

### **3. Direction of Reform of Private Housing Finance System**

#### **3.1. Expansion of Housing Finance and Tasks of Private Commercial Finance**

##### **3.1.1. Current Status of Housing Loans**

###### **(1) Increasing Housing Loans**

Housing loans by the state commercial banks have shown a significant increase since 1998. At the end of October 2001, the housing loan balance at Industrial and Commercial Bank of China (ICBC) was 4.02 times that at the end of December 1998. The multiple was 5.16 for Agricultural Bank of China (ABC), 2.67 for Bank of China (BOC), and 3.57 for China Construction Bank (CCB). Put together, the balance for the four banks increased 3.84 times in approximately three years. The sharp increase is due to the following reasons according to personnel at People's Bank of China (PBC), the central bank, and other banks:

- 1) The needs for purchasing private individual housing increased as a result of reform of the housing system, and the finance demand increased sharply.
- 2) Banks are aggressively expanding personal housing loan business, because portion of loan assets for individual borrowers is still small and asset quality is good.

###### **(2) Rapid Increase of Personal Housing Loans**

Housing loans, personal housing loans in particular, are increasing. Personal housing loans increased 10.84 times during the period of December 1998 through October 2001 for ICBC, 11.97 times for ABC, 2.57 times for BOC, and 6.98 times for CCB.

According to officials, the reasons why personal housing loans are increasing, in addition to those listed above, are as follows:

- 1) Banks are actively reinforcing personal housing loan business, and
- 2) Banks are particularly eager to make personal housing loans at the branch level because profit-earning performance is relatively high.

###### **(3) Current Status of Loans for Development Projects**

The four banks seem to have different strategies toward development loans in housing-related loans. While ICBC has been steadily increasing development loans, ABC has at one point increased development loans, and at another point decreased them. BOC has slightly increased the amount of development loans. On the other hand, CCB has decreased the amount. ICBC has succeeded in expanding development loans because the bank has

employed a new loan method. In this new method, ICBC selects development properties, which helps the bank to establish relationships with individual borrowers, through financing developers. ICBC has been able to obtain good borrowers by finding solid development projects.

### **3.1.2. Lending Management by Private Housing Loan Institutions**

#### **(1) Screening of loan application**

There are two types of screening set forth in the PBC regulations, screening for corporate borrowers, and screening for individual borrowers. Screening for corporate borrowers consist mainly of the analysis of financial standings. Since corporate loans tend to be a large sum, and the loan period is long, screening is stricter and the PBC regulations are more stringent compared to personal loans.

#### **(2) Assessing personal credit information**

Screening for personal loans is conducted based on various criteria, such as a debtor's identification, repayment abilities, a mortgage, and confirmation of guarantee. Among these criteria, screening based on a debtor's identification is believed to be the most valid

#### **(3) Personal credit information system ("Shanghai Credit Inquiry Corporation")**

Developing and utilizing personal credit information system is important in the assessment of personal credit.

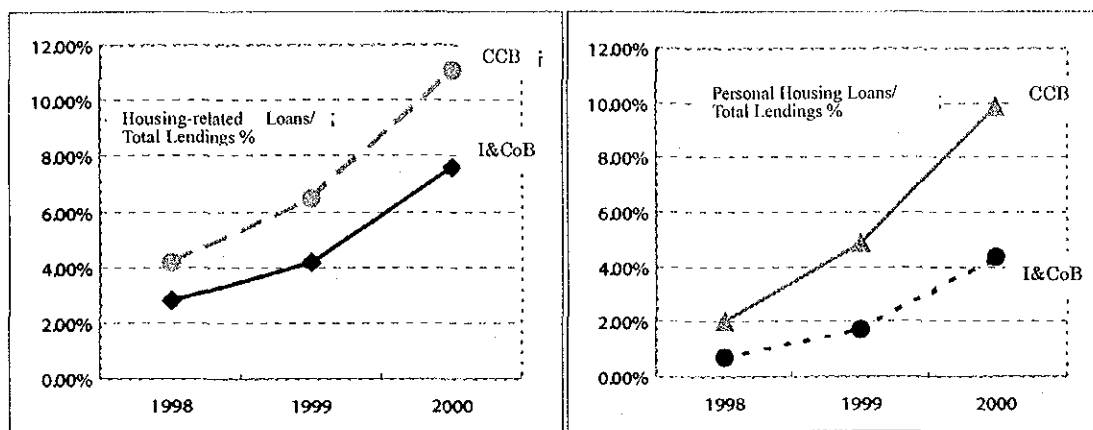
Shanghai Credit Inquiry Corporation is a pioneer in this field. The company launched inter-bank credit information reference system for banks in Shanghai district in June 2000. The system stores personal credit reference data excerpted and selected from personal spending accounts and credit card application forms. Shanghai Credit Inquiry Corporation plans to complete a comprehensive evaluation system of personal credit history before the end of 2001.

