

Year I • No. 1 • March • 2001

BANKS



BULLETIN

1

Croatian National Bank
Banks Bulletin

PUBLISHER Croatian National Bank
Publishing Department
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PRINTED BY Poslovna knjiga d.o.o., Zagreb

Those using data from this publication
are requested to cite the source.

Printed in 600 copies

ISSN 1333-1043

Croatian National Bank

BANKS BULLETIN

Zagreb 2001

Contents

1 Regulations / 7

1.1 Banking Law / 7

- 1.1.1 Regulations Enacted on the Basis of the Banking Law / 8
 - Bank Capital and Capital Adequacy Calculations / 8
 - The Classification of Placements and Risky Off-Balance Sheet Items and the Assessment of Bank Exposure / 13
 - The Formation of Specific Reserves to Ensure Against the Potential Losses of Banks / 15
 - Bank Investment in Fixed Assets and Equity Participation / 16
 - Reporting to the Croatian National Bank on Single Borrower Indebtedness with Banks to an Amount Exceeding Five Million Kuna / 16
 - The Scope and Content of the Bank Audit and Audit Report / 17
 - The Granting of Operating Licenses for Banks / 17
 - Conducting Supervision of Bank Operations / 18

1.2 New Capital Adequacy Framework / 18

- 1.2.1 The First Pillar – Minimum Capital Requirements / 20
 - Credit Risk / 20
 - Market Risk / 22
 - Interest Rate Risk / 22
 - Other Risks / 22
- 1.2.2 The Second Pillar – Supervisory Review of Capital Adequacy / 23
- 1.2.3 The Third Pillar – Market Discipline / 24

2 Analysis of Financial Institution Operations / 26

2.1 Banks / 26

- 2.1.1 Concentration in the Banking System / 27
- 2.1.2 Banks' Balance Sheet / 30
- 2.1.3 Bank Capital / 32
- 2.1.4 Income Statement / 36
- 2.1.5 Return Indicators / 38
- 2.1.6 Credit Risk / 42
- 2.1.7 Liquidity Risk / 44
- 2.1.8 Foreign Exchange Risk / 47

2.2 Savings Banks / 49

- 2.2.1 Balance Sheet Structure / 49
- 2.2.2 Income Statement / 51
- 2.2.3 Credit Risk / 51

3 List of Banks / 53

Foreword

Along with the numerous other publications it has issued up to now, the Croatian National Bank has decided to take a further step towards providing comprehensive information to the general public. The underlying assumption of this publication is to offer sufficient information that can be easily understood without prior knowledge of the Croatian banking system, in order to provide insight into developments in the entire system and its present situation. We believe that this will satisfy the demands of the domestic and international professional public, as well as that of other entities interested in the Croatian banking system.

Except general data concerning the entire Croatian banking system, the publication provides data on peer groups of banks which will enable banks to compare themselves with other banks in their peer group and to reach conclusions about their own performance.

The publication is divided into three parts:

- The first part analyses innovations in banking regulations in the Republic of Croatia, and certain current topics related to the future development of banking regulations and supervision.
- The second part analyses developments and conditions in the Croatian banking system. Data is included on the entire banking system as well as on peer groups of banks, classified according to recognizable criteria.
- The third part contains specific data on individual banks, for example a list of members of bank management boards, supervisory boards, shareholders, auditors, etc.

The text is accompanied by notes on the methodology applied in tables and figures.

This publication is to be published twice a year: the spring issue will contain data up to the end of the previous year, whereas the autumn issue will contain data up to mid-year.

As is usually the case, the time needed to prepare the first issue was longer than it will, hopefully, be in the future. Besides technical problems, one of the major reasons for the extensive preparations needed for this issue were the numerous events taking place in the banking system in the period from the beginning of 1997 to mid-2000, all of which are described in this issue.

This period was characterized by bankruptcy proceedings, bank restructurings and privatizations, considerable changes in bank ownership structures, the introduction of new banking regulations and numerous other events leading to the establishment of the banking system as it is today.

We hope that this publication will satisfy the demand for data on the banking system and that it will enhance the transparency of Croatian banking practices.

Editorial Board

1 Regulations

A new Banking Law was enacted at the end of 1998 (*Narodne novine*,¹ No. 161/98). This Law, the basic act regulating bank operations, introduced certain innovations. The most important innovations will be described below.

First of all, the new Banking Law does not divide deposit institutions into banks and savings banks as did the former Law on Banks and Savings Banks. In the new Law, all these institutions are referred to as *banks*, and divided into three groups. The classification criterion is the minimum amount of core capital (depending on the type of operations a bank intends to perform) at the bank's disposal. Accordingly, stipulated minimum amounts of core capital are 20, 40 and 60 million kuna. By contrast, the Law on Banks and Savings Banks prescribed the minimum amount of core capital of 18 million kuna for banks and 3.6 million kuna for savings banks.

In addition to this increase in the absolute minimum amount of core capital which a bank must pay-in prior to its enrolment in the Register of Companies, the minimum capital adequacy ratio (the ratio between risk-based capital and the total amount of assets and off-balance sheet items classified and weighted according to the degree of risk) was also increased, from 8 to 10 percent.

For banks and savings banks that were enrolled in the Register of Companies prior to its enactment, the Law prescribed a transitional period for statutory and capital adjustment to the provisions of the new Law. These provisions stipulate that each bank and savings bank intending to continue operations is obliged to ensure the minimum amount of core capital of 20 million kuna by December 31, 1999 and December 31, 2001 respectively, and to submit an application to the Croatian National Bank for an operating license in accordance with the Banking Law.

Furthermore, the Banking Law contains detailed provisions on the conduct of bank internal control, and additionally obliges banks to conduct an internal audit of their operations, as well as to assess and measure all risks to which they are exposed.

The most important innovations introduced by the new Banking Law are provisions on the supervision of bank operations, which is conducted by the Croatian National Bank. Whereas this segment was only mentioned in the Law on Banks and Savings Banks, the new Law stipulates, in detail, the rights and obligations of the Croatian National Bank regarding bank supervision, the method of conducting bank supervision (on-site bank examination and the analysis of the financial reports banks are required to submit to the Croatian National Bank in stipulated forms and with specified time parameters) as well as the procedure for taking measures to eliminate established malfeasance and irregularities in bank operations. It is expected that the consistent and efficient implementation of these provisions of the present Law, as well as their further development aimed at comprehensive and modern bank super-

1.1 Banking Law

¹ Official gazette of the Republic of Croatia; hereinafter *Narodne novine*.

vision will significantly improve the quality and overall stability of the domestic banking system.

1.1.1 Regulations Enacted on the Basis of the Banking Law

Upon the enactment of the Banking Law, it was necessary to adjust relevant regulations and stipulate all matters which are, in accordance with the Law, within the jurisdiction of the Croatian National Bank.

During 1999 and 2000, the Croatian National Bank enacted several regulations stipulating in detail certain issues concerning bank operations and supervision of bank operations performed by the central bank.

Significant central bank regulations enacted on the basis of the central bank powers stipulated by the Banking Law regulate the following issues:

- calculation of a bank's capital and capital adequacy;
- classification of placements and risky off-balance sheet items and an assessment of bank exposure;
- formation of specific reserves to ensure against the potential losses of banks;
- bank investment in fixed assets and equity participation;
- reporting to the CNB on single borrower indebtedness with banks to an amount exceeding 5 million kuna;
- scope and content of bank audits and audit reports;
- granting of operating licenses for banks;
- conducting supervision of bank operations.

For the purposes of uniform implementation, most decisions are accompanied by the corresponding instructions for implementation. The Chart of Accounts for Banks and instructions for its implementation have also been enacted.

To provide a better insight into the existing regulations, the text below provides a short review of new decisions and compares them with the previously applied regulations.

The first decisions regulating the methodology for calculating capital and capital adequacy for banks and savings banks were enacted in November 1993 (*Narodne novine*, No. 107/93) and were implemented by the end of the first quarter of 1999. Two new decisions have been implemented since April 1, 1999: the Decision on the Methodology for Calculating Bank Capital, and the Decision on the Methodology for Calculating the Capital Adequacy and Risk-Weighted Assets of Banks (*Narodne novine*, No. 32/99).

The basic concept used in the calculation of capital and its adequacy does not significantly differ from that in the 1993 regulations. Credit risk remains the basic parameter guiding the calculation of the capital adequacy ratio. However, the components and deduction items of almost all types of capital were changed, as well as the methodology for including risky off-balance sheet items in risk-weighted assets.

An important innovation is that banks calculate their risk-based capital and capital adequacy ratio on a consolidated and unconsolidated basis. Calculations on a consolidated basis are made annually, at the end of the year. It

should be mentioned that consolidation within a group of companies presently includes only banks, savings banks and housing savings banks, whereas other companies within a group are (for the time being) excluded from the consolidation made for the purposes of reporting to the central bank.

Core Capital Calculations

The component parts of core capital have not been changed but new deduction items from core capital have been introduced. These are:

- intangible assets such as goodwill, licenses, patents and trademarks (since this type of property is characterized by uncertainty regarding future benefits);
- claims and contingent liabilities secured by the bank's own common and preferred shares (it should be noted that, regardless of Article 48 of the Banking Law which stipulates that bank's shares can not be used as collateral for any loan granted by the bank, such loans still exist since they were granted before the Banking Law came into force);
- the unpaid part of a loan used for the purchase of bank shares (loans granted for this purpose before the Banking Law came into force, as well as loans to employees for the purchase of own shares, which are as an exception allowed by the provision of Article 47 of the Banking Law).

It should be stressed that in determining whether a particular loan is a deduction item or not, the emphasis is not placed on the form of the loan contract but on the essence of the credit relationship (analysis is made of the purpose for which extended funds were really spent). The reason is that the contract can state something else as the purpose of the loan, and not the purchase of bank shares.

In addition to the above stated, deduction items include a current year's loss and previous years' losses as well as repurchased own shares and participations.

Reasons for the introduction of additional deduction items are justified and can be found in the very purpose of raising the bank's capital. Capital serves as coverage for unexpected and unforeseen losses. The emphasis is put on the coverage of such losses because the coverage of expected losses should be ensured by specific reserves for identified losses. A bank's assets and claims that are included in deduction items pose a potential threat to the bank. They are known to run contrary to the basic principles of sound banking and are contracted under unfavorable conditions, or their benefits to the bank are questionable. Hence, it is necessary to deduct them from the bank's capital in order to report the amount of capital really available for the coverage of unexpected losses. The same principle was applied in determining deduction items from the core, supplementary and risk-based capital of a bank.

Supplementary Capital Calculations

Contrary to core capital components, the component parts of supplementary capital have been partly changed mostly in order to adjust Croatian regulations to the standards of the Basel Committee on Banking Supervision.

The differences in the component parts of supplementary capital according to the previous and new regulations are illustrated below.

The Component Parts of Supplementary Capital	
Decision of 1993	Decision of 1999
Specific reserves for unidentified losses	Specific reserves for unidentified losses (not exceeding 1.5 percent of risk-weighted assets)
Specific investments in banks	Hybrid instruments
Funds from the issuance of own long-term securities	Subordinated instruments

A comparison between the previous and new regulations stipulating the calculation of supplementary capital shows that deduction items have also been changed, as illustrated below.

Deduction Items from Supplementary Capital	
Decision of 1993	Decision of 1999
	Specific reserves for unidentified losses exceeding 1.5 percent of risk-weighted assets
	Amount of subordinated instruments exceeding 50 percent of core capital
	Claims and contingent liabilities secured by hybrid or subordinated bank instruments up to the amount these instruments are included in supplementary capital

Risk-Based Capital

New regulations redefined deduction items from gross risk-based capital. The deduction item “Direct and indirect investment in banks” now includes all direct and indirect investment not only in shares, but also investments in other financial instruments included in another bank’s risk-based capital, i.e. hybrid and subordinated instruments. Thereby, the same capital can be included in the risk-based capital of only one bank, and not into risk-based capital of several banks.

The differences in items deducted from risk-based capital between the old and new regulations are presented below.

Deduction Items from Core Capital	
Decision of 1993	Decision of 1999
Investment in equity participation in banks and savings banks	Direct and indirect investment of a bank and legal entities under direct or indirect, full or majority bank ownership, into shares and other financial instruments which are included in another bank’s risk-based capital
Amounts of loans granted to members of the bank’s management and supervisory board, its procurators, and members of their immediate families without unanimous approval of the bank’s supervisory board members	Claims on and the contingent liabilities to legal entities under direct or indirect, full or majority bank ownership provided that these claims or contingent liabilities arise from conditions which are more favorable than conditions routinely offered by the bank, or more favorable than conditions found on the financial markets for comparable operations, or if these conditions are not in line with the principles of safe and sound banking practices
	Claims on and the contingent liabilities to legal entities under direct or indirect, full or majority ownership of: <ul style="list-style-type: none"> – bank’s shareholders with 5 or more percent of voting shares in the bank’s general assembly – members of the bank’s management and supervisory board and its procurators – persons who concluded with the bank a contract on work under special conditions – spouses, unmarried partners, children and adopted children of the above stated persons (in the first three indents) – provided that these claims or contingent liabilities arise from conditions which are more favorable than conditions routinely offered by the bank, or more favorable than conditions found on the financial markets for comparable operations, or if these conditions are not in line with the principles of safe and sound banking practices

Amounts of loans granted to members of the bank's management and supervisory board, its procurators and members of their immediate families under conditions which are more favorable than conditions normally found on the market	Claims on and the contingent liabilities to:
	<ul style="list-style-type: none"> – bank's shareholders with 5 or more percent of voting shares in the bank's general assembly – members of the bank's management and supervisory board and its procurators – persons who concluded with the bank a contract on work under special conditions <p>spouses, unmarried partners, children and adopted children of the above stated persons (in the first three indents) regardless of whether or not the individual was considered an individual retailer or a natural person, if these claims or contingent liabilities arise from conditions which are more favorable than conditions found on the financial markets for comparable operations, or if these conditions are not in line with the principles of safe and sound banking practices</p>
	Claims and contingent liabilities secured by shares of banks which are not listed in the official stock exchanges

Risk-Weighting of Assets and Risky Off-Balance Sheet Items

Major changes in the system of risk-weighting of assets and risky off-balance sheet items from the old to new regulations are as follows:

- the basis on which prescribed weights are applied has been changed (it now consists of placements reduced by specific reserves for identified losses arising from placements, whereas it previously consisted of gross placements);
- risk-weights have been changed;
- credit conversion factors for off-balance sheet items have been introduced; these items are first converted to credit equivalent amounts, and risk-weights for the weighting of assets are then assigned to converted amounts.

Differences in the method of determining risk-weighted assets which serve as the basis for calculating the capital adequacy ratio are presented below.

Risk-Weighting of Assets	
Decision of 1993	Decision of 1999
Basis for assignment of risk-weights	
Placements not reduced by specific reserves for identified losses arising from placements	Placements reduced by specific reserves for identified losses arising from placements
Risk-weights (%)	
0, 10, 20, 50, 75, 100, 200, 300	0, 20, 50, 75, 100
Credit conversion factors for off - balance sheet items (%)	
Not stipulated	0, 20, 50, 100

It should be mentioned that capital adequacy regulations started to be implemented at the same time as the regulation on the method of forming specific reserves for identified losses which stipulates that these reserves are recorded on the assets side as a value adjustment. This means that all active risky items are reduced by the amount of specific reserves for these items. This obviously directly affects the amount of risk-weighted assets (which is lowered), consequently affecting also the capital adequacy ratio (which is increased) because amounts already reduced are being weighted. This is justified because the formation of specific reserves causes the reduction of risk-weighted assets, but simultaneously leads to the reduction of risk-based capital because specific reserves are formed by debiting expenses. This results in a decreased profit, which a bank could (if reserves were not formed) otherwise use to increase its capital. Specific reserves were previously reported on the liabilities side, which resulted in a reduction of capital, but not of risk-weighted assets.

The procedure of risk-weighting itself has been changed. Not all assets and risky off-balance sheet items are weighted, but only those which are not deducted from capital (any form of capital). It is thereby avoided that a single financial instrument is twice included in the capital adequacy calculation, once as a reduction of capital and once as a component of risk-weighted assets, i.e. as their increase, which would result in the incorrect calculation of the capital adequacy ratio.

The change in risk-weights applied to balance sheet items is also important. Its aim was to adjust the regulations to the standards of the Basel Committee on Banking Supervision. Previous risk-weights 0, 10, 20, 50, 75, 100, 200 and 300 percent have been replaced by 0, 20, 50, 75 and 100 percent. Risk-weights 200 and 300 percent, applied to big and maximum loans to and claims on bank's shareholders with more than 5 percent of voting shares in the bank's general assembly, have been eliminated. This change has resulted in reduced risk-weighted assets since these balance or off-balance sheet items are no longer being doubled or tripled, which considerably diminishes their contribution to the increase in total risk-weighted assets.

As mentioned earlier, the method for including risky off-balance sheet items in risk-weighted assets has also been changed. Up to now, balance and off-balance sheet items were treated equally in the calculation of risk-weighted assets. Amounts of all financial instruments were multiplied by adequate grades of risk, which resulted in risk-weighted amounts. By contrast, according to new regulations, all categories of risky off-balance sheet items are first converted to credit risk equivalent amounts by the use of credit conversion factors. Like assets, amounts thus obtained are then weighted by adequate degrees of risk, depending on the characteristics of the borrower and collateral instrument.

This procedure appears justified because it takes into account the difference between the risk faced by a bank after it has already placed its funds with a borrower, and the risk arising from engaging the bank's own funds in the case that its client, i.e. its potential borrower, fails to fulfill his contractual obligations to his business partner. In the first case, the bank has already taken a risk that the funds it has placed may not be returned, while in the second case the risk is only potential. This explains why different procedures are applied in including balance and off-balance sheet items in total risk-weighted assets.

Furthermore, pursuant to the Decision on the Methodology for Calculating Capital Adequacy and Risk-Weighted Assets of Banks, each risky off-balance sheet item now receives a credit conversion factor according to the type of financial instrument.

The procedure applied to off-balance sheet items has also led to a reduction of risk-weighted assets because each risky off-balance sheet item which is multiplied by the credit conversion factor lower than 100 percent is reduced twice. First, it is reduced in the process of conversion, and second, it is reduced in risk-weighting (provided, of course, that risk-weight applied is below 100 percent).

The Decision on the Classification of Placements and Risky Off-Balance Sheet Items and the Assessment of Bank Exposure (*Narodne novine*, Nos. 32/99 and 64/99), in force since April 1, 1999, replaced the corresponding Decision enacted in 1993.

The classification of placements in risk categories (A to E) is more detailed according to the new Decision, and the two decisions significantly differ in certain important elements. These differences are summarized below.

Criteria for the Classification of Placements in Risk Categories

According to the previous Decision, the only criterion applied in the classification of placements in risk categories was the borrower's timeliness in meeting his obligations to the bank (objective criterion), expressed as the number of days of default on payment obligations. This criterion still exists in the new Decision, but two new criteria have been added. These are:

- the borrower's creditworthiness (subjective criterion)
- collateral quality.

Pursuant to the new Decision, collateral instruments are classified according to their quality into three groups:

- first class collateral instruments
- adequate collateral instruments
- other high quality collateral instruments.

For a particular placement to be classified into the adequate risk category, usually all three classification criteria have to be met at the same time. Exceptionally, an individual placement may be classified (to risk category A) solely on the basis of first class or adequate collateral instruments, regardless of subjective and objective classification criteria established for a particular borrower.

Regarding the application of criteria related to collateral instruments, a transition period extending to September 30, 2000 was stipulated for the classification of placements granted prior to this Decision coming into force. These placements need not fulfill this criterion until the stated date.

The Rates of Specific Reserves for Identified Losses Arising from Placements

The previous Decision prescribed fixed rates for specific risk categories applied in the calculation of specific reserves for identified losses arising from placements, whereas the new Decision prescribes a range of these rates. Within the range prescribed for a specific risk category, a bank applies its policies to determine the rates of specific reserves for placements granted to a single borrower. An overview of these rates is given below.

The Classification of Placements and Risky Off-Balance Sheet Items and the Assessment of Bank Exposure

a) Relates only to claims based on interest income which are being reclassified from category A or B into category C, D, or E (suspended income). Reserves are not calculated for claims based on directly excluded interest income because they are directly reported in off-balance sheet records, and are recognized as income only after collection.

Specific Reserve Rate, in %						
Risk category	Decision of 1993			Odluka iz 1999.		
	Type of claim			Type of claim		
	Principal	Interest	Fee	Principal	Interest	Fee
A	0	0	0	0	0	
B	25	25	25	10 – 25	10 – 25	
C	50	100	100	25 – 60	100 ^{a)}	
D	75	100	100	60 – 90	100 ^{a)}	
E	100	100	100	100	100 ^{a)}	
Claims based on non-interest income after 60 days following the maturity date (not classified into risk categories)						100

Claims Based on Accrued Income

In accordance with the previous Decision, accrued interest and non-interest income were included in the income statement on an accrual basis regardless of the borrower's risk category. For claims based on interest and non-interest income against borrowers classified into risk categories B to E, specific reserves were formed by debiting the bank's expenditures (25 percent for category B, and 100 percent for categories C to E). The effect of this income on the income statement was thus partially or fully neutralized.

The new Decision differently stipulates the classification of claims based on accrued income, the formation of specific reserves for losses arising from these placements, and the recognition of income in the income statement.

Claims based on non-interest income (fees/charges) are not classified into risk categories. Instead, for all such claims which are not settled within 60 days from the due date, specific reserves are formed in the 100 percent amount by debiting the bank's expenditures.

By contrast, claims based on interest income are relegated to risk categories, and are (not) variously included in the income statement.

Interest income owed by borrowers classified into risk category A or B are included in the income statement on an accrual basis. For claims on borrowers classified into risk category B, specific reserves are formed, amounting to between 10 and 25 percent. These reserves are cancelled (credited) upon repayment of the claim. If the claim is not repaid, it is classified into one of the risk categories from C to E and at the same time reserves are formed in the amount covering the difference up to 100 percent of the claim (if the claim is reclassified from category B to a lower category), or in the amount of 100 percent of the claim (if they are directly reclassified from category A to category C or lower). Such a claim is then transferred from balance to off-balance sheet (suspended income), where it remains until it is either collected or written-off.

Interest income owed by borrowers classified to risk categories C to E is not included in the income statement on an accrual basis, but is directly recorded as claims in off-balance sheet records (excluded income). Since these claims are recorded on a cash basis, formation of specific reserves for claims based on this income is obviously not required.

The Assessment of Bank Exposure to Credit Risk

The issue of bank exposure to credit risk was previously addressed in the Decision which stipulated the method of risk-weighting of assets and calculation of capital adequacy (Decision on the Conditions for Applying the Provisions of Article 18 of the Law on Banks and Savings Banks). This issue is now dealt with in the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, Nos. 32/99 and 64/99).

As before, limitations on exposure to credit risk are set forth as the ratio between bank's placements and its risk-based capital. Similarities and differences between former and present regulations are presented below.

Limitations on Credit Risk Exposure			
Previous regulations	Percent ^{a)}	New regulations	Percent ^{a)}
Individual placement to a single borrower (large loan)	more than 20	Total placements to a single borrower (large exposure)	more than 10
Individual placement to a single borrower (maximum loan)	max. 30	(not stipulated)	
Total placements to a single borrower	max. 30	Total placements to a single borrower	max. 25
Total large and maximum loans	max. 200	Total amount of all large exposures	max. 400
Total placements to a single shareholder with more than 5 percent of the bank's shares	max. 5	Total placements to a single shareholder with more than 3 percent of the bank's shares	max. 5
Total placements to all shareholders which individually own more than 5 percent of the bank's shares	max. 30	Total placements to all shareholders which individually own more than 5 percent of the bank's shares	max. 25

a) Ratio between loans and other placements, and risk-based capital.

As can be concluded from the table above, the new regulations are more restrictive regarding limitations on credit risk exposure. This is especially true if we take into account the fact that, for the purposes of assessing exposure, a *borrower* is defined as a single person or several related persons (as defined by the Banking Law and the Law on Companies).

Assessment of all types of credit risk exposure to a group of related persons (where a group of related persons is treated as a single client) is the most important difference in this area compared with previous regulations (The Law on Banks and Savings Banks included related persons only for the purpose of setting limitations on exposure to the bank's shareholders).

