected in 1997 pledged to radically reform the sector along free market lines which would allow banks to have greater autonomy as well as increased accountability for profitability and prudential soundness. A statement and assessment of the key elements of the Korean banking reform package are presented next.

4. Korean Banking Sector Reform: Analysis and Assessment

Korean banking legislation introduced in early-1998 was primarily aimed at eliminating the rigid functional segmentation of the financial system by allowing banks to

innovate and diversify their activities. Other elements of financial reform involved the introduction of deposit insurance, although in the Korean case, banks had generally assumed that the government would never allow them to fail. The deposit insurance program and other supervisory functions were relegated to a financial supervisory commission (FSC) that was entrusted with the task of streamlining financial supervision along international standards. Specifically, a Banking Supervisory Authority (BSA) would operate under the FSC and would rigorously enforce the Basle Committee's "Core Principles for Effective Bank Supervision." In addition, The FSC would develop prudent risk management systems that would the close monitoring of bank assets and the adoption of a prudent regulatory approach. Under such an approach, banks with low levels of capitalization would be obliged to merge or close while banks with progressively higher capitalization would be allowed to assume greater risk. The Korean Asset Management Corporation (KAMCO) was given the responsibility of the purchase and disposal of NPLs. The responsibility for rehabilitation of unsound banks was also assigned to the FSC. Since 1998 the Korean government has pledged public funds to support the rehabilitation of the Korean banking structure. Moreover, as it is now widely understood that the Korean banking crisis was due in large part to weaknesses in patterns of *chaebol* finance and governance, a process of corporate reform was also been initiated. This consisted of required calls for reductions in corporate debt/equity ratios, removal of excess capacity, and a move to grater transparency of *chaebol* management and an improvement in corporate governance standards.

However, commendable as the entire Korean financial reform package sounds, restructuring the Korean financial sector and reforming the highly leveraged *chaebols* is a

long-term process with the end not yet in sight. Further, there have already been several slips on enforcement front. For example, the FSC claimed that in early 2001 the top chaebol had cut their average debt-equity ratio, however most of this reduction was achieved not by lowering debt but via by increasing equity. In this regard the FSC suspects that the top chaebol obtained a portion of their capital increase from related companies or from other highly leveraged chaebol. Moreover, the publicized reduction in debt-equity ratios only captures domestic group debt levels on a non-combined basis and does not reflect the volume of debt incurred by overseas subsidiaries. The latter stood at a staggering \$39.3 billion at the end of July 1999.

In light of the above, it should not come as a complete surprise that many local experts are expressing skepticism on the success of financial reforms in Korea. “Korea is like peeling onions,” says Seoul Banker Seung-Hoon Lee (Loong, 2000). “Every time you peel off a layer, there is another!” Such questions about the efficacy of the financial reforms and the slowdown of the export sector due to a world economic slowdown have bogged down any prospects for an economic recovery in Korea. Meanwhile financial sector woes continue to plague the economy and the FSC reported that in 2000 alone, Korean banks had accumulated \$31 billion in NPLs, which is twice the figure for 1999 when the economy appeared to be rebounding from the 1997 crisis. At this point, economists are urging the government to be serious about the reform process and to stop using public funds to support debt-ridden *chaebols* with banks serving as money pumps. Critics are also not persuaded by the government’s pledges to break out of the too-big-to-fail mode of operation and Marcus Noland of the Institute of international economics

echoes this sentiment when he states, “We need a situation here in which restructuring is an ongoing process carried out by economic agents, not a political process” (Kirk, 2001).

What should be the key elements of an “economically driven” restructuring of the Korean financial sector and what are the implications of such re-structuring for other developing economies? This is a topic that is discussed next.

5. Financial Policies to Prevent Financial Crises

The Asian crisis inspired a genre of studies that recommends financial policies that are designed to stave off financial crises in emerging economies. A broad sweep of the literature indicates that financial reform is required in at least eleven basic areas (Mishkin, 2000; Dooley 2000). These areas of reform concern themselves with: 1) prudential supervision of banks, 2) accounting and disclosure requirements, 3) legal systems, 4) market-based discipline, 5) entry of foreign banks, 6) capital controls, 7) restrictions of foreign-denominated debt, 8) reduction of governmental intervention in the financial sector, 9) eliminating the too-big-to fail mentality in banking and the corporate sector, 10) maintenance of price stability, and 11) efficient exchange rate management and cautious approach to international reserve accumulation. These points are briefly developed next.