### **3.1.3. Housing Finance and Management of Banks**

#### **(1) Change in Asset Structure**

The borrowers from commercial banks were predominantly state enterprises. Asset and liability management (ALM) is therefore particularly associated with state enterprises. Recently, increase in housing-related loans, personal housing loans in particular, is going to change the asset structure of commercial banks. This is particularly true of ICBC and CCB.

**Figure 3-1 Changes in Weight of Housing-related Lending in Two Banks, %**



Source: prepared by NRI research group based on information from PBC

Change in asset structure at commercial banks caused by the increasing amount of housing-related loans, has an important effect on risk management at commercial banks. Unlike loans for state enterprises, the bank must ask for special mortgage guarantee (land use right) when making housing-related loans to corporations. Furthermore, the banks must assess the mortgage assets and prevent price fluctuation risk by setting up and operating a new system.

Personal housing loans will mainly be offered to salaried workers. Commercial banks must set up new procedures to grasp credibility of individuals, set mortgage guarantee, and recover loans. This incurs initial cost for newly participating banks, and additional cost for banks already engaged in loan business for corporations.

## (2) Purpose of ALM Management

The core of ALM management at banks is management of sensitivity to interest rate, or analysis and management of difference between fund lending and borrowing period, between fixed rate assets and debts, or between floating rate assets and debts.

The ALM analysis is also called "gap analysis". Increase in housing-related loans including personal housing loans will increase floating rate assets. If the market interest rate rises, the asset and debt structure with the higher ratio for fixed rate debts (positive gap for fixed rate debts) is more favorable for the bank.

## (3) Ratio of Net Worth in a Bank

In the early 1980s, net worth ratio of state commercial banks (former four big commercial banks) was approximately 20%. Since then, the net worth ratio steadily fell because the capital did not increase as fast as the total assets did.

The net worth ratio continues to be low for the most recent three years at ICBC and CCB.

#### (4) Risk Weight of Loan Assets at Banks

As known well, risk weight of loan assets at banks is not uniform. Fair assessment is impossible if individual banks determine risk weight arbitrarily. The Basel Committee on Banking Supervision set the standard of 0% for loans for domestic public sections, 20% for loans for other banks, 50% for housing mortgage loans, and 100% for other loans.

At ICBC and CCB, loans for public departments (including the central bank) and for other banks with a relatively low risk weight account for approximately 20% of all loans while loans with 100% risk weight (including other loans) occupy approximately 80%. Approximately 80 to 90% of debts at these two banks are savings. With ICBC, approximately 40 to 50% or more of debts are short-term savings. Both banks have a low percentage for debenture issuance (bank debenture) or long-term borrowings.

At ICBC, the weight for long-term lending is increasing, generating a sign of unbalance in terms of maturity. The loan asset structure of CCB is stable. Both banks do not publicize housing mortgage loans included in total loans in their statistics, but the risk weight of loan assets at both banks must be decreasing because, as mentioned above, the weight of housing-related loans is increasing particularly at these two banks.

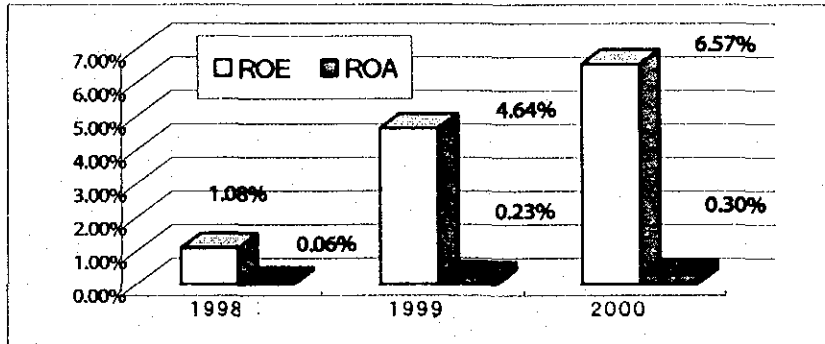
The balance sheet of ICBC and CCB shows a sign, though small, of credits getting longer and debts getting shorter-term. Even if risk weight sees improvement, hazard of financial crisis triggered by deposit withdrawal still exist unless issues in fund raising structure are solved. In order to avoid this risk, a measure to prolong fund raising as long as possible in accordance with investment period, should be introduced.