The Decision on the Amount and Method of Forming Specific Reserves to Ensure Against the Potential Losses of Banks (*Narodne novine*, No. 32/99) differs in two important elements from the previous Decision. These elements are:

- It explicitly stipulates that specific reserves to cover identified losses arising from risky assets are recorded as value adjustments of assets. The result of this provision is that the balance sheet total is reduced by the amount of these reserves.

The previous Decision did not contain this or a similar provision and (in accordance with the previous Chart of Accounts for Banks) reserves were recorded on the liabilities side of the balance sheet as a specific form of reserves, while nominal amounts of risky placements were recorded as assets.

The Formation of Specific Reserves to Ensure Against the Potential Losses of Banks

- The basis and rate for calculating specific reserves to cover unidentified losses arising from placements have also been changed.

In accordance with the prior Decision, these reserves were formed at the rate of 0.5 percent of total placements and risky off-balance sheet items classified into risk categories A to E. By contrast, the new Decision stipulates that these reserves shall at a minimum equal 1 percent of placements and risky off-balance sheet items graded A, less placements with the Croatian National Bank, the Republic of Croatia and any government agency whose debt is guaranteed by the budget of the Republic of Croatia.

Bank Investment in Fixed Assets and Equity Participation

Limitations on bank investment in fixed assets and equity participation were formerly prescribed by the Law on Banks and Savings Banks. However, the Banking Law does not contain specific provisions regarding this issue, but authorizes the Croatian National Bank to prescribe these limitations via its regulations.

Consequently, the Croatian National Bank enacted the Decision on Limiting Bank Investment in Fixed Assets and Equity Participation (*Narodne novine*, Nos. 38/99 and 64/2000), whereby it limited bank investment in fixed assets and equity participation as it was previously prescribed by the Law on Banks and Savings Banks (total investment may not exceed 70 percent of the bank's risk-based capital, and investment excluding equity participation may not exceed 30 percent of the bank's risk-based capital).

Contrary to previous regulations, fixed assets and equity participation in companies that a bank has acquired in the course of bankruptcy proceedings or seizure, as well as by activating collateral instruments in accordance with the Law on Seizure, are excluded from limitations on bank investment in fixed assets and equity participation during the first year of acquisition.

Reporting to the Croatian National Bank on Single Borrower Indebtedness with Banks to an Amount Exceeding Five Million Kuna

The limitation of 5 million kuna set forth by the Decision on Reporting to the Croatian National Bank on Single Borrower Indebtedness with Banks to an Amount Exceeding 5 Million Kuna (*Narodne novine*, No. 51/99) was determined by the Croatian National Bank pursuant to its authorization determined in the Law (Article 49). The Decision regulating these issues existed before and almost no changes have been introduced by the new Decision. Bearing in mind the justifiability of this reporting, it was necessary to make formal legal adjustments to the provisions of the Banking Law.

In accordance with this Decision, a bank is obliged to report to the Croatian National Bank, within 15 days upon the end of the reporting period, on all borrowers whose indebtedness has at any moment during the reporting period (quarter) exceeded 5 million kuna. The stated amount also includes contingent liabilities taken over by the bank for the account of the borrower – the bank's client. A borrower is either a single person or several related persons.

Should it be established on the basis of these reports that a single borrower's indebtedness to several banks exceeds 5 million kuna, the Croatian National Bank shall notify all other banks of this since this information may prove to be valuable for the evaluation of the borrower's creditworthiness.

The Decision on the Form, Minimum Scope and Content of a Bank Audit and Audit Report (*Narodne novine*, No. 64/99) was enacted in June 1999 and replaced the Decision passed in 1998. It deals with the auditing of the financial reports of banks compiled for the purposes of the Croatian National Bank.

The Scope and Content of the Bank Audit and Audit Report

The main reason for the enactment of the new Decision was that upon the enactment of the new Banking Law, the form and content of a whole series of reports compiled by banks for the purposes of the Croatian National Bank have been stipulated. Therefore, besides formal legal adjustments to the Banking Law, it was also necessary to adjust the form and content of the audit to reports subjected to auditing.

According to the new Decision, the obligations of auditors consist of:

- providing a standard report on a conducted audit of the basic financial reports compiled by banks, which are intended for external users, together with the auditor's opinion;
- examining and assessing the truth and fairness of special financial reports compiled by banks for the purposes of the Croatian National Bank; for some reports, it is necessary to examine only their calculation accuracy and conformity with the basic financial reports, whereas for other reports it is also necessary to examine their truth and fairness;
- providing information on the effectiveness of the bank's business functions, the quality of its by-laws and their implementation.

The important difference between the old and new Decision is that the implementation of the new Decision should be easier since the form and content of reports subjected to audit and examination are entirely based on reports prescribed by the Law on Accounting and regulations enacted by the Croatian National Bank. This eliminates the difference in the scope and content of auditing regarding the standardized reports for the purposes of external users and reports compiled for the purposes of the Croatian National Bank which existed in the previous Decision.

This issue was not previously regulated by the Croatian National Bank regulation. However, in compliance with its authorities stipulated by the Banking Law, the Croatian National Bank enacted the Decision on the Form and Content of the Application for the Granting of Operating Licenses for Banks in September 1999 (*Narodne novine*, No. 99/99).

The Granting of Operating Licenses for Banks

This Decision regulates the form and content of the application for granting operating licenses in the following cases:

- the establishment of a new bank in the Republic of Croatia
- the establishment of a branch of a foreign bank in the Republic of Croatia
- the merger of two or more existing banks incorporated in the Republic of Croatia
- the operational adjustment of banks and savings banks enrolled in the Register of Companies prior to the enactment of the Banking Law to the provisions of that Law.

The purpose of the enactment of this Decision was to ensure that a uniform set of documents is required for granting operating licenses for banks and branches of foreign banks in the Republic of Croatia.

Conducting Supervision of Bank Operations

The Law on Banks and Savings Banks, except a few general provisions, did not in detail stipulate the supervision of bank operations. In view of the lack of adequate regulations, the Croatian National Bank issued two decisions, on the basis of its general authority prescribed by the Law on the Croatian National Bank, which regulated specific issues related to supervision and control of bank operations. The decision related to the supervision of the implementation of monetary and foreign exchange policies was enacted in 1992. The other decision, enacted in 1994, in generally regulated control (supervision) of bank and savings bank operations and the procedure for taking measures to eliminate established malfeasance and irregularities.

The Banking Law directly regulates the basic starting points for the supervision and control of bank operations, and provides the legal framework which establishes that certain issues are to be regulated in detail by Croatian National Bank regulations. Consequently, the Decision on Conducting the Supervision of Bank Operations was enacted in May 2000 (*Narodne novine*, No. 50/2000). This Decision superseded the decisions enacted in 1992 and 1994.

The new Decision regulates in detail the content and methods for conducting the supervision of banks, the procedure for compiling and submitting examination findings, measures for eliminating malfeasance and irregularities, and measures for improving bank performance, including the procedure for issuing orders prescribing the measures to be taken by the bank in order to eliminate the established malfeasance and irregularities and improve its performance.

Obviously, the period between the second half of 1998 and the first half of 1999 was characterized by intensive activities related to the enactment of laws and other regulations which were to be more adequate considering the present situation and needs of the banking system.

Over the last year, the Croatian National Bank and the whole banking system made considerable efforts in order to implement the prescribed regulations and analyze the effects of their implementation. Amending banking regulations is a dynamic process. The regulations have to be continually adjusted to the current environment, as well as to the guidelines of the European Community, depending on the degree of the system's preparedness.

In accordance with the above stated, and in order to get acquainted with and be prepared for the tasks ahead, the text below provides a brief overview of the new framework for the calculation of capital adequacy based on the documents issued by the Basel Committee on Banking Supervision.

1.2 New Capital Adequacy Framework

The basis for the assessment and calculation of capital adequacy was established by the Basel Committee on Banking Supervision (hereinafter: the Committee) in its 1988 Capital Accord. The BIS standard has indeed become the standard for banks worldwide. It has been adopted in over a hundred countries, and has considerably contributed to promotion of the safety and stability of the international banking system, as well as competitive equality among banks.

The merits of the existing standard are its relatively simple structure, which is fairly easily implemented, and substantial increases in the capital ratios of internationally active banks, which resulted from its implementation.

However, the financial world has evolved significantly over the last 12 years, so much so that the effectiveness of the current standard has been considerably diminished. For example, a bank's capital adequacy ratio, calculated in accordance with the existing standard, is not always a good indicator of the bank's financial condition. The existing principle of asset risk-weighting results, at best, in a rough assessment of economic risk, primarily because the degrees of credit risk are not sufficiently differentiated to adequately reflect the differences between exposures to credit risk in relation to different borrowers.

Such an approach to credit risk assessment encourages banks to arbitrage their regulatory capital requirement, for example through securitization.

Furthermore, since banks have developed innovative risk assessment and mitigation techniques, credit risk now occurs in more complex, less conventional forms compared with those recognized by the 1988 standard. Therefore, the calculation of the capital adequacy ratio by the existing method is less useful to persons which conduct bank supervision (hereinafter: supervisors). Efforts to introduce innovations in a simple weighting scheme (regarding the method applied by banks to manage and reduce risk) have been met with difficulties over the last 10 years. The existing standard has not kept pace with market changes.

Changes in the financial market pose a new challenge to formal supervision and its successful implementation. It is clear that the basic approach, coverage and methodology of formal supervision have to develop together with the method applied by financial institutions to manage their activities. With this in mind, supervisors should continue to develop a dynamic framework related to risks and the risk management process. The result of these efforts is the proposed new Capital Accord.

The proposal of the new standard was issued as a consultative paper in June 1999 with the purpose of inviting comments and views related to the new capital adequacy framework for banks, which will, if adopted, replace the existing 1988 Accord. The proposed framework is only a rough outline of the new standard, with numerous issues to be addressed and worked out.

The new framework would consist of three pillars:

- minimum capital requirements
- a supervisory review of capital adequacy
- market discipline.

The Committee recognizes that a modified version of the 1988 standard should remain the standardized approach to be applied by most banks, but it also recognizes that at the same time innovations should be introduced, such as the use of internal credit ratings and portfolio credit risk models which could contribute to a more accurate assessment of a bank's capital requirement in relation to its particular risk profile.

The new framework also proposes innovation in relation to the treatment of a number of important credit risk mitigation techniques. The number of risks which have to be included in capital adequacy calculations has increased. While the existing framework only reflects credit and market risks (the assessment of capital adequacy in relation to market risk is not yet explicitly dealt with in the CNB regulations), there are other risks inherent in banking,

such as interest rate risk and operational risk, which also have to be taken into account when assessing capital adequacy.

At the end of this section, it should be noted that in Croatia's relatively undeveloped and shallow financial market, the existing framework still provides satisfactory results.

1.2.1 The First Pillar – Minimum Capital Requirements

Minimum capital requirements will continue to be based on risk-based capital, risk measurement, and regulations which will determine levels of capital sufficient to offset these risks.

The major risks dealt with by minimum capital requirements are credit risk, market risk and other risks (including interest rate risk, operational risk and liquidity risk).

Credit Risk

Several approaches to setting minimum capital requirements were proposed: (1) a modified version of the existing method of asset and off-balance sheet items risk-weighting; (2) the use of bank's internal system of credit ratings, and (3) the use of portfolio credit risk measurement model.

1) The Modified Version of the Existing Method of Asset Risk-Weighting

The proposed modification of balance and off-balance sheet asset risk-weighting consists of the determination of risk weights by external institutions such as rating agencies, mainly in cases where the level of risk exposure for claims on sovereigns and central banks is determined. However, it is intended that such an approach will also apply to risk weighting of claims on banks and companies.

Claims on Sovereigns – Risk weights would be determined in relation to a specific country credit rating rather than the fact of whether this country is an OECD member or not. The major shortcoming of the existing approach lies in the fact that the level of risk is not determined in relation to actual credit risk but rather in relation to the criteria of OECD membership. The result is that a higher than necessary risk weight may be applied to potentially high credit quality countries simply because of their non-OECD status.

Under the new approach, only countries with the minimum rating of AA- under the methodology used by Standard&Poor's, could be eligible for a zero risk weight. Claims on countries rated A+ to A- would be eligible for a 20 percent risk weight. The underlying mechanism is: the lower the institution's rating, the higher the risk weight that is assigned to such an exposure.

It is interesting to note that claims on countries rated BB+ to B- would be risk weighted at 100 percent as would those on countries without a rating. At the same time, claims on countries rated below B- would be weighted at 150 percent.

It follows that countries without a rating would receive a better treatment than those with low rating. This approach to risk weights determination is questionable because countries without a rating may potentially also have low credit standing and still be eligible for a 100 percent risk weight.

Claims on Banks – The existing standard provides that all claims on banks incorporated in the OECD, and all short-term claims on banks outside the OECD may be risk weighted at 20 percent. Long-term claims on banks outside the OECD are risk weighted at 100 percent. If the current approach for sovereigns is replaced with another approach then the existing approach for claims against banks would no longer be appropriate. The Committee proposes two options:

The first option would be to give claims against banks risk weights based on the risk weighting applied to claims on the sovereign in which the bank is incorporated. Risk weights on exposures to these banks would be one category less favorable than that applied to the country. For example, if a claim on the bank's sovereign was weighted at 20 percent, a claim on that bank would be weighted at 50 percent. A risk weight of 150 percent would again be applied to claims against banks with credit ratings below B– in Standard&Poor's methodology.

The second option would be to use ratings assigned directly to banks by an external credit assessment institution. Most claims against banks would receive a 50 percent weighting. However, high rating claims (for example, AAA to AA-) would receive a 20 percent weight; claims against banks with a rating of BB+ to B– would receive a 100 percent weighting, and banks rated below B– would receive a 150 percent risk weighting.

There is some skepticism about the increased reliance on the ratings of external credit assessment institutions because each of these agencies has to meet strict criteria in order for their ratings to be reliable. The issue here is the definition of these criteria. At the moment, there are three international agencies with approved methodologies and adequate credibility whose credit assessments can be used for the determination of risk weights for specific types of assets. Obviously, the number of such institutions is insufficient. The Committee proposes the involvement of export insurance agencies in G-10 countries.

2) The Internal Ratings-Based Approach

An internal ratings-based approach would ensure that capital requirements for an individual bank reflect the bank's particular risk profile. It must be agreed that this approach to the qualitative and quantitative assessment of credit risk has its attractions, but it should be noted that it can be used only at sophisticated banks.

Before allowing the use of this approach, the supervisors should check whether the qualitative and quantitative standards for validating and monitoring banks' internal systems have been met or not. They also have to evaluate the methodologies linking capital requirements as security provisions to internal ratings.

For example, banks could assign to each internal rating category:

- standardized risk weights,
- an expanded system of risk weights or
- the Committee could define a capital charge which explicitly reflects internal ratings.

Most probably the Committee will opt for an approach that maps internal ratings to an expanded system of risk weights (still to be defined) for the purpose of determining capital requirements.

This approach to credit risk assessment has its advantages and disadvantages. The biggest advantage lies in the fact that it can be based on supplementary customer information which is usually out of reach of external rating agencies. Besides, an internal rating system may include all bank borrowers, whereas such a range cannot be covered by external agencies.

It should be noted that the Committee is hopeful that the banks will promote their internal ratings-based approach rather than place full reliance on external rating.

The disadvantage of this approach is mainly in the lack of homogeneity among the rating systems at different banks, as well as in the central role of subjective risk factors in assigning internal grades which makes comparability across institutions and countries more difficult.

Since prior supervisory approval would be necessary before banks could be allowed to use their internal rating systems for setting minimum capital requirements, a critical issue in considering such an approach is how supervisors should assess the overall adequacy of bank rating systems.

Supervisors should determine whether the number (range) of gradations is appropriate to distinguish meaningfully among the range of risks in the institution's exposures. In addition, criteria applied for assigning specific levels of risk to particular categories of assets should also be evaluated.

3) Portfolio Credit Risk Models

Portfolio credit risk models have been developed to capture the risk of the portfolio as a whole; an important characteristic not featured in the two previously mentioned approaches. The Committee supports the use of such models. However, significant hurdles, such as data availability and model validation still have to be overcome before these models could be used to an extent where they could play a more significant role in determining capital requirements.

Market Risk

Market risk is already contained in the existing standard; it was introduced by the 1996 amendments. Though no new models for the treatment of market risk for capital requirements calculations are being proposed, industry professionals are invited to give their suggestions for upgrading the existing models.

Interest Rate Risk

The Committee proposes to develop an interest rate risk capital charge for banks where interest rate risks are significantly above average ("outliers"). The key issues are how to recognize such banks and define the methodology for calculating interest rate risk.

Other Risks

The importance of risks other than credit and market risk for banks also has to be acknowledged. Therefore, rigorous control is essential to the prudent management of, and limiting exposure to, such risks. The growing impor-

tance of this risk category has led to the conclusion that such risks are too important not to be treated separately within the capital framework.

Among the possible approaches to assessing capital against operational risk, several options could be chosen which range from a simple benchmark to various modeling techniques.

A simple benchmark could be based on an aggregate measure of business activity such as gross revenue, fee income, operating costs, managed assets or total assets adjusted for off-balance sheet exposures, or a combination of these.

Another possibility would be to permit banks to use models to determine capital requirements against operational risk. For this option, particular regard would need to be paid to the quality of data, the extent to which the model responds to changes in exogenous variables, and the areas of operational risk not covered by the model. In view of the fact that at the moment only a few banks at the international level have a model that meets these criteria, it is clear that such models could only be used at a later stage of the use of the new capital adequacy framework.

Supervisory review of capital adequacy is an integral part of the proposed framework which should be viewed as complementary to the other two pillars (minimum regulatory capital requirement and market discipline). The goal of supervision is to ensure that a bank's capital is consistent with its risk profile and strategy and to enable early supervisory intervention should capital fall to levels insufficient to buffer risk.

It should be noted that the proposed approach should not be seen as a replacement for the assessment and validation made by the bank's management board nor as a means of transferring the responsibility for capital adequacy to bank supervisors. On the contrary, it is understandable that the bank's management board best knows the risks faced by the bank and that, together with the bank supervisory board, it is most responsible for the management of these risks.

According to this framework, supervisors would be need to evaluate how well banks assess their capital adequacy relative to their risks and to estimate if banks make adequate distinctions among various types of risks.

The Committee expects all internationally active banks to develop efficient internal procedures for the assessment of their capital needs. For this purpose, banks have various techniques at their disposal, such as the subjective assessment of risk, capital allocation methodology and internal models. Regardless of the chosen methodology, banks must be able to demonstrate at any given moment that the chosen internal capital targets are well-founded.

Supervisors currently review and evaluate a bank's capital adequacy through on-site and off-site supervision and reports by internal and external auditors. Supervisors are also expected to analyze a bank's internal assessment of capital requirements and comment on the level set by the bank. When assessing capital adequacy, supervisors need to take into consideration numerous factors, including a bank's risk appetite and its track record in managing risk, the nature of the markets in which it operates, the quality, reliability, and vol-

1.2.2 The Second Pillar – Supervisory Review of Capital Adequacy

atility of its earnings, as well as its compliance with the principles of the appropriate evaluation of balance sheet items, the use of accounting standards, the diversification of its activities, and the bank's relative significance in domestic and international markets.

1.2.3 The Third Pillar – Market Discipline

At a time when the operations of the biggest world banks are becoming more complex, it seems that supervisors almost have no other alternative than to rely even more on market discipline bolstered through enhanced disclosure by banks. Thus, market discipline would take over a part of the supervisory burden. This would be possible only for banks, primarily the largest banks which rely considerably on unsecured obligations, i.e. market sensitive obligations.

Market discipline helps reinforce capital regulation and in a certain way promotes supervisory efforts towards the safety and soundness of banks and the entire financial system. It can serve as motivation to banks to maintain a strong capital base as security against potential losses arising from their risk exposure. The Committee believes that the promotion of market discipline is in the interest of supervisors as it supports the safety and stability of the banking system. However, the way in which the market affects bank behavior depends on an individual bank's reliance on financial markets as well as that bank's capital structure.

The effect of market discipline is reflected in changes in the approaches to sources of funds and/or changes in the risk premium for banks when undertaking new transactions and operations. Price volatility and the availability of required funds affect a bank's risk appetite and serve as a signal to market participants and supervisors of that bank's financial position.

Efficient market discipline calls for the publication of reliable and timely information to enable well-founded analyses and the assessments of bank risk profiles. Therefore, the Committee considers disclosures about capital levels, risk exposures and capital adequacy to be important in achieving a meaningful level of market discipline. These disclosures should be made at least once annually.

When compared with the existing standard, the new proposal may not seem to be offering significant innovations. This may be true to an extent, particularly in view of the fact that the definition of capital remains the same, with bank exposure being calculated and risk exposure assessed in order to determine the level of needed capital. In addition, movements of bank capital are monitored through on-site and off-site supervision.

However, the difference between these two standards is in the focus of observation. While the existing standard provides that a universal capital adequacy ratio (8 percent of risk-weighted assets) must be observed, especially in relation to banks with high stakes in the international financial markets, the proposed standard focuses on an individual bank and its capital. Attempts to lump all banks in together are discouraged; instead, each bank is viewed separately because of its specific and different risk profile.

Stress is also laid on a bank's own internal procedures and techniques for the assessment of the capital requirements needed to provide security against its

risk exposures. The minimum capital adequacy ratio will continue to be prescribed but only to serve as the minimum below which no bank's ratio will be allowed to fall; while some banks, should this be deemed necessary, will have to meet potentially higher ratios in relation to their level of risk. Therefore, banks are required to assess their capital requirement levels in relation to their risks, while supervision will then check the model used for the assessment of the capital adequacy ratio and verify that this ratio provides sufficient security for the bank's solvency.

If supervisors are satisfied with a bank's internal risk management process, then the most efficient and least expensive approach to supervision is that supervisors use the bank's internal system of classification and assessment, as well as other information submitted to the bank management. Obviously, banks' internal rating systems will have to be tested. As these improve, the process of supervision will change and switch from repeating the activities performed by the bank itself to providing constructive feedback to the bank regarding what can be done to improve its risk management system. This internal system is, together with the disclosure of data, the first line of defense against excessive risks.

It should be stressed that supervision and regulation – especially in large institutions – should focus less on detail, and more on the general structure and functioning of the risk management system. This is the most efficient way to achieve a safe and stable banking system, as well as the general stability of the financial markets. This is also the basic concept of the new standard.

Eventually, in the process of capital adequacy assessment, supervisors will start applying techniques which banks currently apply or will apply in evaluating their risk positions and the capital required against those risks. In the USA, large banks are already being encouraged to assess their capital adequacy in relation to objective and quantitative risk measures. These assessments will be evaluated during on-site supervision and will be one of the factors used in assessing creditworthiness and rating.

Finally, it should be stressed that bank supervision and regulation – especially regulation concerning bank capital – are necessarily dynamic and developing categories. The goal is to achieve a framework with relatively stable goals and general strategies, but which can change as bankers and supervisors learn and know more, as banking practices change, and as individual banks grow and change their operations and risk control techniques. This means that innovations in supervision and regulation should not be seen as one-time events, and that the regulatory framework should be flexible enough to allow the evolution of obsolete supervisory methods and the improvement in regulations at a pace set by fresh experience and the operational feasibility of individual solutions.

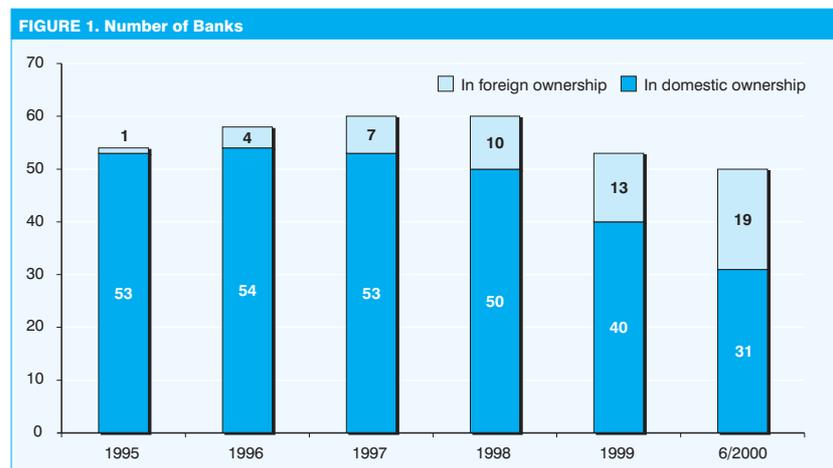
2 Analysis of Financial Institution Operations

2.1 Banks

On June 30, 2000, the banking system of the Republic of Croatia consisted of 50 banks, 19 of which were in majority foreign ownership. This shows that the number of banks in majority foreign ownership has been increasing from year to year.