The recommendation for prudential supervision stems from the well-understood association between financial intermediation and economic crises. In this regard, Dooley (2000) suggests that lack of risk management by Korean banks, an absence of supervision and implicit government guarantees made the banking system financially vulnerable and prone to failure. Thus it is argued that all emerging economies, including

Korea should take the necessary steps toward a strong supervisory regime. Such steps may entail taking prompt corrective action and to close down institutions when they become insolvent. A key element in prudential supervision entails that the supervisors be given adequate resources and statutory authority to do their jobs. Also, supervisors must themselves be accountable and be prosecuted if caught indulging in corrupt practices.

A critical area of financial reform concerns itself with accounting standards and disclosure requirements for financial institutions. Without appropriate information, both markets and supervisors will not be able to monitor financial institutions to deter excessive risk-taking. Literature also suggests that the efficient working of the financial system is enabled by well functioning legal system that can process issues such quick resolution of bankruptcies in a timely manner (Rojas-Suarez and Weisbrod, 1996). Insofar as market-based discipline on financial institutions is concerned, Mishkin (2000) has suggested that requiring banks to issue subordinated debt. Subordinated debt is uninsured debt that is junior to insured deposits but senior to equity. Simply speaking, if the bank is exposed to too much risk, it will be unable to sell its subordinated debt.

Two controversial recommendations involve the entry of foreign banks and the use of capital controls. Insofar as foreign bank entry is concerned, one view maintains that foreign banks will introduce better management techniques and a more efficient banking system in the home country. Others view foreign bank participation as a threat to national security. Further, encouraging entry of foreign banks makes it more likely that uninsured depositors and creditors will get no relief if the bank fails. Another divisive issue is whether or not to control the entry of capital into a country. Literature

is not clear whether capital controls such as the ones recently adopted in Malaysia are effective in prompting financial stability. On the one hand, capital controls may limit the fuel supplied to lending booms. Controls on the outflow of capital may also help a country insulate itself from volatile financial flows and currency crises. On the other hand, the free market view on capital controls is that they produce widespread distortion and result in substantial resource misallocation.

In the context of financial sector reform, Caprio and Honohan (2000) advocate curtailing government intervention in credit markets as a way to promote investment and growth. Their reasoning is based on the fact that governments have less of an incentive to solve asymmetric information problems in markets, as they are not guided by a profit motive. The absence of a profit motive also suggests that state-owned banks are less likely to manage risk properly and be efficient and this has led to calls for bank privatization in emerging economies.

Proponents of financial reform in emerging economies have also cautioned such economies from issuing excessive foreign-denominated debt. The usual argument in this case is that substantial foreign-denominated debt makes a financial system more fragile as it may hinder the ability of the central bank to use expansionary monetary policy to aid recovery from a financial crisis. Because much foreign -debt is intermediated through the domestic financial system, regulations to both restrict bank lending and borrowing in foreign currencies could greatly enhance financial stability.

Eliminating the too-big-to-fail policy in the corporate sector is touted as another policy recommendation that is especially applicable in the Korean case. As explained above, the Korean government was perceived to be operating with a too-big-to-fail

policy for the *chaebols* that had begun to experience reversals of fortune in the 1990s. Given the lack of discipline, these chaebols proceeded to solve their problems by borrowing, mostly in foreign currency and drastically increasing their leverage, and as is now evident, this risk taking behavior was a key factor behind the transmission of the Asian crisis in Korea.

Some studies have also touted specific macroeconomic policies designed to promote financial stability in emerging economies. Principal among such macro policy recommendations are the adoption of appropriate monetary policy guidelines and the promotion of a sound exchange rate regime (Fischer, 1993; Obstfeld and Rogoff, 1995). In the area of macro policy reform, some researchers have advocated increased holdings of international reserves to insulate emerging economies from financial crises. Indeed the Korean government appears to have taken this advice to heart and has recently increased its reserves to the \$100 billion level. However, this accumulation of reserves could potentially lull the country into complacency and prompt the government to relax the pressure on reforming the financial system.

In the context of financial sector restructuring, the foregoing discussion suggests at least two threads for discussion. One, while each of the above-mentioned recommendations are important in their ability to prevent the occurrence of financial crisis, are any of these recommendations realistic? Two, are there any areas of reform that should be tackled before revamping the entire financial system? Both these issues are discussed in the following section.