#### (5) Cost Management at Commercial Banks

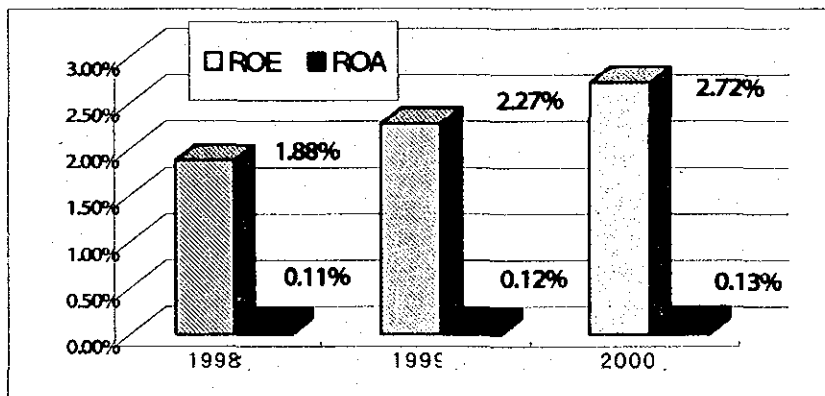
Return on assets (ROA) and return on equity (ROE) are efficiency indices for funds invested by a bank. These two indexes can also be interpreted as indicators of each bank's profitability.

Figure 3-2 ROA and ROE in 2 Banks, I&CBoC and CCB

Industrial and Commercial Bank of China



China Construction Bank



Source: JICA Study Team, based on Applicable Financial Yearbooks and Each Bank's Web Site

### 3.1.4. Expansion of Housing Loans and Necessity for Risk/Cost Management

Personal and other housing loans have increased at ICBC, ABC, BOC, and CCB since 1997 at faster pace than in public housing finance (HPF loans). Private-sector housing finance will surely be an important factor in housing finance. Ratio of housing-related loans in the banks' total amount of loans has been rapidly expanding. In the future the ratio could be as high as 15%.

Unlike corporate loans, housing loans are haunted by risk-related problems such as grasping of personal credit information, security of mortgage guarantee, assessment of collaterals, measures to cope with variable price of collaterals, personal credit examination, and examination of mortgage guarantee. Efficiency of office work can also be problematic because of a large number of small-amount loan cases.

These problems that are unique to housing finance, get more serious as the housing market expands. There are two problems; one is risk management and credit protection, and the other cost management and profitability at banks.

In market economy countries, to effectively use the direct financial market typically represented by stocks and debentures in a country shifting from a planned economy to a socialist market economy, the enterprises raising funds must sensitively react to the change in market such as interest rate. A market system with accurate information and transparent trading must be established.

In China, enterprises, state enterprises in particular, are not fully reacting to the change in the financial market. The capital market is still very much speculative because of information asymmetry. Considering this situation, indirect finance, or a bank-based financial system must play the major role.

In housing finance also, banking system will have to play a central role and therefore, immediate solutions have to be developed for issues in risk management and cost management.

### **3.2. Basic Direction of Reform of Private-sector Housing Finance and Action to Be Taken**

#### **3.2.1. Risk Management and Credit Protection**

To make profits, banks must operate the funds collected from depositors while protecting them against interest rate and exchange risk, and default of enterprises and individuals (credit risk management). That is, banking is a risk business, and risk management is most important. Banks can collect deposits from individuals and lend funds to enterprises because they are able to manage risk and mediate between fund owners and users balancing the risk. Risk management is very important, and credit risk and market risk are inherent to banking.