The increase in the number of banks in majority foreign ownership resulted in a simultaneous increase in their share in total bank assets. This share increased from 3 percent at the end of 1997 to 40.2 percent at the end of 1999, and to 76.1 percent on June 30, 2000.

⇒ With respect to the ownership structure, banks in the Republic of Croatia are divided into domestic and foreign banks. A bank is classified as a domestic bank if it is in majority ownership of domestic legal and natural persons. The same rule is applied to the classification of a bank into banks in majority foreign ownership. The total number of banks is the sum of banks in domestic and foreign ownership. The Croatian National Bank statistics is the source of data on the number of banks.



For better understanding and simplified comparison, we have classified banks into four groups in the text below. The criterion for classifying the banks was the amount of their assets. As a result, Group I includes banks with assets exceeding 5 billion kuna, Group II banks with assets between 1 billion and 5 billion kuna, Group III banks with assets between 500 million and 1 billion kuna and Group IV banks with assets less than 500 million kuna.

⇒ In accordance with the selected criterion – the size of assets – the table shows the parameters for the classification of banks into individual groups. The reports submitted by banks in the Schedule BS (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data on the size (amount) of assets.

TABLE 1. Peer Groups of Banks, end of period, in thousand kuna

Group	Classification criterion	Dec. 1997	Dec. 1998	Dec. 1999	June 2000
I	Assets (A) > 5 000 000	4	4	4	4
II	1 000 000 < A < 5 000 000	15	19	15	15
III	500 000 < A < 1 000 000	9	9	5	6
IV	A < 500 000	32	28	29	25

1 Dubrovačka banka d.d. Dubrovnik

Group I is stable and includes four banks. In the second and the third quarter of 1998, Group I included one more bank¹ which fulfilled the criterion for classification into this Group. Therefore, this Group had five banks in the stated period. Slight changes occurred in the other three groups. In 1998, the assets of small and especially medium-size banks increased. As a result, these banks

were transferred to a higher group, i.e. the number of banks in Group II increased from 15 to 19. However, since bankruptcy proceedings were initiated against seven banks² in 1999, the number of banks in Group II decreased to the level recorded in 1997. In the first half of 2000, the number of banks in Group IV decreased due to one bank's transfer into Group III³, the initiation of bankruptcy proceedings against two banks⁴ and the withdrawal of one bank's operating license.⁵

2 Glumina banka d.d. Zagreb, Gradska banka d.d. Osijek, Ilirija banka d.d. Zagreb, Komercijalna banka d.d. Zagreb, Neretvansko-gospodarska banka d.d. Ploče, Promdel banka d.d. Zagreb, and Županjska banka d.d. Županja

3 Trgovačka banka d.d. Zagreb

4 Agroobrtnička banka d.d. Zagreb and Hrvatska gospodarska banka d.d. Zagreb

5 Krapinsko-zagorska banka d.d. Krapina merged with Privredna banka Zagreb d.d. Zagreb

The concentration in the banking system can also be monitored on the basis of the following parameters: the operating network, the share in assets and deposits and the Herfindahl index.

In this text, the operating network is analyzed on the level of counties and the changes in the number of branches and sub-branches and ATMs⁶. The number of branches and sub-branches slightly increased in 1998 (37 operating units or 4.7 percent) and in 1999 (15 operating units or 1.9 percent). In the first half of 2000, this number was reduced by 50 operating units or 6.1 percent. This reduction resulted from a decrease in the number of banks in the banking system (45 operating units) and a decrease in the operating units of several medium-sized regional banks (26 operating units) that was accompanied by the establishment of 21 new sub-branches of foreign banks.

2.1.1 Concentration in the Banking System

6 This analysis does not cover the operating network of banks against which bankruptcy proceedings were initiated in 1999.

The largest part of the operating network is concentrated in the City of Zagreb and the County of Zagreb, the County of Split-Dalmatia, the County of Istria and the County of Primorje and Gorski Kotar. The most significant expansion of the operating network took place in the County of Primorje and Gorski Kotar due to expansion of banks that have operated in that region and due to the entrance of banks that had not operated in that region before.

Counties	Dec. 1997	Dec. 1998	Dec. 1999	June 2000
County of Zagreb and City of Zagreb	167	166	166	149
County of Krapina-Zagorje	9	9	9	8
County of Sisak-Moslavina	31	30	27	25
County of Karlovac	19	19	20	19
County of Varaždin	22	24	26	24
County of Koprivnica-Križevci	27	26	25	22
County of Bjelovar-Bilogora	26	24	21	22
County of Primorje and Gorski Kotar	46	46	55	61
County of Lika-Senj	9	9	8	8
County of Virovitica-Podravina	18	18	17	16
County of Požega-Slavonia	16	16	15	14
County of Slavonski Brod-Posavina	12	12	12	13
County of Zadar	36	39	40	36
County of Osijek-Baranya	57	59	59	52
County of Šibenik-Knin	29	29	28	26
County of Vukovar-Srijem	16	18	21	20
County of Split-Dalmatia	93	104	108	101
County of Istria	79	83	86	83
County of Dubrovnik and Neretva	50	54	55	50
County of Međimurje	22	23	25	24
Total	784	808	823	773

↔ The total number of branches, sub-branches and installed ATMs of all banks in the Republic of Croatia is classified by counties. Banks are the source of data.

⇒ The total number of branches, sub-branches and installed ATMs of all banks in the Republic of Croatia is classified by counties. Banks are the source of data.

Counties	Dec. 1997	Dec. 1998	Dec. 1999	June 2000
County of Zagreb and City of Zagreb	71	89	181	218
County of Krapina-Zagorje	3	3	6	8
County of Sisak-Moslavina	2	2	6	6
County of Karlovac	5	7	12	17
County of Varaždin	4	12	16	19
County of Koprivnica-Križevci	7	10	12	13
County of Bjelovar-Bilogora	7	7	9	15
County of Primorje and Gorski Kotar	25	35	68	89
County of Lika-Senj	2	2	6	6
County of Virovitica-Podravina	2	3	7	7
County of Požega-Slavonia	3	3	4	4
County of Slavonski Brod-Posavina	2	2	4	5
County of Zadar	11	12	17	25
County of Osijek-Baranya	12	12	19	20
County of Šibenik-Knin	2	2	8	16
County of Vukovar-Srijem	3	3	4	4
County of Split-Dalmatia	9	14	31	53
County of Istria	41	48	80	80
County of Dubrovnik and Neretva	3	7	15	22
County of Međimurje	7	12	18	19
Total	221	285	523	646

In the observed period, the network of ATMs expanded significantly, from 221 ATMs at the end of 1997 to 646 ATMs in mid-2000. The largest absolute growth (147 ATMs) was recorded in the County of Zagreb (including the City of Zagreb), while the largest relative growth (4.1 percent) was recorded in the County of Split-Dalmatia. Substantial growth was also recorded in the County of Primorje and Gorski Kotar and the County of Istria. The basic reasons for such an expansion of the ATM network are the lower transaction costs compared with classic sub-branches and the availability of service 24 hours a day.

It can be expected that the ATM network will continue to expand in Croatia as well as that the volume of cash transactions conducted via ATMs will enlarge significantly.

The share of the largest banks in total assets and deposits is the next parameter that is used in the analysis of concentration.

7 Zagrebačka banka d.d. Zagreb and Privredna banka Zagreb d.d. Zagreb

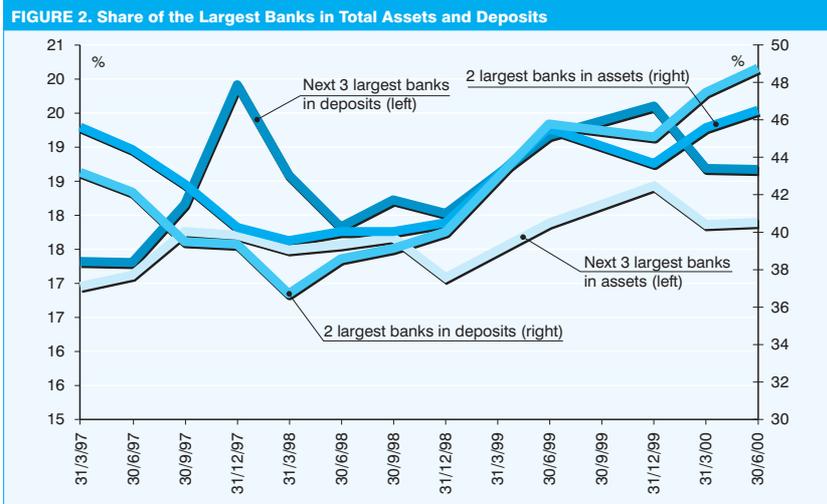
The share of the two largest banks⁷ in total assets of the banking system ranged between 39.6 percent and 46.5 percent in the observed period, while their share in total deposits ranged between 36.7 percent and 48.8 percent.

8 Splitska banka d.d. Split, Riječka banka d.d. Rijeka and Dubrovačka banka d.d. Dubrovnik

The share of the next three banks⁸ in total bank assets ranged between 17 percent and 18.4 percent in the observed period, while their share in total deposits ranged between 17.3 percent and 19.9 percent.

The share of medium-sized banks in total assets and total deposits increased during 1997 and resulted in a reduction of the share of the two largest banks.

The whole banking system experienced an outflow of deposits and a decrease in loans in the period from February to May 1999. The outflow of deposits from the two largest banks was less intensive and their share in total bank deposits increased. In the second half of 1999, deposits started to increase in the



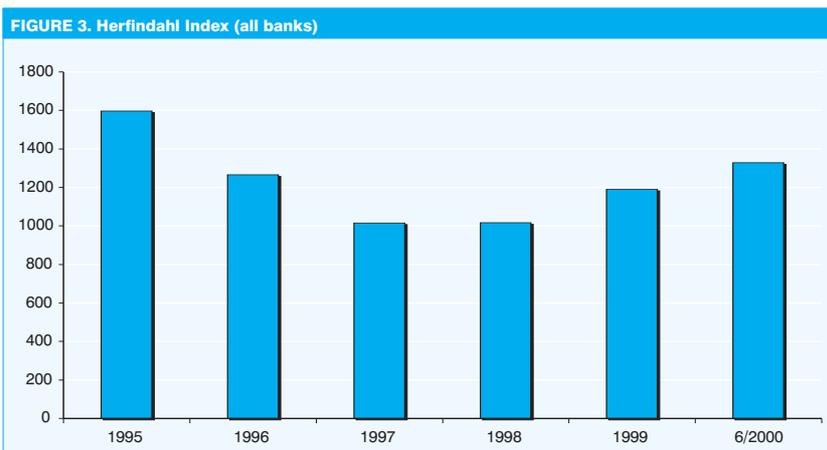
↔ The criterion for the selecting the two largest and the next three banks in the banking system is the size of their assets in the observed period. The share of the two largest banks (the next three banks) in assets is calculated as the ratio between the product of multiplication of assets of the two largest banks (the next three banks) and total assets of all banks, and stated in percent. These banks' share in the total deposits of the banking system is calculated in the same manner. The reports submitted by banks in the Schedule BS (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data on the amount of assets, while the Schedule BS/DEP (Bank Statistical Report – *Narodne novine*, No. 57/99) is the source of data on total deposits.

whole banking system and resulted again in a decrease in the share of the two largest banks in total deposits. The share of these bank increased again in 2000 as a result of the merger of Zagrebačka banka-Pomorska banka d.d. Split with Zagrebačka banka d.d. Zagreb.

The Herfindahl index is the next parameter that is used in the analysis of concentration.⁹

The amount of assets is used as a variable. The index level of 1600 recorded at the end of 1995 was the highest one in the observed period and indicates a moderate concentration of the system. The concentration decreased in the following years and it rose slightly again in 1999 and in the first half of 2000. The rise in the index in 1999 was above all conditioned by the initiation of bankruptcy proceedings for the stated banks, while the increase in the index recorded in the first half of 2000 resulted from the growth in assets of the two largest banks.

⁹ The index is calculated as the sum of the squares of each banks' share in the system and in the hypothetical example including only one bank, it would amount to the maximum of 10000. It should be noted here that the index does not increase linearly and that, for example, the level of the 2000 index does not mean that the concentration in the system amounts to 20 percent.



↔ This index is calculated for each bank on the basis of the following formula:

$$\left(\frac{\text{bank asset}}{\text{total assets of all banks}} \cdot 100 \right)^2$$

The reports submitted by banks in the Schedule BS (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data on the amount of assets.

2.1.2 Banks' Balance Sheet

10 The new methodology for submitting data by banks to the Croatian National Bank has been in use since June 30, 1999. The balance sheet and the income statement data for 1997 and 1998 are adjusted with the new methodology in order to make them comparable.

11 Decision on Banks and Savings Banks Reserve Requirements in Foreign Currency (*Narodne novine*, No. 88/98 and 7/99). This Decision ceased to apply on the day of the enactment of the new Decision (*Narodne novine*, No. 94/2000).

On June 30, 2000, total bank assets were 99.2 billion kuna, an increase of 5.67 billion kuna or 6.1 percent compared with the end of 1999, and an increase of 2.41 billion kuna or 2.5 percent compared with 1998.¹⁰ According to data as of June 30, 2000, total loans accounted for 48.6 percent of total assets. The investment portfolio of securities had the second-largest share in total assets, 13.2 percent, while deposits with banking institutions comprised 12.5 percent of total assets.

The share of total loans in total assets changed slightly in the observed period. The share of deposits with the Croatian National Bank in total assets rose from 5.4 percent at the end of 1997 to 9.5 percent in mid-2000 and was on an upward trend. This growth was directly related to a fall in deposits with banking institutions. Their share in total assets decreased from 16.7 percent at the end of 1997 to 12.5 percent in mid-2000. Such a movement was partially the result of the change in the CNB regulations¹¹ stipulating that banks are required to keep at least 50 percent of required reserves in accounts with the CNB.

There was also a continued increase in the share of Ministry of Finance treasury bills and CNB bills. Their share in total assets increased from 1 percent at the end of 1997 to 4.7 percent in mid-2000. Such a movement reflects that banks pursued a more cautious policy and directed their assets into safer placements and increased their liquidity reserves.

TABLE 4. Structure of Bank Assets, end of period, in million kuna and %

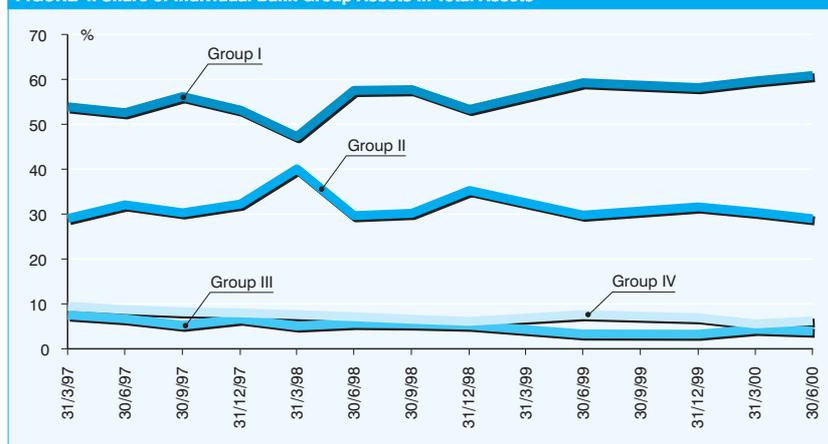
	Dec. 1997		Dec. 1998			Dec. 1999			June 2000		
	Amount	Share	Amount	Share	Change	Amount	Share	Change	Amount	Share	Change
1. Money assets and deposits with the CNB	5,989.4	6.7	6,412.5	6.6	7.1	9,733.5	10.4	51.8	10,664.5	10.8	9.6
1.1 Money assets	1,227.5	1.4	815.2	0.8	-33.6	1,245.9	1.3	52.8	1,252.8	1.3	0.5
1.2 Deposits	4,761.9	5.4	5,597.3	5.8	17.5	8,487.6	9.1	51.6	9,411.7	9.5	10.9
2. Deposits with banking institutions	14,848.0	16.7	11,459.9	11.8	-22.8	10,312.5	11.0	-10.0	12,350.8	12.5	19.8
3. Treasury bills and CNB bills	918.5	1.0	1,070.8	1.1	16.6	3,139.5	3.4	193.2	4,705.4	4.7	49.9
4. Trading portfolio of securities	134.6	0.2	288.5	0.3	114.4	1,067.8	1.1	270.1	1,476.1	1.5	38.2
5. Loans to financial institutions	1,249.8	1.4	854.8	0.9	-31.6	1,246.2	1.3	45.8	1,072.3	1.1	-14.0
6. Loans to other clients	41,632.0	46.8	49,591.8	51.2	19.1	45,391.5	48.5	-8.5	47,113.5	47.5	3.8
7. Investment portfolio of securities	15,564.8	17.5	17,747.1	18.3	14.0	15,477.1	16.5	-12.8	13,100.2	13.2	-15.4
8. Investments in subsidiaries and companies	3,325.1	3.7	2,788.5	2.9	-16.1	1,768.6	1.9	-36.6	2,422.1	2.4	36.9
9. Foreclosed and repossessed assets	230.8	0.3	340.6	0.4	47.6	447.2	0.5	31.3	507.7	0.5	13.5
10. Tangible assets and software (net of depreciation)	3,011.8	3.4	3,168.7	3.3	5.2	3,164.6	3.4	-0.1	3,246.1	3.3	2.6
11. Interest, fees and other assets	2,564.8	2.9	3,745.3	3.9	46.0	2,518.1	2.7	-32.8	3,376.2	3.4	34.1
12. Net of: Specific reserves for unidentified losses	599.0	0.7	691.3	0.7	15.4	743.6	0.8	7.6	843.8	0.9	13.5
Total	88,870.6	100.0	96,777.0	100.0	8.9	93,522.9	100.0	-3.4	99,191.1	100.0	6.1

† The share of each balance sheet item of assets in the total bank assets is calculated on the basis of data from the Bank Statistical Report (*Narodne novine*, No. 57/99 – Schedule BS) and the derived aggregated report of the same type on the banking system in the observed periods. The change in the balance is the percentage change in comparison with the previous period.

There was a continued decreased in the share of investments in subsidiaries and companies in the period from 1997 to 1999.

The shares of Group I and Group II in total bank assets were relatively stable in the observed period and on average amounted to 55.8 percent and 31.6 percent, respectively. Slight changes in the share in the first three quarters of 1998 were the result of the temporary transfer of Riječka banka from Group I into Group II (the first quarter) and Dubrovačka banka from Group II into Group I (the second and the third quarter). The shares of Group III and Group IV in total assets changed the least and experienced a slight continued decrease.

FIGURE 4. Share of Individual Bank Group Assets in Total Assets



Share of Individual Bank Group Assets in Total Assets

The share of assets of each stated bank group in total bank assets is calculated in the following manner. First, the total assets of all banks in a group are added up. Secondly, the sum thus obtained is divided by total bank assets. Shares are stated in percent.

The reports submitted by banks in the Schedule BS (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data on the amount of assets.

According to the data for mid-2000, deposits accounted for the largest share in total liabilities (63 percent). Other loans had the second-largest share, 14.6 percent, while capital comprised 11.5 percent.

In the observed period, the share of total deposits in total liabilities ranged between 60.54 percent at the end of 1998 and 63.03 percent in mid-2000. The structure of deposits was stable. In mid-2000, giro and current account deposits comprised 16.7 percent, savings deposits 22.8 percent, and time deposits 60.5 percent of total deposits.

Loans from financial institutions grew in absolute and relative terms until the end of 1999, and decreased substantially in the first half of 2000. The growth in the period until the end of 1999 was caused by an increase in borrowings from foreign financial institutions.

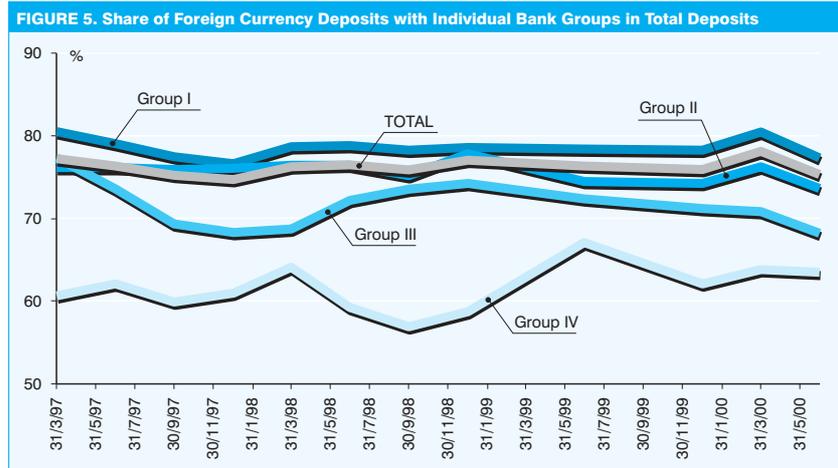
Foreign currency liabilities accounted for 64.6 percent of total bank liabilities in mid-2000, a decrease of 0.1 percent compared to 1999, an increase of 3.3

They are calculated in the same manner as in Table 4., i.e. the share of each balance sheet item of liabilities in the total bank liabilities is calculated on the basis of data from the Bank Statistical Report (*Narodne novine*, No. 57/99 – Schedule BS) and the derived aggregated report of the same type on the banking system in the observed periods. The change in the balance is the percentage change in comparison with the previous period.

TABLE 5. Structure of Bank Liabilities, end of period, in million kuna and %

	Dec. 1997		Dec. 1998			Dec. 1999			June 2000		
	Amount	Share	Amount	Share	Change	Amount	Share	Change	Amount	Share	Change
1. Loans from financial institutions	3,266.6	3.8	4,761.3	4.9	45.8	5,282.3	5.6	10.9	4,324.8	4.4	-18.1
1.1 Short-term loans	1,166.7	1.3	2,142.7	2.2	83.7	2,088.7	2.2	-2.5	1,080.6	1.1	-48.3
1.2 Long-term loans	2,099.9	2.4	2,618.5	2.7	24.7	3,193.7	3.4	22.0	3,244.2	3.3	1.6
2. Deposits	55,794.6	62.8	58,584.6	60.5	5.0	56,997.0	60.9	-2.7	62,523.1	63.0	9.7
2.1 Giro account and current account deposits	10,327.8	11.6	9,117.0	9.4	-11.7	9,216.9	9.9	1.1	10,410.6	10.5	13.0
2.2 Savings deposits	12,147.9	13.7	13,564.2	14.0	11.7	13,678.0	14.6	0.8	14,256.1	14.4	4.2
2.3 Time deposits	33,318.9	37.5	35,903.4	37.1	7.8	34,102.1	36.5	-5.0	37,856.4	38.2	11.0
3. Other loans	13,675.1	15.4	17,028.9	17.6	24.5	15,007.5	16.1	-11.9	14,469.3	14.6	-3.6
3.1 Short-term loans	1,454.8	1.6	1,435.1	1.5	-1.3	1,652.8	1.8	15.2	506.8	0.5	-69.3
3.2 Long-term loans	12,220.3	13.8	15,593.7	16.1	27.6	13,354.7	14.3	-14.4	13,962.6	14.1	4.6
4. Debt securities issued	7.7	0.0	1.1	0.0	-85.6	0.0	0.0	-95.9	1.9	0.0	4,215.6
4.1 Short-term debt securities issued	7.0	0.0	0.9	0.0	-87.6	0.0	0.0	-94.8	1.9	0.0	4,215.6
4.2 Long-term debt securities issued	0.7	0.0	0.2	0.0	-65.2	0.0	0.0	-100.0	0.0	0.0	0.0
5. Supplementary capital	485.8	0.5	492.8	0.5	1.4	343.1	0.4	-30.4	342.3	0.3	-0.2
5.1 Subordinated instruments issued	-	-	-	-	-	105.5	-	-	104.9	0.1	-
5.2 Hybrid instruments issued	-	-	-	-	-	237.5	-	-	237.5	0.2	-
6. Interest, fees and other liabilities	5,070.4	5.7	6,553.3	6.8	29.2	4,849.2	5.2	-26.0	5,336.5	5.4	10.0
7. Profit/loss for the current year	309.2	0.3	-1,671.6	-1.7	-	466.4	0.5	-	780.7	0.8	67.4
8. Capital	10,261.3	11.5	11,026.7	11.4	7.5	10,577.3	11.3	-4.1	11,412.5	11.5	7.9
Total	88,870.6	100.0	96,777.0	100.0	8.9	93,522.9	100.0	-3.4	99,191.1	100.0	6.1

⇒ The share of foreign currency deposits with an individual bank group in total deposits of the banking system is calculated in the following manner. First, foreign currency deposits for the relevant quarter of all banks included in one group are added up. Secondly, total deposits are added up. The sums thus calculated are mutually divided and multiplied by 100. The reports submitted by banks in the Schedule BS (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data on foreign currency deposits and total deposits.



percent compared to 1998, and an increase of 3.4 percent compared to 1997.