6. Concluding Remarks

This paper has traced the emergence of the banking and financial crises in Korea to the complicated triangular inter-dependencies between the government, banks and the chaebols. This “developmental” strategy and the many caveats between regulation and supervision undermined bank growth and independence in the economy. Moreover, capital account liberalization and the absence of quantity restrictions on foreign borrowings by banks, enabled banks to amass debt instruments, thereby rendering them highly vulnerable to the 1997 crisis that ultimately led to financial insolvencies and numerous bank closures in the economy. Indeed the deadly combination of explicit or implicit deposit insurance, undercapitalized banks, unrestricted capital inflows, and poor prudential control and regulation has resulted in bank failures in both developed and developing economies (Diaz-Alejandro, 1985; McKinnon and Pill, 1999). This so-called trap of financial liberalization and eventual financial instability raises a question of how solutions can be found. The previous section had suggested several recommendations as well as raised the issue of whether any or all of these recommendations are realistic, not just for Korea, but for all emerging market countries. This is elaborated next.

One of the guidelines for reform includes the elimination of the too-big-to-fail mentality and in both the corporate and the financial sectors. While it may be necessary, in theory, for the government to allow the market to make the decisions as to which financial institutions and businesses will succeed and which will fail, reality paints a grimmer picture. As the Korean example illustrates, over thirty years of history of past behavior and “implicit” government guarantees have demonstrated the government's willingness to intervene on behalf of the *chaebols*. Eradicating the “paternalistic”

cultural attitude will be difficult to accomplish in this generation, and it is doubtful that the government can legislate itself out of its own interventionist mode.

Section 5 had also raised the issue of examining the necessary preconditions for the success of financial reform in Korea. The authors of this study believe that creating and sustaining sound bank regulatory/supervisory practices is essential to the larger agenda of financial re-structuring. If prudential supervision and disclosure requirements for banks are not in place, there will be no constraints on risk-taking behavior and in a liberalized financial environment such as in Korea, such behaviors can be potentially disastrous.

Many policy makers are recommending that Korea enact stiffer controls on the flow of capital into and out of the economy. Indeed, the potentially de-stabilizing nature of short-term capital flows and the significance of such flows in exacerbating the Asian crisis has been widely accepted in the literature (World Bank, 1999). Recognizing the controversy surrounding capital controls, the authors of this study offer an alternative recommendation — if banks are better regulated and supervised then capital flows are less likely to produce excessively risky behavior by banks. Thus prudential supervision can by its very nature function as a “quasi” capital control mechanism that can enhance the efficiency of the financial system rather than hampering it.

Banking regulation and supervision is also a precondition for the success of policy recommendations that call for a reduction of foreign-denominated debt. This is because most foreign-denominated debt is intermediated through the banking system, and regulations on bank lending and borrowing in foreign currencies could greatly enhance financial stability in the economy.

In conclusion, the analysis of this paper suggests that financial sector reform itself is not an either-or proposition for newly liberalized financial markets but rather extends along a continuum in terms of the regulatory/supervisory structure of their banking sectors and the efficacy of their accounting environment. In other words, emerging economies must embark on a sequential restructuring of their financial sectors with banking reform being the first step in the process. Paradoxically, this will require *more* rather than less governance in areas of corrective action, financial transparency, deposit insurance, and risk management.

Finally, this study draws attention to the fact that the future of the emerging market financial reform is increasingly becoming a politico-economic issue, where financial reform must be bolstered by the political will to change. What should be the role of the state in emerging economies that are embarking on an agenda of financial reform? What kinds of governmental commitment and legislation would make the economy financially sound in a global environment? These are some issues that can guide an agenda for future research on the topic.

Figure 1

**The Triangular Relationship between the Korean government, the Banks,
and the *chaebols*.**

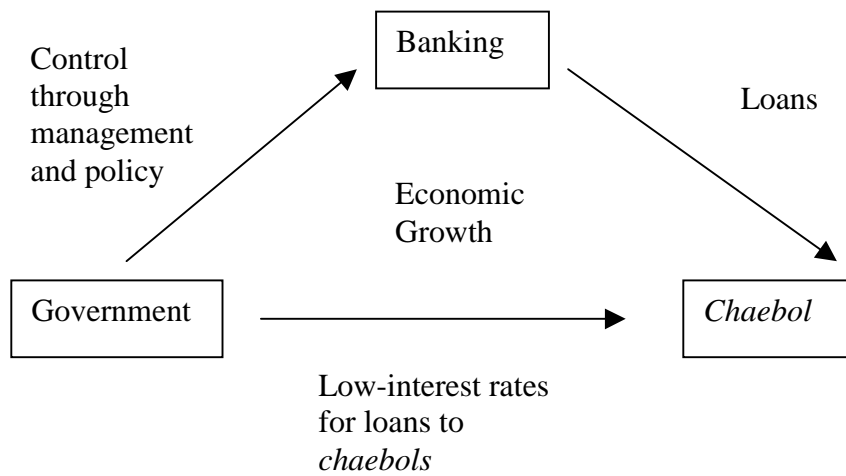


Table 1**Loan and Deposit Market Shares of Korean Financial Institutions**

(In percent)