- Credit risk: Loans may not be recovered because of loanees' insolvency or financial difficulties, bankrupt individuals, etc.
- Market risk: Profit fluctuation risk due to changes in interest rate or exchange rate, and ALM mismatch risk that maturity of deposits does not coincide with the loan period.

Credit risk accounts for 50 to 60% of all risk of a bank. Market risk is said to occupy 20 to 30%.

In western countries, the competition in banking has become increasingly fierce, and

banks' deposit-loan spread has been decreasing because corporate fund raising methods are more diversified, and individuals nowadays are more selective about interest rates for personal savings. In China, too, credit risk management and cost management have become increasingly significant for banks.

Commercial banks are trying to improve their risk management and credit protection at each phase of personal credit investigation and bank loan examination in the overall loan processing system. The more experiences commercial banks gain, the stronger their risk management and credit protection functions will be. In contrast, security of mortgage guarantee and recovery of arrears are not yet established as a system. Currently, the personal housing loan fault rate is low and no serious problems are presented. When housing-related loans increase in the future, the fault rate may rise. It is urgently required to establish an institutional security system and other security insurance system.

The Japanese commercial banks have many years' experience in loan examination. Specifically, experience in internal control, double check, asset assessment, and confirmation of mortgage guarantee can provide useful information.

### **3.2.2. Cost Management**

The deposit-loan interest rate spread for personal housing loan is approximately 1%, which is not high. In addition, the ratio of operating expenses to operating revenues is increasing recently. Standardization of procedures and documentation and establishment of information systems are necessary to strengthen cost management for housing loan-related business. If this is not followed, bank management will be at stake. Following WTO membership, foreign financial institutions strong at retrieval will enter the Chinese market. An internationally competitive cost management system is desired.

### **3.2.3. Reinforcement of Management Potential**

The fault rate will rise to cut profits unless a security insurance system is established; clerical work standardized; and information systems networked. Without these measures, banks may find it difficult to expand the personal housing loan business.

To expand the personal housing loan business, a bank must have a physical strength to dispose of bad debts while keeping earning power. Current state-owned commercial banks lack owned capital and must either increase capital or increase liquidity by selling credits. These banks are now striving to meet basic conditions for converting into joint-stock corporations, (for example by increasing profitability and improving internal management

structure.)

#### **3.2.4. Reinforcement of Personal Housing Loan Management: Housing Loan Management by Japanese Commercial Banks**

Breach rate of personal housing loans is currently quite low in China. However, China's new challenge is to balance a relationship between risk management and improvement of service through product diversification.

A fierce competition has always existed in Japanese commercial banking industry. Consequently, there are a number of aspects in Japanese commercial banks' housing loans that Chinese counterparts can learn from. Below, reinforcement measures for personal housing loan management and customer services by major Japanese commercial banks are discussed as an example. The banks reviewed are: Bank of Tokyo-Mitsubishi, Sumitomo Mitsui Banking Corporation, Sanwa Bank and Dai-ichi Kangyo Bank. (Please see each relevant chapter for the detail).

In order to be qualified for housing loans by most of these four banks, applicants have to be 20 years old and above. Loan periods are set so that borrowers will be 70 years old or below when they pay off the loans. All the banks require borrowers to take out a group credit life insurance. Group credit life insurance is designed to insure loan principals. Financial institutions are insurance policy purchasers/beneficiaries and thus pay premiums, while borrowers are insurants. In principle, loans are given for purchasing new and existing houses that borrowers plan to live. Loans are also available for refurbishments. Loans are given to lands as well, if purchased for building houses.

Minimum amount of loans is JPY100,000 while maximum amount is JPY100,000,000 at all the banks. Yet, three out of the four banks set loan limit at under JPY50,000,000. In all banks, minimum unit of loans is JPY100,000. Loan period is between 1 year and 35 years in general. Two banks set minimum loan period as one month, while others set one year.

Japanese commercial banks are also very creative in designing various interest rate options. One bank allows borrowers to switch among fix rate, capped variable rate, and variable rate, as many times as they desire. Other bank offers variable rate, fixed rate, and hybrid rate (mixture of variable and designated fixed rates). In one bank's hybrid rate, borrowers can divide their loans into several portions and select a specific type of interest rate for each portion. An initial fixed payment period is 3, 5, 10 years, 2, 3, 5, 10 years, or 2, 3, 5, 7, 10 years. An initial payment period for capped variable rate is 5 or 10 years at all banks.