The share of foreign currency deposits in total deposits was even larger. Expressed in banking system terms, it amounted to 75.3 percent in mid-2000.

In mid-2000, the share of the foreign currency deposits of individual bank groups in total deposits ranged between 63.5 percent (Group IV) and 77.3 percent (Group I). The significantly smaller share of foreign currency deposits in Group IV resulted from larger share of kuna deposits in the structure of deposits (small enterprises and craftsmen) and the low level of household savings in that group of banks.

The change in the share of foreign currency deposits in total deposits in Group IV was directly related to the change in deposits by legal entities.

2.1.3 Bank Capital

⇓ The capital as one of items stated on the liabilities side of the aggregated balance sheet of all banks that is shown in the previous table (Table 5.) is presented in detail. In the observed periods, the share of each stated item in total capital of all banks is calculated as a ratio between each item and total capital of banks. The sums thus calculated are multiplied by 100. The change in the balance is the percentage change in comparison with the previous period.

Bank capital grew at the beginning of the observed period (1998) compared with that in 1997, then decreased in 1999, and again increased by the end of the first half of 2000. The reason for the decrease in capital was the reduction in the number of banks in 1999 (from 60 to 53) and the loss incurred in the banking system in 1998. In the first half of 2000, the growth in capital was caused by an increase in share capital and a continued increase in legal reserves.

According to data for mid-2000, share capital accounted for 73 percent of bank capital. The legal reserves had the second-largest in bank capital, 15.9 percent while reserves provided for by the articles of association and other capital reserves comprised 10 percent.

TABLE 6. Structure of Bank Capital, end of period, in million kuna and %

	Dec. 1997		Dec. 1998			Dec. 1999			June 2000		
	Amount	Share	Amount	Share	Change	Amount	Share	Change	Amount	Share	Change
1. Share capital	8,224.4	80.1	8,944.7	81.1	8.8	8,219.7	77.7	-8.1	8,330.0	73.0	1.3
2. Profit/loss brought forward	58.8	0.6	16.7	0.15	-71.6	73.7	0.7	341.0	127.1	1.1	72.6
3. Legal reserves	818.9	8.0	1,165.5	10.57	42.3	1,540.2	14.6	32.2	1,816.2	15.9	17.9
4. Reserves provided for by the articles of association and other capital reserves	1,159.2	11.30	899.8	8.16	-22.4	743.8	7.0	-17.3	1,139.1	10.0	53.2
Total	10,261.3	100.0	11,026.7	100.0	7.5	10,577.3	100.0	-4.1	11,412.5	100.0	7.9

The share of share capital in total capital gradually decreased in the observed period. The legal reserves grew continuously and their share increased from 8 percent in 1997 to 15.9 percent in mid-2000. On the other hand, the reserves provided for by the articles of association and other capital reserves decreased continuously until the end of 1999. Their share in total capital decreased from 11.3 percent in 1997 to 7.3 percent in 1999. They were on an upward trend again in mid-2000.

The risk-based capital of the banking system grew continuously and amounted to 4.8 percent in 1998. It rose by an additional 4.8 percent in 1999. The risk-based capital increased by 6.7 percent in the first six months of 2000.

The increase in the risk-based capital of the banking system resulted from an increase in the risk-based capital in Group I, Group II and Group III in 1998, in Group I in 1999, and in Group I, Group III and Group IV in the first half of 2000.

The risk-based capital of Group I increased the most (56 percent) compared to 1997. At the same time, the risk-based capital of Group III decreased the most (37.2 percent). The risk-based capital of Group IV decreased by 15.4 percent, while the risk-based capital of Group II increased by 8.4 percent. According to the structure, the core capital comprised 90.8 percent of the risk based-capital in mid-2000. A slight deviation from the average was recorded in Group IV.

TABLE 7. Changes in Risk-Based Capital, end of period, in million kuna and %

	Dec. 1997		Dec. 1998			Dec. 1999			June 2000		
	Amount	Share	Amount	Share	Change	Amount	Share	Change	Amount	Share	Change
Group I	3,798.1	37,5	3,800.8	35.78	0,1	5,089.8	45.7	33.9	5,924.8	49.9	16.4
Group II	3,308.0	32.6	4,001.4	37.7	21,0	3,834.5	34.5	-4.2	3,584.3	30.2	-6.5
Group III	896.9	8.9	1,021.0	9.6	13,8	492.6	4.4	-51.8	563.7	4.7	14.4
Group IV	2,131.4	21.0	1,796.5	16.9	-15,7	1,711.9	15.34	-4.7	1,803.1	15.2	5.3
Total	10,134.4	100.0	10,619.7	100.0	4,8	11,128.8	100.0	4.8	11,875.9	100.0	6.7

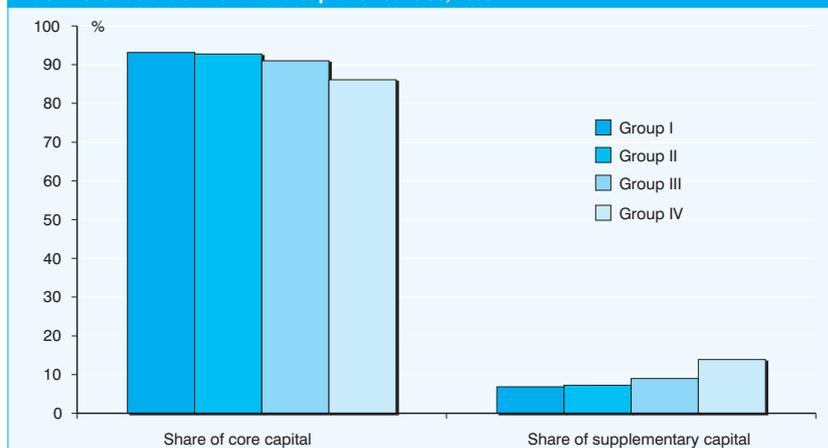
↔ The calculation of the risk-based capital is regulated by the Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 32/99) and the adequate instruction for its implementation (Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital – *Narodne novine*, No. 36/99).

The reports submitted by banks are the source of data on the risk-based capital, and the schedule for submitting these reports forms an integral part of the stated regulation (Schedule CAP).

Although the amount of core capital changed, Figure 7. shows that it grew continuously throughout the banking system (approximately 2.6 billion kuna compared with the basic year 1997 or approximately 29.2 percent).

The upward trend was conditioned by an increase in the core capital in Group I and Group II. Their share in total core capital amounted to about 77 percent

FIGURE 6. Structure of Risk-Based Capital on June 30, 2000

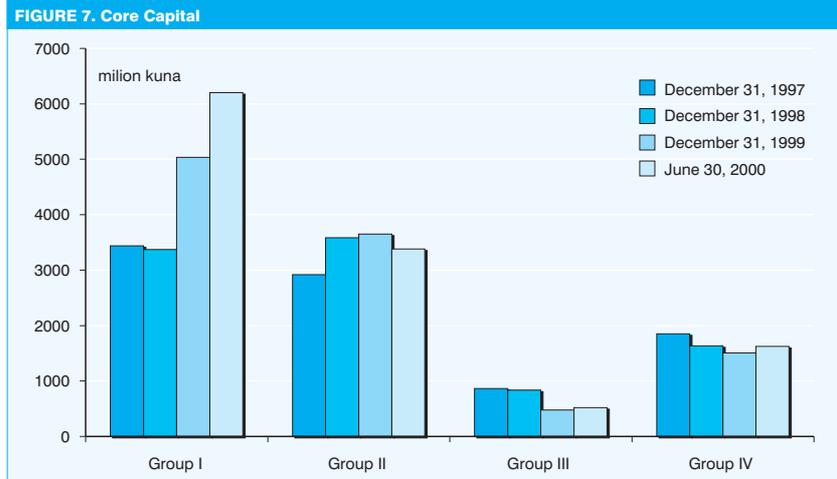


↔ This is calculated as the ratio between the sum of the amounts of core capital of all banks included in an individual bank group and the sum of the amounts of risk-based capital of these banks. The amount thus calculated is multiplied by 100. The shares of the supplementary capital of individual bank groups in their risk-based capital are calculated in the same manner.

The reports submitted by banks are the source of data on the core, supplementary and risk-based capital, and the schedule for submitting these reports (Schedule CAP) forms an integral part of the Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 36/99).

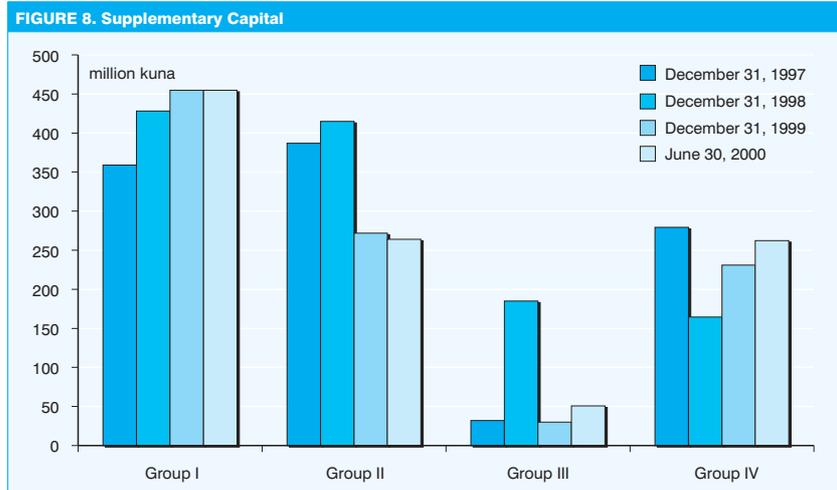
⇒ The calculation of the core capital is regulated by the Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 32/99) and the adequate instruction for its implementation (Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital – *Narodne novine*, No. 36/99).

This figure shows the changes in the core capital in the observed period, and the core capital of an individual bank group represents the sum of amounts of core capital of all banks included in a relevant group. The reports submitted by banks are the source of data. The schedule for submitting these reports forms an integral part of the stated regulation (Schedule CAP).



⇒ The calculation of supplementary capital is regulated by the Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 32/99) and the adequate instruction for its implementation (Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital – *Narodne novine*, No. 36/99).

This figure shows changes in the supplementary capital in the observed period, and the supplementary capital of an individual bank group represents the sum of the amounts of supplementary capital of all banks included in a relevant group. The reports submitted by banks are the source of data. The schedule for submitting these reports forms an integral part of the stated regulation (Schedule CAP).



in the observed period, whereas the share of Group I accounted for 44 percent.

The shares of individual bank groups in the core capital also changed and amounted to the following:

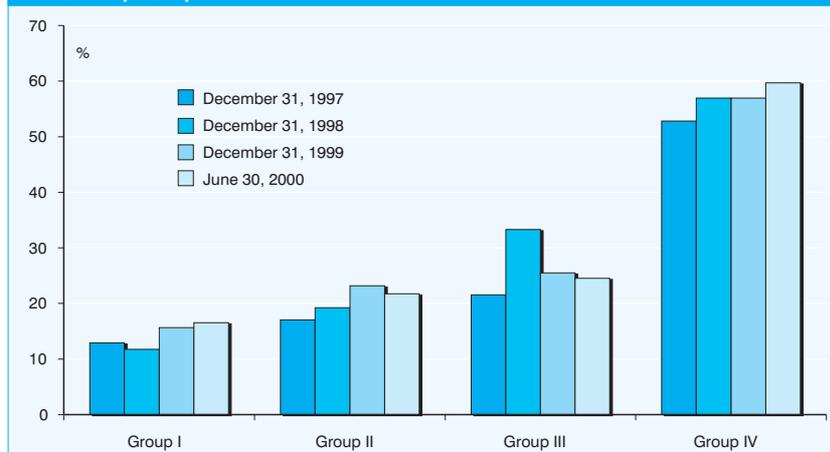
- at the end of 1997, Group I accounted for 37.9 percent, Group II 32.2 percent, Group III 9.5 percent and Group IV 20.4 percent of the core capital;
- at the end of 1998, Group I accounted for 35.8 percent, Group II 38 percent, Group III 8.9 percent and Group IV 17.3 percent of the core capital;
- at the end 1999, Group I accounted for 47.2 percent, Group II 34.2 percent, Group III 4.5 percent and Group IV 14.1 percent of the core capital;
- in mid-2000, Group I accounted for 52.9 percent, Group II 28.9 percent, Group III 4.4 percent and Group IV 13.8 percent of the core capital.

As opposed to the upward trend in core capital, supplementary capital changed significantly in the observed period.

The shares of individual bank groups in the supplementary capital changed and amounted to the following:

- at the end of 1997, Group I accounted for 34 percent, Group II 36.6 percent,

FIGURE 9. Capital/Deposits



- Group III 3 percent and Group IV 26.4 percent of the supplementary capital;
- at the end of 1998, Group I accounted for 35.9 percent, Group II 34.8 percent, Group III 15.5 percent and Group IV 13.8 percent of the supplementary capital;
- at the end of 1999, Group I accounted for 46.1 percent, Group II 27.5 percent, Group III 3 percent and Group IV 23.4 percent of the supplementary capital;
- in mid-2000, Group I accounted for 44.1 percent, Group II 25.6 percent, Group III 4.9 percent and Group IV 25.4 percent of the supplementary capital.

The ratio between the risk-based capital and deposits (Figure 9.) shows that opposed to smaller banks, the capital of larger banks participated significantly less in the sources of funds. In accordance with this, in mid-2000 the share of Group I was 16.5 percent, while the share of Group IV was 59.7 percent.

Group I and Group II shares of capital in the sources of funds rose in 1999. The increase in the capital/deposit ratio of Group I resulted from the growth in capital and deposits, whereas the increase in capital was larger. By contrast, the increase in the capital/deposit ratio of Group II resulted from the fall in capital and deposits, whereas the decrease in deposits was larger.

Changes in the capital adequacy ratio of the banking system enable us to monitor changes in the ratio between total risk-based capital and the risk-weighted assets of banks.

In mid-2000, the capital adequacy ratio¹² had the following values: 20 percent in Group I, 20.5 percent in Group II, 21.3 percent in Group III and 44.9 percent in Group IV. At the same time, the capital adequacy ratio of the banking system amounted to 22.1 percent.

Up until the first quarter of 1999, changes in the capital adequacy ratio of the four stated groups were characterized by a fluctuating downward trend. The ratio rose continuously in the following period in Group IV, and converged to the value of about 20 percent in other three groups.

Group IV preserved the highest capital adequacy ratio in the observed period – it amounted to an average of a very high 34.8 percent. The capital adequacy ratio of other banks ranged between 13.6 percent (on average) in Group I and 22.5 percent (on average) in Group III, while the capital adequacy ratio of

⇒ The ratio between the risk-based capital and deposits of each group is calculated in the following manner. First, the amounts of the risk-based capital of all banks included in a relevant group are added up. Secondly, all deposits of banks from a relevant group are added up. The sums thus calculated are mutually divided and multiplied by 100.

The calculation of the risk-based capital is regulated by the Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 32/99) and the adequate instruction for its implementation (Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital – *Narodne novine*, No. 36/99).

The reports submitted by banks are the source of data on the risk-based capital, and the schedule for submitting these reports forms an integral part of the stated regulation (Schedule CAP). Deposits used in this calculation are giro and current account deposits, savings deposits and time deposits. The reports submitted by banks in the Schedule BS/DEP (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data.

¹² Pursuant to the previous Law on Banks and Savings Banks (*Narodne novine*, No. 46/97 and 89/98) the minimum capital adequacy ratio amounted to 8 percent. Pursuant to the Banking Law (*Narodne novine*, No. 161/98) banks are obliged to maintain the minimum capital adequacy ratio of 10 percent. This provision came into force on January 1, 2001 (see Articles 39 and 112 of the Law).

⇒ The capital adequacy ratio is calculated as a ratio between the risk-based capital and the risk-weighted assets. In this figure, the capital adequacy ratio for each group is calculated in the following manner. First, the amounts of the risk-based capital of all banks included in a relevant bank group are added up. Secondly, the amounts of the total risk-weighted assets of all banks included in a relevant group are added up. The calculated sum of risk-based capital is divided by the sum of total risk-weighted assets and multiplied by 100.

The calculation of the risk-based capital is regulated by the Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 32/99) and the adequate instruction for its implementation (Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital – *Narodne novine*, No. 36/99).

The reports submitted by banks in the Schedule CAP are the source of data on the risk-based capital and they form an integral part of the stated Instruction.

The calculation of the total risk-weighted assets is regulated by the Decision on the Methodology for Calculating Capital Adequacy and Risk-Weighted Assets of Banks (*Narodne novine*, No. 32/99) and by the Instruction for the Uniform Implementation of Decision on the Methodology for Calculating Capital Adequacy and Risk-Weighted Assets of Banks (*Narodne novine*, No. 36/99).

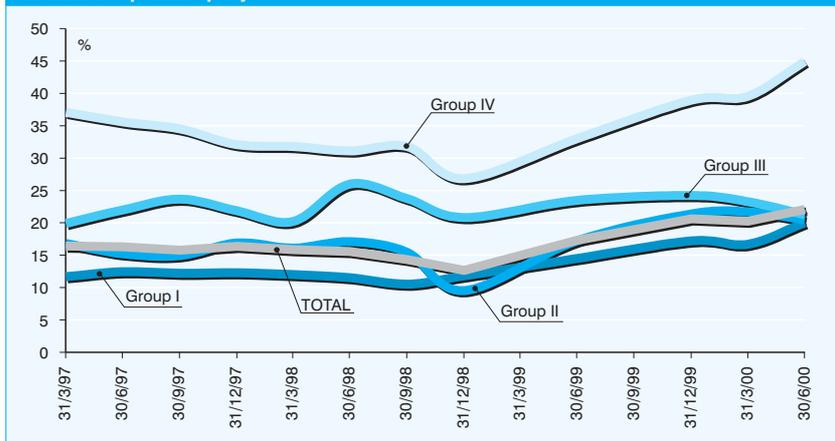
The reports submitted by banks in the Schedule RWA are the source of data on the risk-weighted assets and they form an integral part of the stated Instruction.

13 Decision on the Methodology for Calculating the Capital Adequacy and the Risk-Weighted Assets of Banks (*Narodne novine*, No. 32/99)

14 Specific reserves for unidentified losses are deducted from total placements.

2.1.4 Income Statement

FIGURE 10. Capital Adequacy



Group II amounted to an average of 16.9 percent. The capital adequacy ratio of smaller banks (Group IV) was on average substantially higher than the capital adequacy ratios of larger banks (e.g. in Group I). This was above all the result of the fact that smaller banks were mainly established in the preceding few years and did not fully make use of the potentials for planned growth.

In the observed period, the average capital adequacy ratio of the banking system was about 17 percent. After a steady fall until the first quarter of 1999, this ratio grew but also fluctuated. The reverse in the trend resulted from a change in the method for calculating risk-weighted assets¹³. Until mid-1999, these were calculated using the gross principle, and from that year onward they have been calculated using the net principle.¹⁴ The higher the provisions are, the smaller the risk weighted assets, and if there are no changes in the risk-based capital, the capital adequacy ratio will be higher.

Income and expenditures of the banking system decreased in 1999. This decrease was above all the result of their drop in Group I and Group III. Non-interest expenses decreased the most (67.8 percent) and were followed by decrease in loan loss provision expenses of 63.6 percent and non-interest income of 34.3 percent.

Total operating income was calculated on net principle (as a sum of net interest income and net non-interest income net of general administrative expenses and depreciation). The total operating income of the banking system increased by 9.2 percent compared to 1998. This increase was not followed by an increase in all groups of banks. Rises were recorded in Group I and especially in Group IV, amounting to 35.5 percent in Group I and four times that in Group IV. Income decreased in Group II and especially in Group III, 18.9 percent and 56.3 percent, respectively. In addition, interest income accounted for the largest share of income. Its share in total income increased from 65.9 percent to 72.5 percent compared to 1998.

Interest expenses accounted for the largest share of total expenses. Their share in total expenses rose from 27.2 percent in 1998 to 39.4 percent in 1999. General administrative expenses and depreciation had the second-largest share, rising from 22.1 percent in 1998 to 32.2 percent in 1999, despite their

TABLE 8. Income Statement, in million kuna

	Group I		Group II		Group III		Group IV		Total	
	1998	1999	1998	1999	1998	1999	1998	1999	1998	1999
1. Net interest income	1,767.3	1,860.2	1,898.6	1,403.5	346.0	184.0	362.6	445.6	4,374.4	3,893.4
1.1 Interest income	3,715.3	4,013.4	3,728.6	2,745.2	601.1	337.7	668.6	719.8	8,713.6	7,816.1
1.2 Interest expenses	1,948.0	2,153.2	1,830.1	1,341.7	255.1	153.6	306.1	274.2	4,339.2	3,922.7
2. Net non-interest income	921.1	1,258.7	470.7	495.3	149.5	71.1	88.4	210.4	1,629.7	2,035.5
2.1 Non-interest income	2,392.5	1,718.9	1,510.1	859.3	282.4	101.1	322.0	283.1	4,507.1	2,962.4
2.2 Non-interest expenses	1,471.4	460.2	1,039.5	364.0	132.8	30.0	233.7	72.7	2,877.4	926.9
3. General administrative expenses and depreciation	1,599.3	1,643.6	1,266.3	1,004.0	233.9	140.8	415.6	422.6	3,515.1	3,211.1
4. Net operating income before provisions	1,089.1	1,475.3	1,103.0	894.8	261.6	114.4	35.3	233.4	2,489.0	2,717.9
5. Loan loss provision expenses	578.6	753.2	4,031.9	812.9	343.0	165.6	258.5	166.7	5,212.0	1,898.4
6. Pretax income/loss	510.5	722.1	-2,928.9	81.9	-81.4	-51.3	-223.2	66.7	-2,723.0	819.4
7. Profit tax	94.3	80.0	61.9	11.6	10.4	4.9	13.2	8.4	179.8	104.8

absolute decrease of 8.7 percent. The share of loan loss provision expenses decreased from 32.7 percent to 19.1 percent, while the share of non-interest expenses decreased from 18.1 to 9.3 percent.

The decrease in non-interest expenses and in loan loss provision expenses had the largest influence on the increase in net income in 1999 (approximately 3.1 times that in 1998). This resulted mainly from decrease in expenses for commissions and fees and the fall in income from these items.

The banking system generated a profit in 1999 compared to 1998 when the banking system incurred a substantial loss of 2.7 billion kuna. Only Group I generated profit in 1998 and 1999, with growth of 41.5 percent over that in 1998. After incurring losses in 1998, Group II and Group IV generated profits in 1999, while Group III incurred a loss in the observed period.