	1980	1985	1990	1995	1997	1998
Loan Market Share						
Banking Accounts	63.3	58.4	48.2	39.5	39.2	39.5
Trust Accounts	0	0	8.0	19.0	20.0	14.4
Non-Bank Financial Institutions	36.7	41.0	43.8	41.5	40.8	46.1
Deposit Market Share						
Banking Accounts	68.4	53.5	34.9	29.1	28.1	28.5
Trust Accounts	0	0	14.9	25.9	25.9	17.5
Non-Bank Financial Institutions	31.6	46.5	50.2	45.0	46.0	54.0

Source: Thompson, 1999

Table 2**Profitability of the Korean Banking System**

(In percent)

	Average 1990-93	1994	1995	1996	1997	1998
Return on assets	0.56	0.42	0.32	0.26	-0.93	-2.89
Return on equity	6.4	6.09	4.19	3.8	-14.18	-46.55
Net Interest margin (basis pts)	2.72	2.30	3.02	3.52	3.57	3.71
Capital Adequacy Ratios	10.0	10.62	9.33	9.14	7.04	9.19

Source: Thompson, 1999

References

- Caprio, Gerald and Patrick Honohan. Finance in a World of Volatility, World Bank mimeo, 2000.
- Cho. The Dynamics of Economic Development. Institute for International Economics: Washington D.C., 1994.
- Cho, Lee-Jay and Yoon Hyung Kim. Korea's Political Economy— An Institutional Perspective. Westview Press: Boulder, Colorado, 1994.
- Choi, Young Back. "On the Causes of the Financial Crisis in Korea," Multinational Business Review, Fall 1999: 45-54.
- Clifford, Mark L. Troubled Tiger: Businessmen, Bureaucrats, and Generals in South Korea. Sharpe: Armonk, New York, 1998.
- Crockett, Andrew. "Commentary: How Should Financial Market Regulators Respond to the New Challenges of Global Economic Integration?" Federal Reserve Bank of Kansas City Symposium on Global Economic Integration: Opportunities and Challenges, August 2000.
- Diaz-Alejandro. "Good-bye Financial Repression, Hello Financial Crash," Journal of Development Economics, September-October, 1985.
- Dooley, Michael P. "A Model of Crisis in Emerging Markets," Economic Journal, January 2000.
- Fischer, Stanley. "The Role of Macroeconomic Factors in Growth." Journal of Monetary Economics 32:1993
- Holland, Tom. "Crisis? What Crisis?" Far Eastern Economic Review. 21 Dec 2000: 70.

- Kirk, Don. "South Korea Sees Slowing Down of Economy," in New York Times,
February 27, 2001
- Kim, Eun Mee, ed. The Four Asian Tigers: Economic Development and the Global
Political Economy. Academic Press: New York, 1998.
- Kim, Kwan. "The 1997 Financial Crisis and Governance: The Case of South Korea."
Working Paper #272. The Helen Kellogg Institute for International Studies:
University of Notre Dame. March 2000.
- Loong, Pauline "Taking on the Reform Challenge," in Asiamoney, XI (7), September
2000.
- McKinnon, Ronald and Huw Pill, "Credible Liberalizations and International Capital
Flows: The Overborrowing Syndrome," in Ito, T., Krueger, A.O. (eds.) Financial
Deregulation and Integration in East Asia. Chicago: University of Chicago Press,
1999.
- Mishkin, Fredric. "Financial Policies and the Prevention of Financial Crisis in Emerging
Market Countries," NBER Conference on Economic and Financial Crises in
Emerging Market Countries, December 2000.
- Obstfeld, Maurice and Kenneth Rogoff. "The Mirage of Fixed Exchange Rates," Journal
of Economic Perspectives Fall, 9, #4.
- Rojas-Suarez, Liliana and Steven Weisbrod. "Building Stability in Latin American
Financial Markets," in Ricardo Hausman and Helmut Reisen. (eds.) Securing
Stability and Growth in Latin America (Paris: OECD Development Center and
Inter-American Development Bank).

Thompson, John K. "Reforming the Korean Banking System," Financial Market Trends,
Feb 1999, No. 72: 85-114.

World Bank. World Debt Tables: External Finance for Developing Countries
Washington, D.C.: World Bank, 1999.