All four banks allow equal monthly payments (principal and interest combined). Larger repayment from bonuses is defined within 50% of loan amount. Some banks allow



monthly principal only payments. Advanced payments are available at all banks, with fees. Percentage of annual repayment in annual income is 40% and below at some banks and 35% and below at others, for applicants with an annual income of JPY4 million and over.

Percentage of loan limit against housing prices is 80% for purchasing a house with land, 100% for building a new house (land is already purchased), 80% for a condominium, 80% for land. The primary mortgage deed is usually given to guaranty companies designated by the banks. In general, borrowers are required to take out a fire insurance designated by guaranty companies and to establish the right of pledge for these guaranty companies. Borrowers have to pay JPY30,000 per property as administration fee. Guaranty fee depends on loan amount, loan period and the ratio of repayment amount in annual income.

Examples of the unique loans given by the four banks are: housing-related expense loans, two-generation loans, and parents-kids relay loans. Some banks give as much as 200% of appraisal value of collateral, for refinancing and buying houses.

### **3.3. Establishment of a Credit Risk Management System - Reference to Examples in Japan**

The most important task for banks is risk management. Credit risk management is particularly important. Of risk management systems of banks, credit risk management systems have been studied intensively in recent years but understanding is not yet sufficient. The real credit risk management system must cover all types of lending of a bank. Credit risk reportedly accounts for approximately 60% of all risk of a bank. It is strongly desired to establish a credit risk management system as soon as possible.

The Japanese financial institutions are suffering from large amount of bad loans after the economic bubble burst. All banks are earnestly tackling to establish effective risk management systems in recent years. It is beneficial to refer to these efforts in Japan. Risk management, credit risk management in particular, of Japan's four big financial groups is described below. The data is derived from the four banks' annual reports for the fiscal year 2001.

Bank groups are abbreviated as follows for readers' convenience: Mitsubishi Tokyo Group for Mitsubishi Tokyo Financial Group, Mizuho Group for Mizuho Financial Group, Sumitomo Mitsui for Sumitomo Mitsui Banking Corporation, Tokyo-Mitsubishi for Bank of Tokyo-Mitsubishi, Fuji for Fuji Bank, DIK for Dai-Ichi Kangyo Bank, Kogin for Industrial Bank of Japan, Sanwa for Sanwa Bank, and Tokai for Tokai Bank.

### 3.3.1. Credit Rating System

Mitsubishi Tokyo Group uses the unified credit rating system throughout the group members for appropriate adequate reserves for doubtful accounts and make necessary write-off. In credit rating, a default rate corresponding to respective rating stage is benchmarked.

At Mizuho Group, the credit rating system is an important credit risk management infrastructure. At DIK, all borrowers are rated to a 15-stage credit rating table in principle. All assets are evaluated for credit risk using a uniform method.

The corporate examination technique employed by Kogin is based on comprehensive analysis and assessment of industry trend and actual condition of not only finance but also management of a business.

The Sumitomo Mitsui internal rating system comprises Debtor Rating that shows by indices certainty of payment by debtors and Case Rating that shows by indices certainty of credit recovery.

Sanwa assesses the financial state of an account from three viewpoints of safety, profitability, and cash flow. The objective credit rating procedure uses 10 (16 with additions) rating stages. The rating procedure is reviewed yearly to reflect the condition of the debtors.

The credit rating technique used at Tokai is a combination of qualitative and quantitative analysis to ensure objectivity.

### 3.3.2. Management System

Mitsubishi Tokyo Group operates three departments to manage overall risk, credit risk, and market risk, respectively. General Risk Management Committee meets once every 3 months. At Tokyo-Mitsubishi, General Risk Management Office is responsible for risk at large and manages all types of risk comprehensively. Standing committees include Risk Management Committee, ALM Committee, Investment and Loan Committee, and Information Security Management Committee. Within the framework of the Tokyo-Mitsubishi risk management system, marketing and examination are separated from each other at all business divisions so that both departments mutually exert their "check and balance" function. Loan Planning Office is responsible for examination and credit granting throughout the bank to ensure rationalization and enhanced efficiency in loan granting process.