TABLE 9. Structure of Income, in %

	Group I		Group II		Group III		Group IV		Total	
	1998	1999	1998	1999	1998	1999	1998	1999	1998	1999
1. Interest income	60.9	70.0	71.2	76.2	68.0	77.0	67.5	71.7	65.9	72.5
1.1 Interest income from loans	57.8	46.0	71.0	62.0	67.7	64.1	67.4	58.0	64.4	53.0
1.2 Interest income from deposits		7.3		5.3		5.5		5.2		6.4
1.3 Interest income from debt securities		12.6		4.3		4.2		3.7		8.7
1.4 Income from shares and other equity participations	0.6	0.5	0.1	0.0	0.0	0.1	0.0	0.2	0.3	0.3
1.5 Net balances on exchange rate fluctuations related to interest income		0.1		2.9		0.0		1.5		1.2
1.6 Interest income from previous years	2.5	2.4	0.1	0.2	0.3	0.0	0.1	0.2	1.2	1.4
1.7 Other interest income		1.1		1.5		3.1		2.9		1.5
2. Non-interest income	39.1	30.0	28.8	23.8	32.0	23.0	32.5	28.3	34.1	27.5
2.1 Non-interest income from commissions or fees	25.0	14.1	23.5	10.6	28.7	9.9	24.9	14.8	24.6	12.8
2.2 Net balance on exchange rate fluctuations related to non-interest income		0.0		0.0		0.0		0.0		0.0
2.3 Income/loss from calculated exchange rate fluctuations	-5.8	4.9	-10.1	-0.6	-10.1	2.8	-5.2	2.7	-7.6	2.8
2.4 Income/loss from purchase/sale of foreign exchange	10.2	5.1	7.8	4.7	8.9	4.8	8.9	8.4	9.1	5.3
2.5 Income/loss from purchase/sale of securities		3.0		0.0		-1.0		0.1		1.6
2.6 Other income	9.7	2.9	6.2	2.8	4.1	6.3	3.7	2.0	7.4	2.9
2.7 Extraordinary income	0.0	0.0	1.4	6.3	0.4	0.2	0.2	0.3	0.6	2.1
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

In the observed periods, each item from the reports is stated cumulatively for all banks and for an individual bank group on the basis of data from Bank Statistical Report (*Narodne novine*, No. 57/99 – Schedule IS). The total amount for each item is the sum of the same items stated in the reports. Total amounts are calculated both on the level of all banks and on the level of an individual bank group.

The share of each item of income in total income of an individual bank group is calculated as the ratio between the sum of amounts of the same items from reports of banks which are included in a relevant group (Bank Statistical Report – Schedule IS, *Narodne novine*, No. 57/99) and the total income earned by a relevant group. The sum thus calculated is multiplied by 100. The same principle is applied to the calculation made on the level of all banks, i.e. the amounts of the same items from reports of all banks are added up and expressed as the ratio between the sum thus calculated and total income earned by all banks in the observed period. The sum thus calculated is multiplied by 100.

Note

Blank areas in Table 9. relate to 1998 and reflect the change in the methodology for calculating individual items of income statement for 1999. The amounts of the missing parts are included in other items stated for 1998.

⇒ These are calculated in the same manner as in Table 9., i.e. the share of each item of expenditures (expenses) from the Income Statement of an individual bank group in total expenditures (expenses) of an individual group is calculated as the ratio between the sum of items from the report of each bank from a relevant group and total expenditures (expenses) incurred by a relevant group. The sum thus calculated is multiplied by 100. The same principle is applied to the calculation made for the banking system as a whole, i.e. the amounts of each item of expenditures (expenses) from the reports of all banks are added up, and expressed as the ratio between the sum thus calculated and total expenditures (expenses) incurred by the banking system in the observed period. The sum thus calculated is also multiplied by 100.

The reports submitted by banks in the Schedule IS (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data.

Note

Blank areas in Table 10. relate to 1998 and reflect the change in the methodology for calculating individual items of income statement for 1999. The amounts of missing parts are included in other items stated for 1998.

TABLE 10. Structure of Expenses, in %

	Group I		Group II		Group III		Group IV		Total	
	1998	1999	1998	1999	1998	1999	1998	1999	1998	1999
1. Interest expenses	34.8	43.0	22.4	38.1	26.4	31.3	25.2	29.3	27.2	39.4
1.1 Interest expenses on loans	33.2	10.5	21.9	13.1	25.8	8.3	24.8	8.1	26.3	11.1
1.2 Interest expenses on deposits		29.1		22.4		20.1		18.7		25.3
1.3 Interest expenses on debt securities	0.0	0.0	0.0	0.0	0.0	0.2	0.0	0.8	0.0	0.1
1.4 Premiums for the insurance of savings deposits	0.8	2.2	0.4	1.5	0.6	1.7	0.4	0.7	0.6	1.8
1.5 Net balances on exchange rate fluctuations related to interest expenses		0.5		0.6		0.0		0.4		0.5
1.6 Interest expenses from previous years	0.8	0.7	0.1	0.3	0.0	0.3	0.0	0.4	0.3	0.5
1.7 Other interest expenses		0.0		0.1		0.8		0.2		0.1
2. Non-interest expenses	26.3	9.2	12.7	10.3	13.8	6.1	19.3	7.8	18.1	9.3
2.1 Non-interest expenses for commissions and fees	8.8	3.1	6.9	5.1	8.0	2.7	7.0	3.0	7.8	3.8
2.2 Net balances on exchange rate fluctuations related to non-interest expenses		0.0		0.0		0.0		0.0		0.0
2.3 Other expenses	17.5	6.1	4.7	3.9	4.5	3.3	5.9	4.1	9.1	5.0
2.4 Extraordinary expenses	0.0	0.0	1.1	1.3	1.2	0.1	6.3	0.7	1.1	0.5
3. General administrative expenses and depreciation	28.6	32.8	15.5	28.5	24.2	28.7	34.2	45.1	22.1	32.2
3.1 Expenses for employees	15.6	20.4	7.9	14.7	12.8	17.2	17.5	22.5	11.6	18.4
3.2 Depreciation	2.2	2.7	1.8	3.3	3.4	3.3	4.3	5.4	2.2	3.2
3.3 Other expenses	10.7	9.7	5.8	10.5	8.0	8.3	12.5	17.3	8.2	10.6
4. Loan loss provision expenses	10.3	15.0	49.4	23.1	35.6	33.8	21.3	17.8	32.7	19.1
4.1 Provision expenses for identified losses	2.7	15.1	48.8	22.5	33.9	31.8	20.7	14.7	26.4	18.5
4.2 Value adjustment of investments in subsidiaries and companies	0.8	-1.8	0.3	0.4	1.4	0.9	0.1	0.9	0.9	-0.6
4.3 Value adjustment of investments in shares and equity participations in investment portfolio		0.2		0.0		1.3		-0.4		0.1
4.4 Provision expenses for unidentified losses	6.9	1.5	0.2	0.2	0.3	-0.2	0.5	2.5	5.4	1.1
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

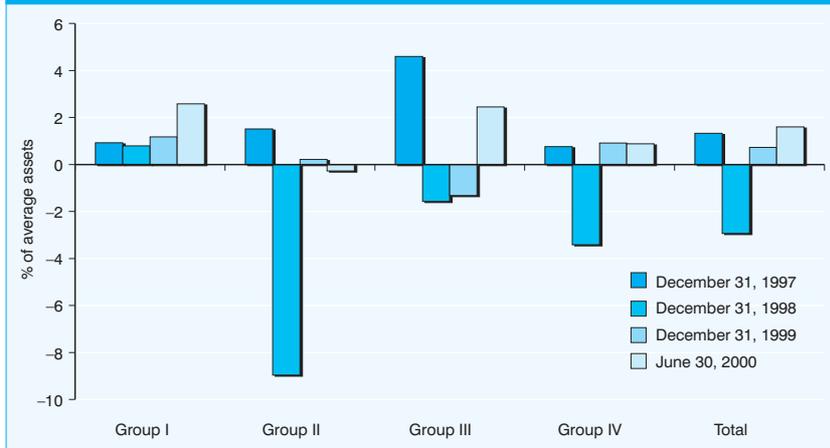
Despite disturbances experienced by the market in the first half of the year, the recovery of the banking system was evident throughout the whole of 1999. It should be pointed out that there was an absolute decrease in interest and non-interest income, mainly caused by the narrowing of the market and strengthening of competition among banks. Positive results achieved in the banking system were also contributed by an absolute decrease in general administrative expenses and depreciation that resulted from the introduction of restrictions in their operations, especially in Group II and Group III, and from a decrease (absolute and relative) in loan loss provision expenses.

2.1.5 Return Indicators

The average return on assets of the whole banking system was 1.6 percent in mid-2000. It rose by 0.9 percentage points compared to 1999 and 0.3 percentage points compared to 1997. At the same time, the average return on equity was 13.7 percent, an increase of 6.6 percentage points compared to 1999 and 0.3 percentage points compared to 1997. Since a loss was incurred in 1998, these indicators bear a negative sign.

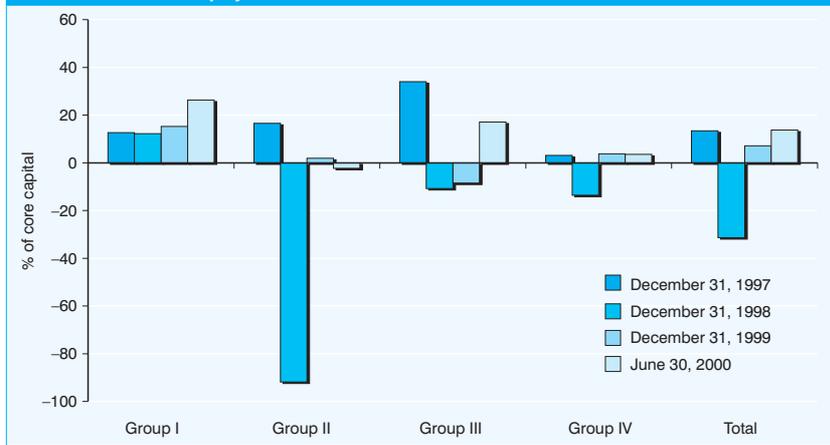
Expressed at the level of individual groups of banks, a fall in profit was evident in each of the four groups in 1998. Group II, Group III and Group IV reported operating losses and both of their indicators are in the negative, as opposed to Group I that generated profit in 1998. Group I reported positive returns in 1998 (0.8 percent on assets and 12.2 percent on equity). In contrast, the other groups were in the negative with drops in return on assets and equity of 9 percent and 91.9 percent in Group II, 1.6 percent and 10.8 percent in Group III and 3.4 percent and 13.6 percent in Group IV.

FIGURE 11. Return on Assets



↳ The ratio between after-tax income and the average assets for each bank group is calculated in the following manner. First, the after-tax income generated on a certain date by all banks included in an individual group is added up. Secondly, the amounts of average assets are added up. The sums thus calculated are mutually divided and multiplied by 100. The average assets are calculated as arithmetic mean of balance in assets at the beginning and at the end of period for which the average is calculated. The Schedule IS (Bank Statistical Report – *Narodne novine*, No. 57/99) is the source of data on after-tax income, while the Schedule BS (Bank Statistical Report) is the source of data on assets.

FIGURE 12. Return on Equity



↳ The ratio between the after-tax income and the average core capital for each bank group is calculated in the following manner. First, the after-tax income generated on a certain date by all banks included in an individual group is added up. Secondly, the amounts of average core capital are added up. The sums thus calculated are mutually divided and multiplied by 100. The average core capital is calculated as arithmetic mean of the balance in core capital at the beginning and at the end of period for which the average is calculated. The Schedule IS (Bank Statistical Report – *Narodne novine*, No. 57/99) is the source of data on aftertax income, while the Schedule CAP which forms the integral part of the Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital the Decision (*Narodne novine*, No. 32/99), passed on the basis of Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 32/99), is the source of data on core capital.

In 1999, both indicators recovered for all groups. This resulted from an increase in profit in Group I (226 million kuna or 54.31 percent), a decrease in losses in Group III (35.7 million kuna or 38.8 percent) and the recovery of losses and the generation of a profit of 70.3 million kuna in Group II and 58.3 million kuna in Group IV. In 1999, positive returns were achieved in Group I (1.2 percent on assets and 15.3 percent on equity), in Group II (0.2 percent on assets and 1.9 percent on equity) and in Group IV (0.9 percent on assets and 3.7 percent on equity). Losses, though less than in 1998, were made in Group III (1.3 percent on assets and 8.6 percent on equity).

Both indicators further improved during the first half of 2000. Positive returns were achieved in Group I (2.6 percent on assets and 26.3 percent on equity), in Group III (2.5 percent on assets and 17.1 percent on equity) and in Group IV (0.9 percent on assets and 3.5 percent on equity). The second Group incurred a loss¹⁵ (0.3 percent on assets and 2.3 percent on equity).

The main reason for such a development, especially in 1999, is a decrease in provisions for losses. Some banks decreased their provision expenses due to implementation of rehabilitation proceedings, the other went bankrupt in 1999 and in the first half of 2000, and the remaining banks pursued more conservative policy when making placements, which influenced the quality of repayments.

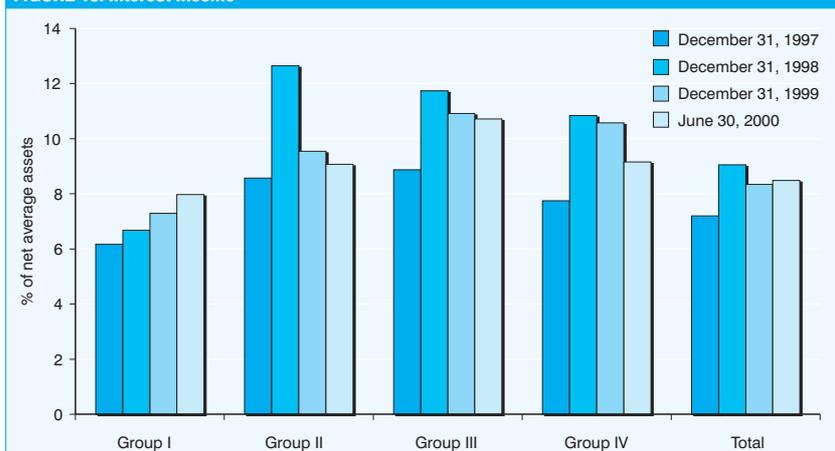
¹⁵ Losses for Group II in the first half of 2000 were caused by a single bank.

⇒ The ratio between the interest income and the average assets for each bank group is calculated in the following manner. First, the interest income generated on a certain date by all banks included in an individual group is added up. Secondly, the amounts of the average assets of each bank group are also added up. The sums thus calculated are mutually divided and multiplied by 100.

The average assets are calculated as arithmetic mean of the balance in assets at the beginning and at the end of period for which the average is calculated.

The Schedule IS is the source of data on interest income, while the Schedule BS is the source of data on the amount of assets (both Schedules form an integral part of the Bank Statistical Report – *Narodne novine*, No. 57/99).

FIGURE 13. Interest Income



The success of banking system operations can also be seen on the basis of changes in interest income and expenses.

Interest income of the banking system decreased and increased as assets changed. In 1998, interest income rose due to an increase in assets and recorded a growth rate of 1.9 percentage points compared to 1997. It comprised about 9.1 percent of the average net assets and fell due to a decrease in assets in 1999. The rate of fall was about 0.7 percent compared with that in 1998, but it remained above that recorded in 1997. A further modest increase of interest income (based on annual projections) was recorded in the first half of 2000 (0.2 percentage points compared to the end of 1999).

The situation was somewhat different on the level of individual bank groups. This indicator continued to grow in Group I, while it continued to fall in other groups of banks after the substantial increase recorded in 1998. The growth generated by Group II and Group III in 1998 resulted from a substantial increase in interest income, while in Group IV, it resulted from the fall in the average net assets. The interest income of most banks decreased in 1999 compared to 1998, and increased in the two largest banks and in medium-sized banks in foreign ownership. Further annual increases in interest income were recorded in the first half of 2000.

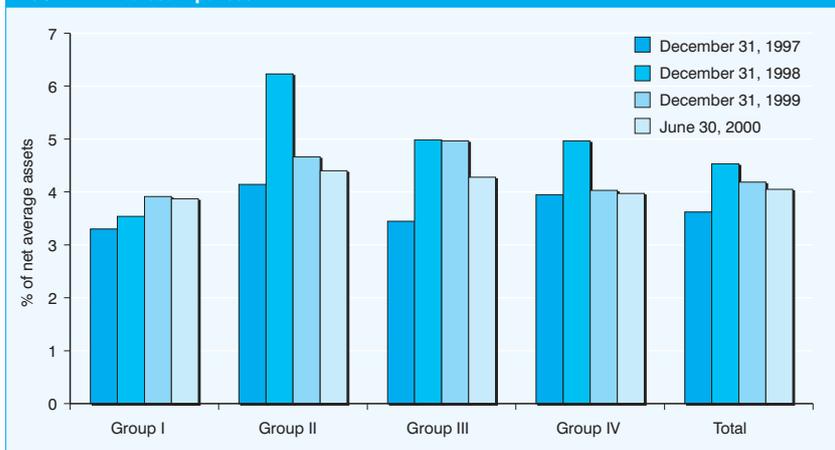
At the level of the banking system, movements in average rates of interest expenses followed changes in assets and average rates of interest income. Inter-

⇒ The ratio between the interest expenses and the average assets for each group is calculated in the following manner. First, the interest expenses incurred on a certain date by all banks included in an individual group are added up. Secondly, the amounts of average assets of each bank group are also added up. The sums thus calculated are mutually divided and multiplied by 100.

The average assets are calculated as arithmetic mean of the balance in assets at the beginning and at the end of period for which the average is calculated.

The Schedule IS is the source of data on interest expenses, while the Schedule BS is the source of data on the amount of assets (both Schedules form an integral part of the Bank Statistical Report – *Narodne novine*, No. 57/99).

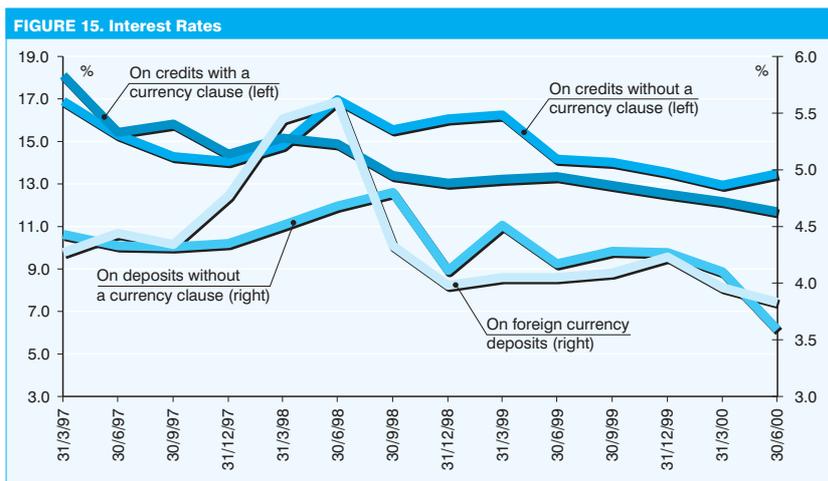
FIGURE 14. Interest Expenses



est expenses comprised, on average, about 50 percent of interest income generated in the observed period and their average share in net assets was smaller.

Described changes in the share of interest income and expenses in the net assets of the banking system followed the same trend, and developments in the rate of the interest expenses of individual groups were somewhat different compared to the average changes in that rate in the banking system. In 1998, developments in interest expenses followed changes in interest income and deviated from these changes in individual bank groups in 1999 and in the first half of 2000. In 1999, the interest expenses of Group III remained at the 1998 level and were accompanied by a decrease in interest income. On the other hand, the interest expenses of Group IV fell more than interest income. Similar movements were evident in Group I in the first half of 2000 when there was a slight fall in interest expenses and an increase in interest income.

In the observed period, lending and deposit rates were high and the average weighted interest rate amounted to 14.9 percent on loans without a foreign currency clause and 14 percent on loans with a foreign currency clause. At the same time, the average weighted interest rate was 4.3 percent on deposits without a foreign currency clause and 4.4 percent on deposits with foreign currency clause.



↳ The basis for calculating the weighted averages is the amount of loans extended at a certain interest rate in the reporting month, with the exception of interest rates on overdraft facilities based on giro and current accounts. The weighted averages for these loans are calculated on the basis of their balances at the end of reporting month.

Kuna deposits without foreign currency clauses (sight deposits, savings and time deposits) and foreign currency deposits are reported as weighted averages of monthly interest rates. The basis for calculating the weighted averages is the balance in deposits at the end of reporting month. The exceptions are kuna savings and term deposits whose weighted averages are calculated (since July 1995) on the basis of the amounts of deposits received in the reporting month. When the average interest rates on total kuna deposits are calculated, all components are weighted on the basis of the balance in relevant deposits at the end of reporting period. The CNB statistics is the source of data.

A fluctuating decrease in the interest rates on loans with/without foreign currency clauses and on foreign currency deposits was recorded in the same period. On the other hand, interest rates on deposits without foreign currency clauses remained almost the same throughout the whole period. The interest rate spread was still high with a tendency to decrease, amounting to 9.9 percent on loans and deposits without foreign currency clauses and 7.9 percent on loans with foreign currency clauses and foreign currency deposits in mid-2000.

Apart from the above-stated indicators, the banking system's performance was also evaluated on the basis of the ratio between assets and the number of persons employed and on the basis of the share of non-interest expenses in assets; the higher the ratio between assets and the number of persons employed, the better the performance of banks, i.e. of the banking system. On the other hand, the smaller the share of non-interest expenses in assets, the more efficient operations were.

⇒ The average asset amounts of all banks from an individual bank group are added up for each bank group, and then expressed as the ratio between the amount thus calculated and the total number of persons employed by banks included in an individual group. The sums thus calculated are mutually divided. The same procedure is applied to the calculation of this indicator for all banks.

Average assets are calculated as arithmetic mean of the balance in assets at the beginning and at the end of period for which the average is being calculated.

The Schedule BS is the source of data on the amount of assets (Bank Statistical Report – *Narodne novine*, No. 57/99), while the audited reports of banks are the source of data on the number of persons employed.

⇒ The ratio between non-interest expenses and average assets is calculated in the following manner. First, the non-interest expenses incurred on a certain date by all banks included in an individual group are added up. Secondly, the average asset amounts of each bank group are also added up. The sums thus calculated are mutually divided and multiplied by 100.

The average assets are calculated as the arithmetic mean of the balance in assets at the beginning and at the end of period for which the average is being calculated.

The Schedule IS is the source of data on non-interest expenses, while the Schedule BS is the source of data on the amount of assets (both Schedules form an integral part of the Bank Statistical Report – *Narodne novine*, No. 57/99).

16 Data on the number of persons employed at mid-1999 and at the end of 1999 do not include data on banks against which the bankruptcy proceedings were initiated in 1999.

FIGURE 16. Assets per Employee on June 30, 2000

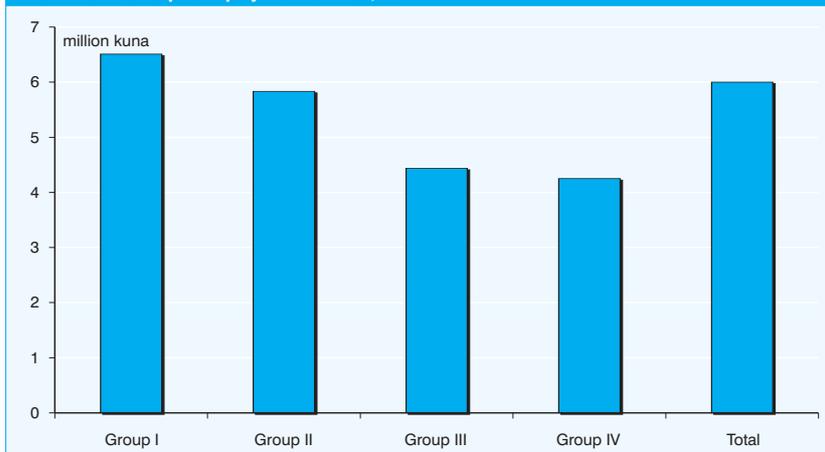
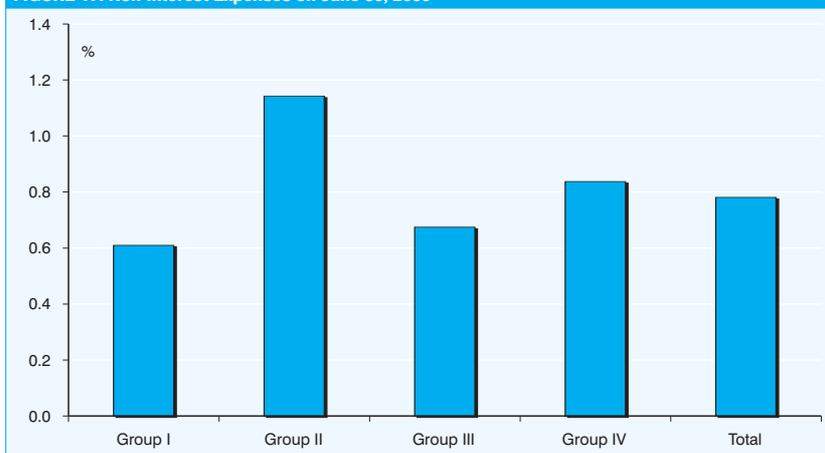


FIGURE 17. Non-Interest Expenses on June 30, 2000



In mid-2000, the banking system employed 16,534 persons, a decrease of 324 employees (1.9 percent) compared to the end of 1999¹⁶, and a decrease of 681 employees (4 percent) compared to mid-1999. Measured on the level of the banking system, there were 6 million kuna in assets per employee. This ratio was much better in Group I (6.5 million kuna) and in Group II (5.8 million kuna) than in other groups of banks. This indicator shows that larger banks were on average more successful. The ratios of Group III (4.4 million kuna) and of Group IV (4.3 million kuna) were lower than the system average.

The share of non-interest expenses in assets shows a somewhat different picture. Measured on the basis of this indicator, Group I (0.6 percent) was also the most successful group (0.2 percentage points better than the system average). Group III was the second most successful group (0.7 percent) while the Group IV and Group II took the third and the fourth position with 0.8 percent and 1.1 percent respectively.

2.1.6 Credit Risk

Total placements of the banking system (those which are classified, i.e. balance sheet and off-balance sheet categories of placements) amounted to 111.6 billion kuna in mid-2000. They rose by about 4 billion kuna or 3.7 percent compared to the end of 1999, and fell by 2.7 billion kuna or 2.3 percent compared to 1998. In addition, total placements increased by 8.3 billion kuna or 8 percent compared to 1997.

TABLE 11. Classification of Placements by Groups of Risk, end of period, in million kuna and %

Placements	Dec. 1997		Dec. 1998		Dec. 1999		June 2000	
	Amount	Share	Amount	Share	Amount	Share	Amount	Share
A	91,706.8	88.8	97,227.9	85.1	92,061.5	85.5	96,197.0	86.2
B	5,454.5	5.3	6,377.8	5.6	4,507.0	4.2	3,709.7	3.3
C	3,413.4	3.3	5,574.8	4.9	3,749.9	3.5	3,985.8	3.6
D	871.7	0.8	2,718.1	2.4	3,393.6	3.2	3,531.8	3.2
E	1,856.7	1.8	2,359.6	2.1	3,903.3	3.6	4,179.4	3.7
Total	103,303.1	100.0	114,258.2	100.0	107,615.4	100.0	111,603.6	100.0

⇨ Table 11. contains the amounts of placements classified by groups of risk, as well as their shares in total placements that are classified. The reports submitted by banks in Schedule C stipulated by the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, No. 32/99 and 64/99) are the source of data. This Schedule forms an integral part of the Instruction for Uniform Implementation of the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, No. 36/99).

The amount of total placements changed as their structure according to individual categories of risk changed. The share of income earning assets in total assets decreased from 94.1 percent in 1997 to 89.5 percent in mid-2000, while the share of the highest risk placement increased. Placements classified in groups D and E increased their share from 2.6 percent in 1997 to 6.9 percent in mid-2000.

This movement can also be illustrated through the ratio between provisions and placements. In the observed period, this indicator was on a continual downward trend until the end of 1999, which shows that the banking system was exposed to substantial potential losses. The ratio between total provisions and placements increased from 5 percent in 1997 to 8.9 percent in mid-2000.

TABLE 12. Ratio between Provisions and Placements (A, B, C, D and E), end of period, in million kuna and %

	Dec. 1997	Dec. 1998	Dec. 1999	June 2000
1. Total provisions for identified and unidentified losses	5,111.3	7,645.6	9,486.2	9,879.8
1.1 Provisions for identified losses	4,539.8	6,951.6	8,694.7	8,958.3
1.2 Provisions for unidentified losses	571.5	694.0	791.5	921.5
2. Total gross placements (A, B, C, D and E)	103,303.1	114,258.2	107,615.4	111,603.6
3. The relative ratio between total provisions and total gross placements	4.9%	6.7%	8.8%	8.9%

⇨ The ratio between the total provisions and total placements classified is calculated in the following manner. The specific reserves for identified and unidentified losses are added up and the sum thus calculated is divided by the amount of total placements and multiplied by 100. The reports submitted by banks in the Schedule SR, which forms an integral part of the Instruction for the Uniform Implementation of the Decision on the Amount and the Method of Forming Specific Reserves to Ensure Against the Potential Losses of Banks (*Narodne novine*, No. 36/99), passed on the basis of the Decision on the Amount and the Method of Forming Specific Reserves to Ensure Against Potential Losses of Banks (*Narodne novine*, No. 32/99) are the source of data on the amounts of specific reserves for identified and unidentified losses. The reports submitted by banks in the Schedule C stipulated by the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, No. 32/99 and 64/99) are the source of data on total placements. This Schedule forms an integral part of the Instruction for Uniform Implementation of the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, No. 36/99).

These indicators show that negative influences (above all, the deterioration of the economy in the observed period) had stronger influence on the system than the positive influences of improved bank lending policies, the stricter application of lending policies and the entrance of foreign banks into the domestic market.

An increase or decrease in credit risks also depends on the structure of loan portfolio.

In mid-2000, out of loans valued at 48.2 billion kuna granted within the banking system, 22.1 billion kuna or 45.8 percent were placed with other enterprises. Household loans amounting to 18.2 billion kuna (37.8 percent) had the second-largest share, while loans to government units totaling 4.1 billion kuna (8.4 percent) had the third-largest share.

It can be noticed that on the level of individual bank groups, the largest share of loans to government units and public enterprises was granted by banks from Group I, whereas banks from Groups II, III and IV mostly extended loans to other enterprises and households.

TABLE 13. Structure of Loans by Institutional Sectors, end of period, in million kuna

	Group I		Group II		Group III		Group IV		Total	
	Dec. 1999	June 2000								
1. Government units	2,443.4	3,333.9	387.2	546.3	53.0	78.3	105.6	98.8	2,989.1	4,057.2
2. Financial institutions	559.6	469.9	299.5	261.2	34.8	129.1	230.4	123.7	1,124.2	983.8
3. Public enterprises	1,309.6	1,569.4	316.2	425.1	2.7	0.0	112.4	87.3	1,740.9	2,081.9
4. Other enterprises	10,996.3	10,237.1	8,914.8	8,723.8	811.9	943.0	2,101.5	2,149.9	22,824.5	22,053.9
4. Non-profit institutions	136.3	152.2	46.4	62.8	4.7	4.2	11.9	10.9	199.4	230.1
5. Households	9,655.9	10,732.0	5,668.4	5,587.8	734.54	976.4	1,090.1	911.3	17,148.9	18,207.4
6. Nonresidents	308.5	287.0	149.4	162.6	0.0	0.0	30.8	33.4	488.7	483.1
Total	25,449.1	26,784.9	15,824.6	15,820.4	1,643.1	2,133.3	3,720.9	3,447.1	46,637.7	48,185.8

↑ Credit exposure by an individual institutional sector is reported for each bank group as well as all banks.

The reports submitted by banks in the Schedule BS/LOA (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data for this table.

Loans granted by Group I to households and government units increased substantially (1.1 billion kuna or 11.1 percent, and 0.9 billion kuna or 36.4 percent) in the first half of 2000 compared to end of 1999.

2.1.7 Liquidity Risk¹⁷

¹⁷ Liquidity risk is the potential danger that bank will not be able to fulfill its obligations when they fall due because of the maturity mismatch in sources of funds and placements and market distortions.

Banks are trying to achieve the optimum ratio between the generation of profit on the one hand and safety and liquidity on the other.

In order to insure liquidity reserves, banks invest a portion of their funds in securities that are easily marketable and can easily be converted into liquid assets.

Throughout the banking system, banks purchased CNB and central government bills in the amount of 4.8 billion kuna, which comprised 4.8 percent of total bank assets in mid-2000. Out of this amount, 2 billion kuna, or 41.7 percent, were invested in kuna denominated CNB bills. Foreign currency denominated CNB bills had the second-largest share (1.7 billion kuna or 35.2 percent), while Ministry of Finance treasury bills and money market instruments of the central government had the third and the fourth-largest share (1 billion kuna or 21.2 percent and 0.1 billion kuna or 1.9 percent respectively).

⇒ The stock of CNB bills denominated in domestic and foreign currency and purchased on a certain date and the stock of central government bills held by banks are reported in accordance with statistical sources of the Croatian National Bank.

CNB bills are purchased on the basis of the Decision on Issuing the Croatian National Bank Bills Denominated in Kuna (*Narodne novine*, No. 48/98) and Decision on Issuing the Croatian National Bank Bills Denominated in Foreign Currency (*Narodne novine*, No. 48/98 and 7/99).

TABLE 14. Purchased CNB and Central Government Bills, in million kuna, on stock on June 30, 2000

	Group I	Group II	Group III	Group IV	Total
1. CNB bills denominated in kuna	1,536.3	366.1	19.7	62.9	1,985.0
2. CNB bills denominated in foreign currency	1,184.3	301.5	85.5	101.7	1,673.0
3. Ministry of Finance treasury bills	606.0	292.0	53.4	58.1	1,009.5
4. Money market instruments of the central government	40.9	24.8	15.0	10.6	91.2
Total	3,367.6	984.3	173.6	233.3	4,758.7

Out of total placements in the above-stated securities, Group I made the largest relative placement¹⁸ in kuna denominated CNB bills (45.6 percent) compared to other groups of banks. On the other hand, Group III made the biggest relative placement in foreign currency denominated CNB bills (49.3 percent), in Ministry of Finance treasury bills (30.7 percent) and in the money market instruments of the central government (8.6 percent).

Banks also made use of CNB loans due to their liquidity problems. The central bank therefore granted loans valued at on average 0.3 billion kuna to banks in the second quarter of 2000 or 0.6 billion kuna less compared with the first quarter and 1 billion kuna less compared to 1999.

¹⁸ In accordance with this text, the largest relative placement is considered the share of investments of an individual bank group in a certain type of securities, especially of that group which has the largest share compared to other groups of banks.

TABLE 15. CNB Loans, in million kuna, quarterly/annual average

	Group I			Group II			Group III			Group IV			Total		
	1999	1Q 2000	2Q 2000	1999	1Q 2000	2Q 2000	1999	1Q 2000	2Q 2000	1999	1Q 2000	2Q 2000	1999	1Q 2000	1Q 2000
	1. Lombard loans	107.1	139.3	54.0	33.5	16.1	4.5	3.8	3.0	0.3	10.4	3.7	1.8	154.8	162.0
2. Intervention loans	0.0	0.0	0.0	21.5	7.5	5.8	0.0	0.0	0.0	62.6	1.1	9.2	84.1	8.6	15.0
3. Liquidity loans	0.0	0.0	0.0	791.8	652.6	158.9	70.9	7.2	39.3	68.7	64.1	71.0	931.4	724.0	269.2
4. Repo CNB bills	71.9	34.9	0.8	51.5	7.6	0.7	8.9	0.9	0.1	9.1	0.1	0.1	141.5	43.5	1.7
Total	179.1	174.1	54.8	898.2	683.8	169.9	83.7	11.1	39.8	150.8	69.1	82.1	1,311.8	938.1	346.5

Changes in the individual types of loans reflected the overall stated movements.

Liquidity can also be demonstrated by changes in free reserves, which show bank attitudes to risk, the possible lack of liquid assets and an increase in liquidity reserves.

The level of free reserves was positive in all four groups of banks at the end of the first quarter of 1998. From the second quarter of 1998 to the second quarter of 1999, the level of free reserves changed and was mainly negative in Group II and Group III. The same trend was present in Group III in the third quarter of 1999 as well. At the same time, they were on an upward trend in Group I and Group IV. From the fourth quarter onwards, the level of free reserves in all groups of banks was again positive and on an upward trend.

TABLE 16. Free Reserves, in million kuna and %, quarterly average

	Group I		Group II		Group III		Group IV	
	Amount	Index (1Q 1997=100)	Amount	Index (1Q 1997=100)	Amount	Index (1Q 1997=100)	Amount	Index (1Q 1997=100)
1Q 1997	440.9	100.0	273.4	100.0	170.4	100.0	238.2	100.0
2Q 1997	392.2	88.9	190.7	69.8	151.3	88.8	263.2	110.5
3Q 1997	765.9	173.7	106.0	38.8	70.8	41.5	258.6	108.6
4Q 1997	537.5	121.9	153.7	56.2	86.0	50.5	244.8	102.8
1Q 1998	784.6	177.9	186.6	68.3	38.5	22.6	167.0	70.1
2Q 1998	389.6	88.4	-106.0	-38.8	57.5	33.8	109.1	45.8
3Q 1998	1,107.4	251.2	105.6	38.6	-21.1	-12.4	165.9	69.6
4Q 1998	2,506.5	568.5	-87.0	-31.8	-33.7	-19.8	219.4	92.1
1Q 1999	2,435.8	552.4	-542.8	-198.5	-108.9	-63.9	131.5	55.2
2Q 1999	2,287.1	518.7	-705.7	-258.1	-87.8	-51.6	183.7	77.1
3Q 1999	3,099.5	703.0	481.7	176.2	-0.5	-0.3	535.1	224.6
4Q 1999	3,781.3	857.6	565.8	207.0	46.6	27.4	540.4	226.8
1Q 2000	4,404.6	998.9	795.4	290.9	193.6	113.6	454.4	190.7
2Q 2000	6,400.4	1,451.6	1,710.3	625.6	276.0	162.0	379.2	159.2

Movements in free reserves are even more observable in Figure 18. A significant, absolute and relative growth in free reserves was present in Group I in the third quarter of 1998 and accompanied by their further growth in the following quarters.

Movements in liquidity can also be demonstrated by the ratio between loans and deposits. The smaller the ratio, the better the liquidity of bank will be, i.e. of the system because banks have more assets for liquidity reserves at their disposal. The ratio between loans and deposits of about 70 percent is considered an optimum ratio.

While the ratios of Groups I, II and IV fluctuated and changed in the observed

↑ The quarterly and annual averages of used secondary liquidity sources of the CNB are reported for each bank group and for all banks. These sources include Lombard loans, liquidity loans, intervention loans and funds borrowed at the CNB repo auctions.

The utilization of the stated secondary liquidity sources is regulated by the following decisions of the CNB: 1) Decision on the Terms and Conditions for Granting Short-Term Loans on the Basis of Pledged Securities (Lombard Loan) (*Narodne novine*, Nos. 160/98, 28/99, 32/99 and 38/99), 2) Decision on the Short-Term Liquidity Loan (*Narodne novine*, No. 132/99) and 3) Decision on the Terms and Conditions for Granting Short-Term Intervention Loans (*Narodne novine*, No. 32/99).

↔ This table reports the quarterly averages of the free reserves of individual bank group in the observed period. Free reserves are calculated on the basis of the following formula:

free reserves = (actual kuna reserves + actual foreign currency reserves + supplementary reserves) – (required reserves + foreign currency reserves) – borrowed reserves

actual kuna reserves = balance in giro accounts + balance in vault + allocated reserves
actual foreign currency reserves = liquid foreign currency claims (including CNB bills in foreign currency) + allocated reserves

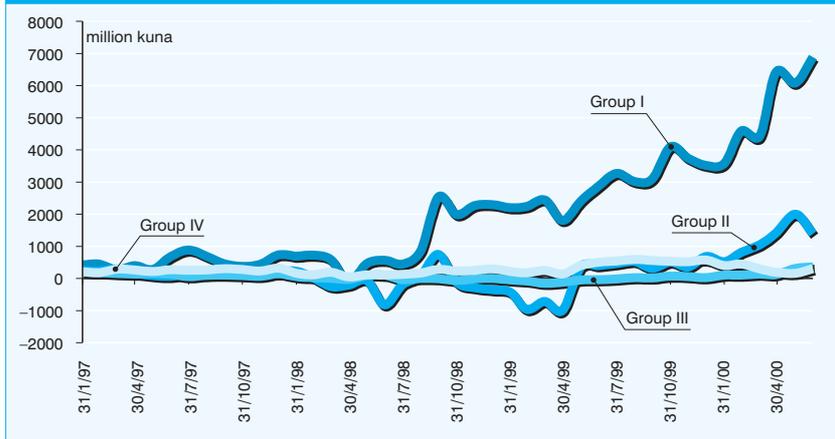
supplementary reserves = CNB bills in domestic currency + treasury bills of the MoF of the Republic of Croatia + promissory notes of the MoF of the Republic of Croatia + short-term placements in the money market

borrowed reserves = Lombard loan + repo CNB bills + intervention loan + special loans + pre-rehabilitation loan + overnight loan + other loans with the maturity up to 7 days

The Croatian National Bank Statistics is the source of data.

⇒ Movements in free reserves are shown on the basis of data on the balance in free reserves on the last day of the observed quarter. The Croatian National Bank Statistics is the source of data.

FIGURE 18. Free Reserves, end-quarter balance

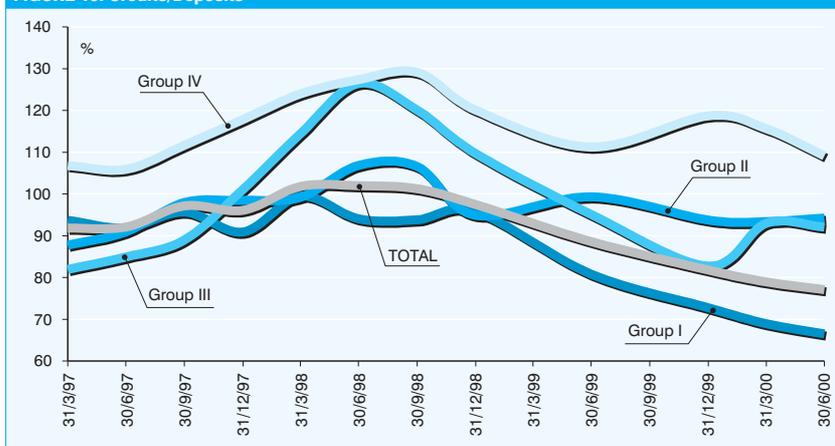


⇒ The ratio between the total loans and deposits for each bank group is calculated in the following manner. First, the total loans on a certain date of all banks included in an individual group are added up. Secondly, the amounts of the total deposits of each bank group are also added up. The sums thus calculated are mutually divided and the amount thus obtained is multiplied by 100. The same procedure is applied to the calculation of this indicator for all banks.

Loans include kuna and foreign currency loans in net amounts, i.e. decreased by the amount of formed specific reserves for identified losses. Deposits also include blocked foreign currency savings of households. Since deposits received from the CNB are considered liabilities based on loans, they are not included.

The reports submitted by banks in the Schedule BS/LOA (Bank Statistical Reports – *Narodne novine*, No. 57/99) are the source of data on loans, while banks' reports in the Schedule BS/DEP are the source of data on deposits (Bank Statistical Report).

FIGURE 19. Credits/Deposits

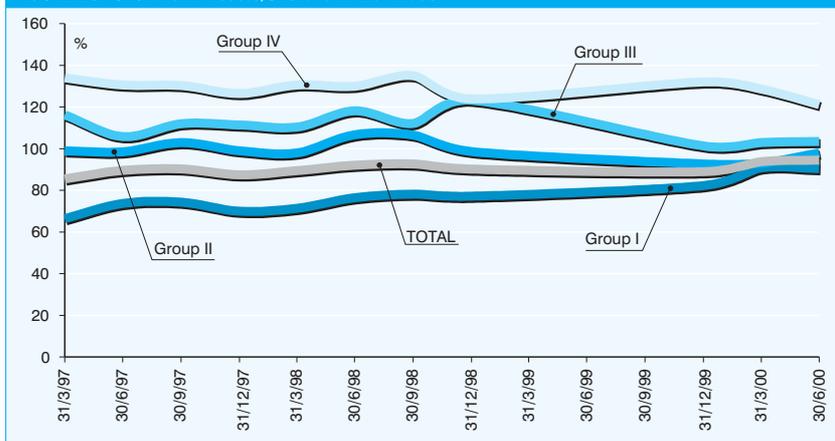


period and slightly increased in 1998, the ratio of Group III rose substantially in 1998 and was on a steady downward trend until the end of 1999. In the first quarter of 2000, the ratio of Group III was again on an upward trend due to a substantial increase in loans. The worsening of the loans/deposits ratio in 1998 can be put in correlation with the introduction of the value added tax which resulted in the weaker liquidity position of enterprises at the beginning of 1998. The situation improved in the second half of 1998 and this indicator improved as well.

⇒ The ratio between the short-term assets and short-term liabilities for each bank group is calculated in the following manner. First, the short-term assets in a certain quarter of all banks included in an individual bank group are added up. Secondly, the short-term liabilities are added up in the same manner. The sums thus calculated are mutually divided and the amount thus obtained is multiplied by 100.

The reports submitted by banks in the Schedule BS and in the Schedule BS/CM (Bank Statistical Report – *Narodne novine*, No. 57/99) are the source of data on short-term assets. The RBS (Reclassified Balance Sheet) was the source of these data until June 30, 1999. The reports submitted by banks in the Schedule BS and the Schedule BS/DM (Bank Statistical Report) are the source of data on short-term liabilities. The RBS (Reclassified Balance Sheet) was the source of these data until June 30, 1999.

FIGURE 20. Short-Term Assets/Short-Term Liabilities



The maturity match between short-term assets and short-term liabilities is one of the economic roles played by banks. The more successful banks there are in it, smaller the ratio will be between short-term assets and short-term liabilities. However, in order for a bank to be able to service its short-term liabilities successfully, it must have at its disposal an adequate amount of short-term assets. In other words, the maturity of balance sheet items must match.

The average ratio between short-term assets and short-term liabilities was 77.3 percent in Group I, 99.3 percent in Group II, 110.6 percent in Group III and 129.3 percent in Group IV. This ratio fluctuated significantly and decreased in Groups II, III and IV, and gradually increased in Group I, especially in the first half of 2000.

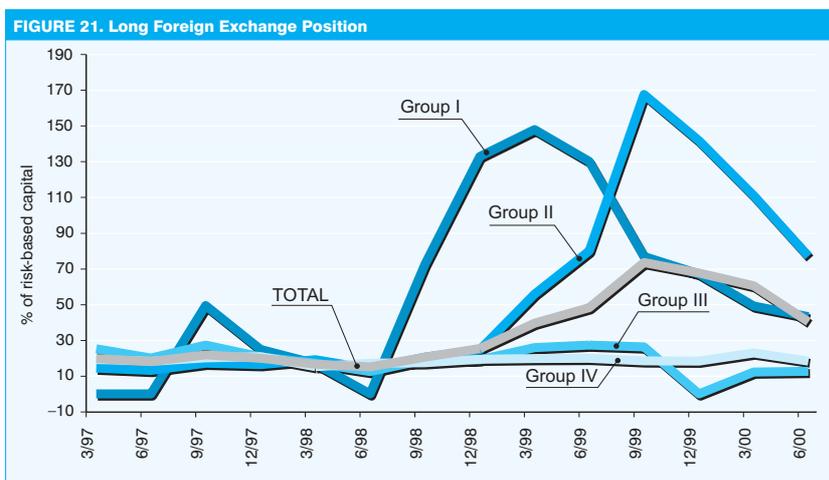
Foreign exchange risk arises due to changes in the domestic currency exchange rate, and this influences the value of balance and off-balance sheet positions denominated in foreign currencies. When the amount of assets denominated in one currency differs from the amount of liabilities denominated in the same currency, each change in the exchange rate of that currency results in a profit or loss that influences the value of capital.

Banks adjust daily their foreign exchange positions, and pursuant to the CNB regulation, exposure to foreign currency risk must not exceed 30 percent of risk-based capital of the bank.

The exposure to foreign currency risk was analyzed in the observed period on the basis of the changes in long foreign exchange positions (foreign exchange claims exceeding foreign exchange liabilities) and short foreign exchange positions (foreign exchange liabilities exceeding foreign exchange claims) of peer groups of banks. When reporting on changes in long and short foreign exchange positions, we included in individual bank groups only those banks that reported higher exposure with respect to the relevant foreign exchange positions in the observed period.

Until the first half of the first quarter of 1999, the average of banks that reported long foreign exchange positions was within the prescribed amount of risk-based capital. This trend grew from this date on until the fourth quarter

2.1.8 Foreign Exchange Risk



↳ The ratio between the long foreign exchange positions (foreign exchange claims exceeding foreign exchange liabilities) and the risk-based capital for each bank group is calculated in the following manner. First, long foreign exchange positions reported in a certain quarter by banks included in an individual bank group are added up. Secondly, the amounts of risk-based capital are added up in the same manner. The sums thus calculated are mutually divided and the amount thus obtained is multiplied by 100. The reports submitted by banks on the basis of the Decision on the Prevention of Foreign Exchange Position Exposure to Currency Risk of Authorized Banks and Savings Banks (*Narodne novine*, No. 134/97) are the source of data on long foreign exchange positions. The calculation of the risk-based capital is regulated by the Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 32/99) and the adequate instruction for its implementation (Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital – *Narodne novine*, No. 36/99). The reports submitted by banks are the source of data on the risk-based capital, and the schedule for submitting these data forms the integral part of the stated Instruction (Schedule CAP).

of 1999 and then reversed. In addition, the average exposure was higher than allowed by the regulation. However, if this trend continues in the third quarter of 2000 as well, it can be expected that the average exposure shall be kept within the prescribed amount.

Figure 21. shows that changes in the average were significantly influenced by movements in individual bank groups. More precisely, the sudden upward movement in the curve of Group I and Group II was conditioned by a substantial change in exposure of individual banks with respect to prescribed amount, while changes in the other two groups remained at the average level recorded in the observed period.

On the other hand, the change in the average of banks reporting short foreign exchange positions was relatively stable and accompanied by a sharper increase in the period between the third and the middle of the fourth quarter of 1998. After this quarter, the trend eased and the average was maintained within the prescribed limits. The deviation from the period average was as in the case of changes in long foreign exchange positions influenced by movements in Group I and to some extent movements in Group II. It should be noted that the worrisome upward trend in the exposure of Group I mainly resulted from the reduction in the number of banks reporting short foreign exchange positions within the group. The arithmetic mean of the exposures of all banks in the group is taken into consideration when the group average is calculated. In this case, the number of banks reduced in the stated period, which influenced the increase in the group average, and there was no real increase in the exposure of banks included in the pertinent peer group.

The root causes of such movements in exposure to foreign currency risk can be found in the events that took place before, during and after closing the rehabilitation proceedings for individual banks. This is stated because the majority of banks mainly reported short foreign exchange positions before rehabilitation and these became long foreign exchange positions after rehabilitation, which was conducted in the manner that bad claims of banks under rehabilitation were replaced with claims (bonds) of the Republic of Croatia denominated in foreign currency. With the respect of the amount of such claims, a certain time period is necessary for adjustment to regulation. In addition to this, significant depreciation expectations were noticed in the banking system in the second half of 1998 and in the first half of 1999. The weakening of these expectations resulted in a decrease in long positions.

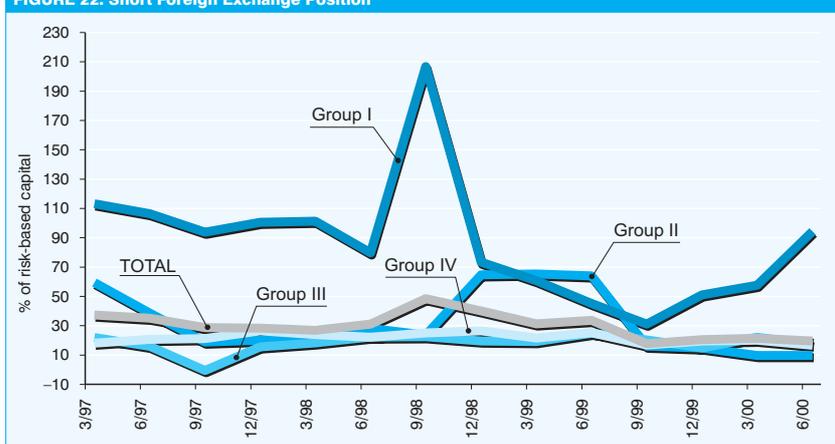
⇒ The ratio between the short foreign exchange position (foreign exchange liabilities exceeding foreign exchange claims) and the risk-based capital for each bank group is calculated in the following manner. First, short foreign exchange positions reported in a certain quarter by banks included in an individual bank group are added up. Secondly, the amounts of risk-based capital are added up in the same manner. The sums thus calculated are mutually divided and the amount thus obtained is multiplied by 100.

The reports submitted by banks on the basis of the Decision on the Prevention of Foreign Exchange Position Exposure to Currency Risk of Authorized Banks and Savings Banks (*Narodne novine*, No. 134/97) are the source of data on short foreign exchange positions.

The calculation of risk-based capital is regulated by the Decision on the Methodology for Calculating Bank's Capital (*Narodne novine*, No. 32/99) and the adequate instruction for its implementation (Instruction for the Uniform Implementation of the Decision on the Methodology for Calculating Bank's Capital – *Narodne novine*, No. 36/99).

The reports submitted by banks are the source of data on the risk-based capital, and the schedule for submitting these data forms the integral part of the stated Instruction (Schedule CAP).

FIGURE 22. Short Foreign Exchange Position



28 savings banks, including four housing savings banks, were operating on June 30, 2000. During the first six months of 2000, operating licenses were withdrawn from 6 savings banks, while a proposal was submitted to the Commercial Court for the initiation of bankruptcy proceedings in one savings bank.

On June 30, 2000, savings bank assets were 1.3 billion kuna or 2.5 percent higher than total savings bank assets at the end of 1999. At the end of 1999, 16.5 percent of total savings bank assets related to housing savings banks. The share of housing savings bank assets increased to 24.7 percent at the end of the first half of 2000, while the share of other savings banks in total savings bank assets fell to 75.3 percent. The reduction in the number of savings banks due to withdrawal of operating licenses on the one hand and the intensive growth in housing savings bank assets on the other influenced such developments.

TABLE 17. Structure of Savings Bank Assets, end of period, in million kuna and %

	Dec. 1999		June 2000		Change
	Amount	Share	Amount	Share	
1. Money assets and deposits with the CNB	89.8	7.0	99.4	7.5	10.7
1.1 Money assets	24.3	1.9	45.2	3.4	86.0
1.2 Deposits	65.5	5.1	54.2	4.1	-17.2
2. Deposits with banking institutions	93.1	7.2	111.5	8.5	19.8
3. Treasury bills and CNB bills	126.4	9.8	244.6	18.6	93.4
4. Trading portfolio of securities	3.1	0.2	7.6	0.6	148.5
5. Loans to financial institutions	50.5	3.9	41.1	3.1	-18.6
6. Loans to other clients	662.3	51.5	602.0	45.7	-9.1
7. Investment portfolio of securities	32.4	2.5	34.8	2.6	7.1
8. Investments in subsidiaries and companies	1.4	0.1	1.3	0.1	-3.5
9. Foreclosed and repossessed assets	25.8	2.0	20.5	1.6	-20.6
10. Tangible assets and software (net of depreciation)	66.5	5.2	54.2	4.1	-18.4
11. Interests, fees and other assets	142.5	11.1	108.3	8.2	-24.0
12. Net of: Specific reserves for unidentified losses	7.6	0.6	6.9	0.5	-8.4
Total	1,286.2	100.0	1,318.3	100.0	2.5

2.2 Savings Banks

2.2.1 Balance Sheet Structure

↔ The share of each balance sheet item of assets in the total assets is calculated on the basis of data from the Bank Statistical Report (*Narodne novine*, No. 57/99 – Schedule BS) and the derived aggregated report of the same type on the banking system in the observed periods. The change in the balance is the percentage change in comparison with the previous period.

Loans to other clients accounted for the largest share of savings bank assets on June 30, 2000. Their share in total assets fell from 51.4 percent at the end of 1999 to 45.6 percent. The share of Ministry of Finance treasury bills and CNB bills in total assets increased from 9.8 percent in 1999 to 18.5 percent at the end of the first half of 2000 due to a rise in these bills on the balance sheets of housing savings banks. As far as other items are concerned, a significant increase was recorded in deposits with banking institutions (from 7.2 percent to 8.4 percent of total assets), money assets and deposits with the CNB (from 6.9 percent to 7.5 percent of total assets) in the first six months of 2000 compared to the end of 1999. In the same period, the share of interests, fees and other assets fell from 11 percent to 8.2 percent of total assets.

On June 30, 2000, time deposits comprised 64.9 percent of savings bank liabilities, and were almost the same as at the end of 1999. Capital accounted for 23.2 percent and other sources of funds 11.9 percent of savings bank liabilities. The share of capital in total liabilities for savings banks decreased from 27.9 percent at the end of 1999 to 23.2 percent in the first half of 2000. Supplementary capital rose from 51.9 million kuna to 84.6 million kuna in the same period, while its share in liabilities increased from 4 percent at the end of 1999 to 6.4 percent in the first half of 2000. The decrease in losses for the current

⇒ These are calculated in the same manner as in Table 17., i.e. the share of each balance sheet item of liabilities in the total liabilities is calculated on the basis of data from the Bank Statistical Report (*Narodne novine*, No. 57/99 – Schedule BS) and the derived aggregated report of the same type on the banking system in the observed periods. The change in the balance is the percentage change in comparison with the previous period.

TABLE 18. Structure of Savings Bank Liabilities, end of period, in million kuna and %

	Dec. 1999		June 2000		Change
	Amount	Share	Amount	Share	
1. Loans from financial institutions	28.8	2.2	9.8	0.7	-65.9
1.1. Short-term loans	24.8	1.9	8.5	0.6	-65.7
1.2. Long-term loans	4.1	0.3	1.3	0.1	-67.0
2. Deposits	826.3	64.2	855.5	64.9	3.5
2.1. Giro account and current account deposits	6.6	0.5	8.2	0.6	23.9
2.2. Savings deposits	38.6	3.0	26.7	2.0	-30.8
2.3. Time deposits	781.1	60.7	820.6	62.2	5.1
3. Other loans	8.4	0.7	10.9	0.8	29.4
3.1. Short-term loans	7.8	0.6	10.2	0.8	30.1
3.2. Long-term loans	0.6	0.0	0.7	0.1	20.2
4. Debt securities issued	0.0	0.0	3.0	0.2	-
4.1. Short-term debt securities issued	0.0	0.0	3.0	0.2	-
4.2. Long-term debt securities issued	0.0	0.0	0.0	0.0	-
5. Supplementary capital	52.0	4.0	84.6	6.4	62.9
5.1. Subordinated instruments issued	12.8	1.0	12.0	0.9	-6.2
5.2. Hybrid instruments issued	39.2	3.0	72.6	5.5	85.4
6. Interest, fees and other liabilities	53.0	4.1	49.1	3.7	-7.5
7. Profit/loss for the current year	-41.4	-3.2	-1.3	-0.1	-
8. Capital	359.1	27.9	306.6	23.3	-14.6
Total	1,286.2	100.0	1,318.3	100.0	2.5

⇒ The capital as one of items stated on the liabilities side of the aggregated balance sheet of all banks that is shown in the Table 18. is presented in detail. In the observed periods, the share of each stated item in total capital of all savings banks is calculated as a ratio between each item and total capital of savings banks. The sums thus calculated are multiplied by 100. The change in the balance is the percentage change in comparison with the previous period.

TABLE 19. Structure of Savings Bank Capital, end of period, in million kuna and %

	Dec. 1999		June 2000		Change
	Amount	Share	Amount	Share	
1. Share capital	369.4	102.9	361.9	118.0	-2.0
2. Profit/loss brought forward	-46.1	-12.8	-73.5	-24.0	59.4
3. Legal reserves	13.6	3.8	3.9	1.3	-71.6
4. Reserves provided for by the articles of association and other capital reserves	22.2	6.2	14.4	4.7	-35.0
Total	359.1	100.0	306.6	100.0	-14.6

year at the end of the first half of 2000 compared to 1999 indicates an improvement in savings bank operations in 2000.

Savings bank capital decreased by 14 percent compared to 1999. This decrease resulted partly from the reduction in the number of savings banks in 2000 and partly from an increase in savings bank losses from previous years or the decrease in legal, reserves provided for by the articles of association and other reserves to cover losses.

The risk-based capital of savings banks stood at 334 million kuna on June 30, 2000 and was approximately the same as on December 31, 1999 when it amounted to 336 million kuna. Savings bank core capital decreased in the first six months of 2000 due to operating losses. Simultaneously, the supplementary capital (hybrid and subordinated instruments) which savings banks included as the core capital in accordance with the law increased.

The capital adequacy ratio of savings banks was 38 percent at the end of 1999 and 44 percent at the end of the first half of 2000.

Savings banks incurred operating losses of 49.2 million kuna in 1999 and a loss of 2.3 million kuna in 1998. This shows that their operations further deteriorated during 1999. The amount of the reported loss was also influenced by the operating losses incurred by individual housing savings banks. Their losses did not result from bad operations but from the fact that they had been recently established. Net interest income and net non-interest income showed a tendency to decrease, while general administrative expenses and depreciation and loan loss provision expenses were on an upward trend.

	1999
1. Net interest income	114.0
1.1 Interest income	231.4
1.2 Interest expenses	117.4
2. Net non-interest income	26.9
2.1 Non-interest income	60.4
2.2 Non-interest expenses	33.6
3. General administrative expenses and depreciation	122.8
4. Net operating income before provisions	18.0
5. Loan loss provision expenses	66.0
6. Pretax income/loss	-48.0
7. Profit tax	1.2
After-tax income/loss	-49.2

2.2.2 Income Statement

⇨ In the observed periods, each item from reports is stated cumulatively for all savings banks and for an individual bank group on the basis of data from Bank Statistical Report (*Narodne novine*, No. 57/99 – Schedule IS). Total amount for each item is the sum of the same items stated in reports. Total amounts are calculated both on the level of all savings banks and on the level of an individual bank group.

The total placements of savings banks stood at 1.2 billion kuna in mid-2000 and decreased by about 4.1 million kuna or 0.3 percent compared to the end of 1999. The amount of total placements changed as their structure according to individual categories of risk changed. The share of income earning assets in total assets rose from 83.5 percent in 1999 to 89.2 percent in mid-2000, while the share of the highest risk placements decreased. The share of placements classified in groups D and E decreased from 7.4 percent in 1999 to 6.6 percent in mid-2000.

Placements	Dec. 1999		June 2000	
	Amount	Share	Amount	Share
A	925.4	75.9	1,032.0	85.0
B	92.7	7.6	51.7	4.3
C	110.3	9.0	51.4	4.2
D	46.0	3.8	44.5	3.7
E	44.6	3.7	35.2	2.9
Total	1,218.9	100.0	1,214.8	100.0

2.2.3 Credit Risk

⇨ Table 21. contains the amounts of placements classified by groups of risk, as well as their shares in the total placements classified.

The reports submitted by savings banks in the Schedule C stipulated by the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, No. 32/99 and 64/99) are the source of data. This Schedule forms an integral part of the Instruction for Uniform Implementation of the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, No. 36/99).

Such an improvement in asset quality resulted from the withdrawal of licenses from several savings banks. As a result, savings bank operations improved and the share of total provisions (for identified and unidentified losses) in gross placements decreased from 10.6 percent at the end of 1999 to 7.5 percent at the end of the first half of 2000.

⇒ The ratio between the total provisions and total placements classified is calculated in the following manner. The specific reserves for identified and unidentified losses are added up and the sum thus calculated is divided by the amount of total placements and multiplied by 100.

The reports submitted by banks in the Schedule SR, which forms the integral part of the Instruction for the Uniform Implementation of the Decision on the Amount and the Method of Forming Specific Reserves to Ensure Against Potential Losses of Banks (*Narodne novine*, No. 36/99), passed on the basis of the Decision on the Amount and the Method of Forming Specific Reserves to Ensure Against Potential Losses of Banks (*Narodne novine*, No. 32/99) are the source of data on amounts of specific reserves for identified and unidentified losses.

The reports submitted by banks in the Schedule C stipulated by the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, No. 32/99 and 64/99) are the source of data on total placements. This Schedule forms the integral part of the Instruction for Uniform Implementation of the Decision on the Classification of Placements and Risky Off-Balance Sheet Items and Assessment of Bank Exposure (*Narodne novine*, No. 36/99).

TABLE 22. Ratio between Savings Banks' Provisions and Placements (A, B, C, D and E), end of period, in million kuna and %

	December 1999	June 2000
1. Total provisions for identified and unidentified losses	129.2	90.8
1.1 Provision for identified losses	121.6	83.9
1.2 Provisions for unidentified losses	7.6	6.9
2. Total gross placements (A, B, C, D and E)	1,218.9	1,214.8
3. The relative ratio between total provisions and total gross placements	10.6%	7.5%

3 List of Banks

Data on individual banks. Data on members of management and supervisory boards are as at December 31, 2000. Data on shareholders who hold more than 3 percent of shares are as at September 30, 2000.

Management Board

Goran Gazivoda – chairman, Ivo Bilić

Supervisory Board

Alois Steinbichler – chairman, Anton Knett, Wolfgang Helpa, Günter Ettenauer, Heinz Meidlinger, Friedrich Racher, Alistair Bruce Turnbull

Shareholders

	Share in core capital (%)
1. Bank Austria AG	80.0
2. European Bank for Reconstruction and Development	20.0

Audit firm for 1999: Ernst & Young Audit d.o.o., Zagreb

BANK AUSTRIA CREDITANSTALT CROATIA d.d.

Jurišićeva 2, 10000 Zagreb

Phone: +385 1 4800-777

Fax: +385 1 4800-890

VBDI¹ 2502004

¹ Account number of depository institution.

Management Board

Thomas Grosse – chairman, Dominique Menu

Supervisory Board

Francois Brunot – chairman, Cally Alain Francois, Wolfdieter Engel, Hans-Jürgen Haas-Wittmüss, Benoit Langelier

Shareholders

	Share in core capital (%)
1. BNP Pariba S.A.	50.0
2. Dresdner Bank AG	50.0

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

BNP-DRESDNER BANK CROATIA d.d.

Andrije Žaje 61, 10000 Zagreb

Phone: +385 1 3652-777

Fax: +385 1 3652-779

VBDI 2504000

Management Board

Gabrijel Sentić – chairman, Vesna Senjak, Anka Olić

Supervisory Board

Ivan Baković – chairman, Bartol Jerković, Vlatko Blekić, Mika Mimica, Marko Babić, Ante Čilić, Antun Milović, Josip Galić, Marijan Mandić

Shareholders

	Share in core capital (%)
1. Jurves d.o.o.	8.0
2. Nova ImmoBilia d.o.o.	8.0
3. Mikser beton d.o.o.	7.4
4. Prospera d.o.o.	7.2
5. Kaptol banka d.d.	7.2
6. Đuro Đaković – Poljoprivredni strojevi i uređaji d.d.	6.8
7. Nord d.o.o.	6.5
8. Telecom d.o.o.	4.3
9. Slavonska štedionica d.d.	4.2
10. Teleinženjering d.o.o.	4.1
11. Đuro Đaković – Termoelektrinska postrojenja d.d.	3.7
12. Croatia osiguranje d.d.	3.1

Audit firm for 1999: Revicon d.d., Zagreb

BRODSKO-POSAVSKA BANKA d.d.

Trg pobjede 29, 35000 Slavonski brod

Phone: +385 35 445-800

Fax: +385 35 445-900

VBDI 2489004

CASSA DI RISPARMIO DI TRIESTE-BANCA d.d.

Smičiklasova 23, 10000 Zagreb
 Phone: +385 1 4614-346
 Fax: +385 1 4614-347
 VBDI 2499000

Adriano Carisi – chairman, Jasna Mamić

Supervisory Board

Giovanni Battista Ravido – chairman, Giorgio Cerutti – zamjenik, Giorgio Covacich, Tito Favaretto, Luca Savino, Milan Travan

Shareholders	Share in core capital (%)
1. Cassa di Risparmio di Trieste – Banca S.p.A.	72.1
2. International Finance Corporation	14.0
3. Finest S.p.A.	7.5
4. Simest-Societa Italiana Per Le Imprese Miste All'Estero Simest S.p.A.	4.4

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

CENTAR BANKA d.d.

Jurišićeva 3, 10000 Zagreb
 Phone: +385 1 4803-444
 Fax: +385 1 4803-441
 VBDI 2382001

Management Board

Gordana Zrinščak – chairman, Ljiljana Podhraški, Ružica Vadić

Supervisory Board

Dragutin Biondić – chairman, Igor Knežević, Irena Kovačević, Zoran Smiljanić, Žarko Kraljević

Shareholders	Share in core capital (%)
1. Heruc d.d.	34.1
2. Domus d.d.	6.0
3. Heruc – Izrada odjeće d.o.o.	6.0
4. Lipa Mill d.d.	6.0
5. Lovinčić d.d.	6.0
6. Villa Dubrovnik d.d.	4.4
7. Adria gradnja d.o.o.	4.3
8. Heruc Zug AG	4.2
9. Diners club Adriatic d.d.	4.1

Audit firm for 1999: Deloitte & Touche d.o.o., Zagreb

CREDO BANKA d.d.

Z. Frankopanska 58, 21000 Split
 Phone: +385 21 380-655
 Fax: +385 21 380-660
 VBDI 2491005

Management Board

Šime Luketin – chairman, Mato Mišić

Supervisory Board

Mirko Vuković – chairman, Boris Barač, Dražen Bilić

Shareholders	Share in core capital (%)
1. Ferocommerce d.o.o.	10.0
2. Darko Gaurina	10.0
3. Plastal d.o.o.	10.0
4. Uvel d.o.o.	9.5
5. Berman d.o.o.	7.5
6. Konkurent d.d.	4.9
7. Arca Merkatius d.o.o.	4.9

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

CONVEST BANKA d.d.

Gajeva 33, 10000 Zagreb
 Phone: +385 1 4922-333
 Fax: +385 1 4819-153
 VBDI 2496001

Management Board

Ivan Maljevac – chairman, Drago Jakovčević, Frane Galzina

Supervisory Board

Janos Müller – chairman, Imre Balogh, Pero Perišić

Shareholders	Share in core capital (%)
1. Magyar Külkereskedelmi Bank R.t.	66.7
2. Pero Perišić	33.3

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

Management Board

Vedran Kuiš – chairman, Nataša Marendić, Nikola Samaržija

Supervisory Board

Niko Šeremet – chairman, Ivan Tomljenović, Jure Šimović, Željko Pecek, Joško Miliša

Shareholders**Share in core capital (%)**

1. State Agency for Bank Rehabilitation and Deposit Insurance	100.0
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Audit firm for 1999: Deloitte & Touche d.o.o., Zagreb

CROATIA BANKA d.d.

Kvaternikov trg 9, 10000 Zagreb

Phone: +385 1 2338-139

Fax: +385 1 2338-141

VBDI 2485003

Management Board

Zdravko Bubalo – chairman, Darinko Pupovac, Jadranka Gotovac

Supervisory Board

Stanko Banić – chairman, Ivo Mazić, Frane Skoblar, Veljko Mašina, Stjepan Meštrović, Damir Vrhovnik, Marko Vuksan

Shareholders**Share in core capital (%)**

1. Stephanie Ann Becera	10.0
2. Nick Bubalo	10.0
3. Steve i Louise Bubalo	10.0
4. Reginvest Ltd.	9.9
5. Omiral oil service Co.	9.9
6. Tankerska plovidba d.d.	6.8

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

DALMATINSKA BANKA d.d.

Marka Oreškovića 3, 23000 Zadar

Phone: +385 23 201-500

Fax: +385 23 201-774

VBDI 2407000

Management Board

Vlaho Sutić – chairman, Krunoslav Brkljačić, Krešimir Krile

Supervisory Board

Marijan Marinko Filipović – chairman, Pave Rusković-Župan, Ivan Šprlje, Vido Bogdanović, Tomislav Vuličević

Shareholders**Share in core capital (%)**

1. State Agency for Bank Rehabilitation and Deposit Insurance	100.0
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Audit firm for 1999: Deloitte & Touche d.o.o., Zagreb

DUBROVAČKA BANKA d.d.

Put Republike 9, 20000 Dubrovnik

Phone: +385 20 356-333

Fax: +385 20 356-778

VBDI 2401003

Management Board

Petar Radaković – chairman, Tomislav Vuić, Nenad Jeđud, Borislav Centner

Supervisory Board

Reinhard Ortner – chairman, August Jost, Gerhard Fabisch, Josef Kassler, Otto Ilchmann, Herbert Martinetz, Reinhold Schuster, Franz Mally, Ivan Ljubanović, Vladimir Jurašić, Robert Tkalčec

Shareholders**Share in core capital (%)**

1. Steiermärkische Bank und Sparkassen AG	40.2
2. Erste Bank der Österreichischen Sparkassen AG	40.2

Audit firm for 1999: revizija nije obavljena jer je banka osnovana tijekom 2000. godine.

ERSTE & STEIERMÄRKISCHE BANK d.d.

Varšavska 3-5, 10000 Zagreb

Phone: +385 1 4561-999

Fax: +385 1 4561-900

VBDI 2402006

Management Board

Izidor Sučić – chairman, Jasna Fumagalli

Supervisory Board

Branko Josipović – chairman, Lovre Božina, Zdenko Prohaska

GOSPODARSKO KREDITNA BANKA d.d.

Draškovićeve 58, 10000 Zagreb

Phone: +385 1 4802-666

Fax: +385 1 4802-571

VBDI 2381009

Shareholders	Share in core capital (%)
1. Kristina Sučić	9.2
2. Ivan Sučić	8.7
3. Suzana Sučić	7.9
4. Josip Bašić	7.4
5. Željko Krznarić	7.4
6. Izidor Sučić	7.4
7. Kata Šparica	7.4
8. Darko Gojčić	7.3
9. Milan Zec	6.1
10. Branko Josipović	5.7
11. Vesna Mijović	3.6
12. Gospodarsko kreditna banka d.d.	3.3

Audit firm for 1999: Reviz-biro d.o.o., Split

HRVATSKA POŠTANSKA BANKA d.d.

Jurišićeva 4, 10000 Zagreb
Phone: +385 1 4804-513
Fax: +385 1 4810-791
VBDI 2390001

Management Board

Josip Slade – chairman, Slavko Durmiš

Supervisory Board

Ivan Videka – chairman, Božidar Sever, Anica Kovačić, Slavko Durmiš, Milan Škugor, Biserka Firm

Shareholders	Share in core capital (%)
1. Hrvatska pošta d.d.	51.0
2. Croatian Pension Insurance Institute	42.6
3. Croatian Privatization Fund	4.3

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

HYPOBANKA d.d.

Vodovodna 20a, 10000 Zagreb
Phone: +385 1 3643-710
Fax: +385 1 3643-687
VBDI 2426005

Management Board

Antun Sermek – chairman, Mira Ausmann

Supervisory Board

Katarina Hodko – chairman, Petar Žaja, Damir Horvat

Shareholders	Share in core capital (%)
1. Zagrebšped d.o.o.	43.4
2. Rijekašped d.o.o.	9.7
3. Slavonijašped d.o.o.	9.7
4. Hypocentar d.o.o.	7.3
5. Intermerc d.o.o.	5.6
6. Servitransport d.d.	5.1
7. Agroznanje d.o.o.	4.6
8. Rudina d.o.o.	3.3

Audit firm for 1999: Revicon d.d., Zagreb

HYPO ALPE-ADRIA-BANK d.d.

Koturaška 47, 10000 Zagreb
Phone: +385 1 6103-666
Fax: +385 1 6103-555
VBDI 2500009

Management Board

Guenter Striedinger – chairman, Heinz Truskaller, Igor Kodžoman

Supervisory Board

Wolfgang Kulterer – chairman, Jörg Schuster, Othmar Ederer, Roberto Marzanati, Gerd Pekner

Shareholders	Share in core capital (%)
1. Hypo Alpe-Adria-Bank AG	91.5
2. European Bank for Reconstruction and Development	8.5

Audit firm for 1999: Ernst & Young Audit d.o.o., Zagreb

Management Board

Branko Buljan – chairman, Milivoj Delač, Ivka Mijić, Ružica Šarić

Supervisory Board

Marita Urlić-Radić – chairman, Mara Delale, Ante Čulić, Jure Svetić, Nevenka Buljan

Shareholders**Share in core capital (%)**

1. Imex trgovina d.o.o.	54.5
2. Branko Buljan	22.0
3. Trajektna luka d.d.	6.3
4. Ljubo Buljan	3.8
5. Ivka Mijić	3.2

Audit firm for 1999: Maran d.o.o., Split

IMEX BANKA d.d.

Tolstojeva 6, 21000 Split

Phone: +385 21 357-015

Fax: +385 21 583-849

VBDI 2492008

Management Board

Milenko Vidulin – chairman, Anton Šuran

Supervisory Board

Anton Brajković – chairman, David Curl, Silvana Kostešić, David Mc Mahon, Margot Jacobs

Shareholders**Share in core capital (%)**

1. Arenaturist d.d.	8.3
2. Dalta d.d.	5.7
3. Vajda d.d.	5.7
4. City of Pula and Municipalities	5.0
5. Mirna d.d.	4.7
6. Istra Cement International d.d.	3.6

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

ISTARSKA BANKA d.d.

Dalmatinova 4, 52100 Pula

Phone: +385 52 527-101

Fax: +385 52 527-400

VBDI 2416000

Management Board

Miro Dodić – chairman, Anton Belušić

Supervisory Board

Milan Travan – chairman, Marijan Kovačić, Edo Ivančić, Marko Martinčić, Klaudio Belušić, Đenio Radić, Vlado Kraljević

Shareholders**Share in core capital (%)**

1. Intercommerce d.o.o.	16.9
2. Tvornica cementa d.d.	15.0
3. Hempel d.d.	15.0
4. Montpelleir finance S.A.	10.0
5. S.A. Finanziaria per i traffici internazionali S.p.A.	7.6
6. Plava laguna d.d.	3.6

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

ISTARSKA KREDITNA BANKA UMAG d.d.

Ernesta Miloša 1, 52470 Umag

Phone: +385 52 741-622

Fax: +385 52 741-275

VBDI 2380006

Management Board

Ivo Šinko – chairman, Željko Kardum, Ankica Bandalović

Supervisory Board

Željko Deković – chairman, Mirjana Škugor, Josip Huljev, Miro Petric, Miho Mioč, Petar Škender, Goran Žurić, Josip Stojanović, Branko Malenica, Ante Čobanov, Mirko Pralija

Shareholders**Share in core capital (%)**

1. Alfa d.d.	7.9
2. TLM TPP d.o.o.	5.0
3. Vinoplod-vinarija d.d.	5.0
4. TLM d.d.	4.8
5. Vodovod i odvodnja d.o.o.	4.6
6. Jolly JBS d.o.o.	4.3
7. Tiskara Kačić d.d.	4.2
8. Rivijera d.d.	3.6

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

JADRANSKA BANKA d.d.

Ante Starčevića 4, 22000 Šibenik

Phone: +385 22 242-101

Fax: +385 22 335-881

VBDI 2411006

KAPTOL BANKA d.d.

Maksimirska 120, 10000 Zagreb
 Phone: +385 1 2359-700
 Fax: +385 1 2339-575
 VBDI 2498007

Management Board

Dejan Košutić – chairman, Ivanka Milković

Supervisory Board

Goran Marić – chairman, Dubravka Klarić-Čosić, Branko Ostović

Shareholders

	Share in core capital (%)
1. Petrač d.o.o.	7.8
2. Dejan Košutić	7.8
3. Brodsko-posavska banka d.d.	7.2
4. Lorber d.o.o.	6.6
5. Naprijed trgovina d.d.	6.2
6. Kaptol banka d.d.	5.7
7. Urlich Seng	5.6
8. Školska knjiga d.d.	4.6
9. Agrocroatia d.o.o.	4.4
10. G.E.I. Istring d.o.o.	3.3
11. Bond d.o.o.	3.3
12. Snježana Herceg	3.1
13. Spomenka Ćurin	3.0

Audit firm for 1999: MZ Auditors d.o.o., Zagreb

KARLOVAČKA BANKA d.d.

I. G. Kovačića 1, 47000 Karlovac
 Phone: +385 47 611-540
 Fax: +385 47 614-206
 VBDI 2400008

Management Board

Sanda Cvitešić – chairman, Stjepan Poljak, Marijana Trpčić-Reškovac

Supervisory Board

Želimir Feitl – chairman, Željko Mažuran, Marko Šimunović, Ivan Podvorac, Ivan Guerrero Devlahovich, Helena Lenac, Zoran Posinovac

Shareholders

	Share in core capital (%)
1. Karlovačka banka d.d.	14.3
2. Lanzville Investments	5.4
3. Croatian Privatization Fund	5.3
4. Karlovačka pivovara d.d.	4.5
5. Hamowa d.o.o.	3.8

Audit firm for 1999: KPMG d.o.o., Zagreb

KREDITNA BANKA d.d.

Ul. grada Vukovara 74, 10000 Zagreb
 Phone: +385 1 6167-333
 Fax: +385 1 6116-466
 VBDI 2481000

Management Board

Ante Todorić – chairman, Željko Jakuš

Supervisory Board

Ivica Todorić – chairman, Branko Bek, Tihomir Mikulić, Dane Gudelj, Ivica Sertić

Shareholders

	Share in core capital (%)
1. Agrokor d.d.	15.9
2. Crodel d.o.o.	9.6
3. Investco vrijednosnice d.o.o.	8.9
4. Ledo d.d.	7.2
5. Jamnica d.d.	7.1
6. Konzum d.d.	6.0
7. Litograf d.o.o.	4.9
8. Zvijezda d.d.	4.8
9. Solana Pag d.d.	4.7
10. Perutnina Zagreb d.d.	4.7
11. Ceufin Brokers d.d.	4.3

Audit firm for 1999: Deloitte & Touche d.o.o., Zagreb

Management Board

Anton Butorac – chairman, Goran Rameša

Supervisory Board

Nikola Pavletić – chairman, Mirjana Petković, Ivan Prpić, Marijan Ključariček, Vito Svetina

Shareholders**Učešće u temeljnom kapitalu (%)**

1. Adriaconsulting S.R.L.	50.0
2. Riječka banka d.d.	31.9
3. Transadria d.d.	14.8

Audit firm for 1999: Iris nova d.o.o., Rijeka

KVARNER BANKA d.d.

Jadranski trg 4 I, 51000 Rijeka

Phone: +385 51 353-555

Fax: +385 51 353-566

VBDI 2488001

Management Board

Mladenka Gombar – chairman, Marija Ribić, Zdravko Babić

Supervisory Board

Mislav Blažić – chairman, Daniel Stepinac, Davorin Rimac, Stjepan Varga, Dragutin Lončarić

Shareholders**Share in core capital (%)**

1. Čakovečki mlinovi d.d.	6.0
2. Ivan Štih	3.9

Audit firm for 1999: KPMG d.o.o., Zagreb

MEDIMURSKA BANKA d.d.

V. Morandinja 37, 40000 Čakovec

Phone: +385 40 370-500

Fax: +385 40 315-065

VBDI 2392007

Management Board

Stipan Pamuković – chairman, Željko Škalec

Supervisory Board

Jakov Gelo – chairman, Ivan Gudelj, Milanka Klanfar, Tomislav Kličko, Bruno-Zvonimir Orešar

Shareholders**Share in core capital (%)**

1. Kemika d.d.	21.7
2. GIP Pionir d.d.	8.9
3. Stipan Pamuković	5.9
4. Željko Škalec	5.9
5. Aling j.t.d.	4.9
6. Ivan Gudelj	4.3
7. Ivan Leko	3.1
8. Ante Pamuković	3.1
9. Ante Samodol	3.1

Audit firm for 1999: Rudan d.o.o., Zagreb

NAVA BANKA d.d.

Tratinska 27, 10000 Zagreb

Phone: +385 1 3656-777

Fax: +385 1 3656-700

VBDI 2495009

Management Board

Marija Šola – chairman, Brana Oštrić

Supervisory Board

Božo Čulo – chairman, Igor Openheim, Ivan Ćurković

Shareholders**Share in core capital (%)**

1. Metroholding d.d.	75.9
2. Andrija Matić	9.6
3. INGRA d.d.	5.9
4. Josip Kovač	4.1

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

PARTNER BANKA d.d.

Vončinina 2, 10000 Zagreb

Phone: +385 1 4602-222

Fax: +385 1 4602-289

VBDI 2408002

PODRAVSKA BANKA d.d.

Opatička 1a, 48300 Koprivnica
 Phone: +385 48 65-50
 Fax: +385 48 622-542
 VBDI 2386002

Management Board

Julio Kuruc – chairman, Drago Galović, Božica Širić, Vladimir Novak

Supervisory Board

Ivan Pavliček – chairman, Ivan Henezi, Nevenka Cerovsky, Jurica (Đuro) Predović, Miljan Todorović

Shareholders

1. Ivan Pavliček
2. Cerere S.P.L.
3. Djuro Predović
4. Podravka d.d.
5. Giovanni Semerano
6. Tinus-promet d.o.o.
7. Antonia Gorgoni
8. Lorenzo Gorgoni
9. Andrea Montinari
10. Dario Montinari
11. Piero Montinari
12. Sigilfredo Montinari

Share in core capital (%)

9.4
9.4
4.8
4.7
3.5
3.2
3.0
3.0
3.0
3.0
3.0
3.0

Audit firm for 1999: Deloitte & Touche d.o.o., Zagreb

POŽEŠKA BANKA d.d.

Republike Hrvatske 1b, 34000 Požega
 Phone: +385 34 254-200
 Fax: +385 34 254-258
 VBDI 2405004

Management Board

Vinko Matijević – chairman, Mihovil Petrović, Goran Matanović

Supervisory Board

Vlado Zec – chairman, Luka Balenović, Juraj Zelić, Željko Glavić, Ivan Vranić, Dragutin Mandić

Shareholders

1. Požeška banka d.d.
2. TIM 2000 d.o.o.
3. Javno poduzeće Hrvatske šume p.o.
4. Sloga IMK d.d.

Share in core capital (%)

28.3
4.7
3.7
3.6

Audit firm for 1999: Deloitte & Touche d.o.o., Zagreb

PRIVREDNA BANKA ZAGREB d.d.

Račkoga 6, 10000 Zagreb
 Phone: +385 1 4723-344
 Fax: +385 1 4723-131
 VBDI 2340009

Management Board

Božo Prka – chairman, Franjo Filipović, Davor Holjevac, Ivan Gerovac, Ivan Krolo, Zvonko Agičić, Nediljko Matić

Supervisory Board

Enrico Meucci – chairman, Adriano Bisogni, Gianfranco Mandelli, Adriano Arietti, Marijan-Marinko Filipović

Shareholders

1. Comit Holding International S.A.
2. State Agency for Bank Rehabilitation and Deposit Insurance

Share in core capital (%)

66.3
25.0

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

PRIVREDNA BANKA – LAGUNA BANKA d.d.

Prvomajska 4a, 52440 Poreč
 Phone: +385 52 416-777
 Fax: +385 52 416-770
 VBDI 2497004

Management Board

Zdravka Cukon – chairman, Roberto Drandić

Supervisory Board

Tomislav Lazarić – chairman, Ljiljana Horvat, Danijel Stepinac

Shareholders

1. Privredna banka Zagreb d.d.

Share in core capital (%)

100.0

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

Management Board

Zdenko Adrović – chairman, Lovorka Penavić, Michael Müller, Velimir Šonje

Supervisory Board

Herbert Štepic – chairman, Renate Kattinger, Andreas Zakostelsky

Shareholders**Share in core capital (%)**

1. Raiffeisen Zentralbank Österreich AG	62.7
2. Raiffeisenbank-Zagreb-Beteiligungsgesellschaft mbH	32.8
3. Raiffeisenlandesbank Kärnten reg. Gen. mbH	4.5

Audit firm for 1999: KPMG d.o.o., Zagreb

RAIFFEISENBANK AUSTRIA d.d.

Petrinjska 59, 10000 Zagreb
Phone: +385 1 4566-466
Fax: +385 1 4811-624
VBDI 2484008

Management Board

Mate Žuljić – chairman, Jasminka Karoglan, Marica Prkić

Supervisory Board

Stipe Latković – chairman, Zdravko Lešić, Ilija Balić

Shareholders**Share in core capital (%)**

1. Županjska banka d.d.	20.0
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Audit firm for 1999: Revident d.o.o., Split

RAZVOJNA BANKA DALMACIJA d.o.o. – The CNB submitted the proposal for the initiation of bankruptcy proceedings on March 22, 2000

Poljička cesta 9, 21000 Split
Phone: +385 21 370-400
Fax: +385 21 371-000
VBDI 2490002

Management Board

Vesna Badurina – chairman, Branka Juričev

Supervisory Board

Tomislav Lazarić – chairman, Loretta Jakovac, Mislav Blažić, Snježana Sklizović, Marinko Dumanić

Shareholders**Share in core capital (%)**

1. Priredna banka Zagreb d.d.	68.9
2. Finvest Corp d.d.	3.9

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

RIADRIA BANKA d.d.

Đure Šporera 3, 51000 Rijeka
Phone: +385 51 339-111
Fax: +385 51 211-093
VBDI 2325004

Management Board

Ivan Štokić – chairman, Antun Jurman, Borislav Perožić

Supervisory Board

Dietrich Wolf – chairman, Marinko Učur, Jochen Bottermann, Klaus Rauscher, Vojko Obersnel

Shareholders**Share in core capital (%)**

1. Bayerische Landesbank Girocentrale	59.9
2. State Agency for Bank Rehabilitation and Deposit Insurance	25.1

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

RIJEČKA BANKA d.d.

Jadranski trg 3a, 51000 Rijeka
Phone: +385 51 208-211
Fax: +385 51 330-525
VBDI 2300007

Management Board

Marijan Trusk – chairman, Verica Lindić, Višnja Jednačak

Supervisory Board

Želimir Kodrić – chairman, Džemal Mešinović, Ante Tustorjić, Zvonko Palameta, Antun Štimac, Milan Penava, Ignacije Marđetko, Vladimir Mučnjak, Anica Vrbanić

Shareholders**Share in core capital (%)**

1. Samoborka d.d.	9.4
2. Hrvatske šume p.o.	6.9
3. V.H. Trade d.o.o.	5.8

SAMOBORSKA BANKA d.d.

Trg kralja Tomislava 8, 10430 Samobor
Phone: +385 1 3362-530
Fax: +385 1 3361-523
VBDI 2403009

4. Sant d.o.o.	5.0
5. Tigra d.o.o.	5.0
6. Chromos d.d.	4.9
7. Vajda elvit d.o.o.	4.3
8. Ozas	4.0
9. Končar d.d.	3.5

Audit firm for 1999: M.Z. Auditors d.o.o., Zagreb

SISAČKA BANKA d.d.

Trg Lj. Posavskoga 1, 44000 Sisak
Phone: +385 44 549-100
Fax: +385 44 549-101
VBDI 2419008

Management Board

Davorka Jakir – chairman, Mirjana Vipotnik, Andrea Zemljčić-Modronja

Supervisory Board

Dinko Pintarić – chairman, Zoran Gobac, Miroslav Matić

Shareholders

	Share in core capital (%)
1. Prvipromet d.o.o.	8.8
2. Madison d.o.o.	8.6
3. Blok usluge d.o.o.	8.6
4. Skok promet d.o.o.	8.5
5. State Agency for Bank Rehabilitation and Deposit Insurance	4.7
6. Croatian Pension Insurance Institute	3.8
7. GE-ZE d.o.o.	3.6

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

SLATINSKA BANKA d.d.

Vladimira Nazora 2, 33520 Slatina
Phone: +385 33 551-354
Fax: +385 33 551-566
VBDI 12412009

Management Board

Vera Radaš – chairman, Angelina Horvat

Supervisory Board

Josip Koleno – chairman, Marija Maleković, Ljiljana Katavić, Vladimir Šanotši, Ružica Šimara

Shareholders

	Share in core capital (%)
1. Pronekinvest d.d.	7.4
2. State Agency for Bank Rehabilitation and Deposit Insurance	7.3
3. Ante Šimara	6.9
4. Sloper d.o.o.	5.6
5. Rima-promet d.o.o.	5.6
6. Ljiljana Katavić	5.5
7. Lustrin d.o.o.	4.6

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

SLAVONSKA BANKA d.d.

Kapucinska 29, 31000 Osijek
Phone: +385 31 231-231
Fax: +385 31 201-039
VBDI 2393000

Management Board

Ivan Mihaljević – chairman, Alma Jukić

Supervisory Board

Marija Crnjac – chairman, Wolfgang Kulterer, Victor Pastor, Walter Bleyer, Ernst Fanzott

Shareholders

	Share in core capital (%)
1. Kärntner Landes und Hypothekenbank AG	45.1
2. European Bank for Reconstruction and Development	27.0

Audit firm for 1999: Ernst & Young Audit d.o.o., Zagreb

Management Board

Tomo Bolotin – chairman, Stjepan Kolovrat, Jerislav Kuštera, Darko Medak, Pero Vrdoljak

Supervisory Board

Fausto Petteni – chairman, Giovanni Battista Ravida, Luigi Lovaglio, Alessandro Maria Decio, Mate Kosović

Shareholders**Share in core capital (%)**

1. UniCredito Italiano S.p.A.	62,6
2. State Agency for Bank Rehabilitation and Deposit Insurance	25,0

Audit firm for 1999: Pricewaterhouse Coopers d.o.o., Zagreb

SPLITSKA BANKA d.d.

R. Boškovića 16, 21000 Split

Phone: +385 21 370-500

Fax: +385 21 370-541

VBDI 2330003

Management Board

Željko Udovičić – chairman, Ante Babić, Josip Ševerdija

Supervisory Board

Ivo Andrijić – chairman, Đuro Benček, Franjo Škoda

Shareholders**Share in core capital (%)**

1. Šted – Invest d.d.	89.7
2. Finer & Kolenc d.o.o.	4.2
3. Redip d.o.o.	4.1

Audit firm for 1999: Data – revizija d.o.o., Zagreb

ŠTEDBANKA d.d.

Slavonska avenija 3, 10000 Zagreb

Phone: +385 1 6306-666

Fax: +385 1 6187-015

VBDI 2483005

Management Board

Mato Lukinić – chairman, Borna Zane, Pavao Parat

Supervisory Board

Tea Martinčić – chairman, Renata Babić, Ines Dabić, Dragutin Drk, Duilio Belić

Shareholders**Share in core capital (%)**

1. Zagrebačka banka d.d.	68.8
2. Varaždinska banka d.d.	10.0
3. Franck d.d.	9.9
4. Tvornica duhana Rovinjski d.d.	5.7

Audit firm for 1999: KPMG d.o.o., Zagreb

VARAŽDINSKA BANKA d.d.

Kapucinski trg 5, 42000 Varaždin

Phone: +385 42 400-000

Fax: +385 42 400-112

VBDI 2391004

Management Board

Heinrich Angelides – chairman, Julio Krevelj

Supervisory Board

Klaus Thalhammer – chairman, Hans Janeschitz, Klaus Störzbach, Gerhard Wober, Fausto Maritan, Ekkehard Fugl, Pierre-Yves Tarneaud

Shareholders**Share in core capital (%)**

1. VBB International holding AG	70.0
2. Banque Federale des Banques Populaires	10.0
3. SGZ-Bank AG	3.3
4. WGZ-Bank AG	3.3
5. GZB-Bank AG	3.3

Audit firm for 1999: KPMG d.o.o., Zagreb

VOLKSBANK d.d.

Varšavska 9, 10000 Zagreb

Phone: +385 1 4801-300

Fax: +385 1 4801-365

VBDI 2503007

ZAGREBAČKA BANKA d.d.

Paromlinska 2, 10000 Zagreb
 Phone: +385 1 6104-000
 Fax: +385 1 6110-555
 VBDI 2360000

Management Board

Franjo Luković – chairman, Milivoj Goldštajn, Zvonimir Jurjević, Nikola Kalinić, Sanja Rendulić, Damir Odak, Tomica Pustišek

Supervisory Board

Petar Đukan – chairman, Jakša Barbić, Milan Artuković, Vladimir Bogatec, Klaus Junker, Charles McWeigh III, Friedrich van Schwarzenberg, Miljenko Živaljić, Ante Vlahović

Shareholders**Share in core capital (%)**

1. Bankers Trust Company	39.4
2. UniCredito Italiano S.p.A.	10.0
3. Allianz AG	9.9
4. Caisse Nationale du Credit Agricole	4.3

Audit firm for 1999: KPMG d.o.o., Zagreb

**BAYERISCHE HYPO- UND
 VEREINSBANK AG, Main Branch,
 Zagreb**

Ul. Alexandera von Humboldta 4,
 10000 Zagreb
 Phone: +385 1 6159-206
 Fax: +385 1 6159-197
 VBDI 8801006

Management Board

Anđelka Čavlek – representative, Vesna Garapić – representative

Supervisory Board**Shareholders****Share in core capital (%)**

1. Bayerische Hypo- und Vereinsbank AG	100.0
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