Portfolio Management Committee at Mizuho Group is a management and policy committee responsible for credit risk management. General Risk Management Department and Credit Granting and Planning Department jointly plan and execute basic matters related to credit risk management.

At Fuji, the general risk management policy is discussed in semi-annual Risk Management Meeting. Monthly management meetings follow up the decisions of the semi-annual meeting. Chief Risk Officer (CRO) is a detached and independent officer from profit making departments, exerting a strong checking function. Credit Risk Management Committee at DIK discusses problems related to credit granting and credit risk management, taking necessary action as required for the entire bank. The risk management officer chairs the committee. At Kogin, Examination Department and General Risk Management Department, independent from marketing divisions, cooperate with each other to manage credit risk across the organization. At Sumitomo Mitsui, General Risk Management Department is independent from other business departments. It manages risk in general systematically and in broad perspective in cooperation with Management and Planning Department.

At UFJ Group, the executive officer for the risk management unit recognizes, grasps, and adequately manages risk existent in the group individually and generally. At Tokai, General Management Division manages risk for the entire company. The Division consists of Risk Management, Loan Management, Clerical Work Management, and System Control Department.

### **3.3.3. Credit Risk Metrics**

Mitsubishi Tokyo Group is currently collecting past performance data from group companies for the purpose of credit risk metrics. Tokyo-Mitsubishi collects default data by credit rating and recovery performance data by type of mortgage. The data are used for risk computation based on internal data.

At Fuji, credit granted for each account and real credit granted considering the value of mortgage (are grasped on the daily base) to metrize expected average loss (= credit cost) for the next 12 months and the maximum allowed excess (= credit risk volume) above the expected average loss. DIK analyzes profitability and risk level distribution for each loan considering cost of nonperforming loans. Using the result, they establish practical measures to enhance risk/return and strengthen portfolio management.

At Sumitomo Mitsui, data are collected by debtor and credit granted to develop and expand the database. They analyze probability distribution for possible losses in the entire portfolio (how much loss with what probability) using rating transition probability, recovery rate, and other parameters. This enables them to foresee the degree of possible loss.

Sanwa derives default rates by rating using the past financial data of borrowers. Simulation is used to find distribution of future losses in the portfolio.

### **3.3.4. Portfolio Management**

Mizuho Group focuses on the portfolio in credit risk management. They estimate possibility of bad debt loss occurring from the credit portfolio using a statistical method. The resultant metrics are expected average annual loss (= credit cost) for the next 12 months and the maximum possible excess (= credit risk volume) above the expected average loss. Fuji classifies portfolios by business type, area, internal rating, large credit account, etc. to monitor and analyze the portfolios regularly. They make sure that the existent credit risk is strictly under control. At Kogin, biased credit granting to certain business groups, industries, or areas is effectively adjusted using credit risk control techniques and metric approaches. This assists in proposal of an adequate portfolio.

At UFJ Group, credit limit and credit limited business types are defined in the portfolio management to exclude the risk that loans are excessively concentrated on certain accounts, business type, area, or otherwise similar categories of business. This is effective for distributing credit risk.

### **3.3.5. Capital Appropriation System (Allocation of Risk Capital, Management by Risk Capital)**

Mitsubishi Tokyo Group operates the capital appropriation system to conduct high-level risk management in conformity with revenue target and marketing strategies. With this system, various types of risk are calculated using standard scales to define economy capital. The economy capital is then, within the range of owned capital, appropriated to various segments by affiliate, risk, business type, etc. Mizuho Group allocates risk capital (resources are owned capital, etc.) to various business units and the business units carry on activities within the allocated risk capital.

Fuji also appropriates risk capital. Sumitomo Mitsui has introduced a system called management by risk capital. In this system, capital is effectively distributed according to marketing strategies within the physical managerial strength (owned capital).

### **3.3.6. Rules and Manuals**

Fuji maintains the Basics and Codes for Credit Granting Procedures. All staffs engaged in credit granting business share the rules to ensure universal credit granting stance and secure soundness of loan assets.

DIK established the basic credit risk management policy called Basic Policy for

Credit Risk Management in 1999. They also developed Credit Granting Portfolio Management Rules.

Sumitomo Mitsui developed Risk Management Rules covering all basic rules to be observed in risk management. They furthermore established Credit Policy when they started as a new bank in 2001. UFJ Group operates Credit Risk Management Rules, based on which individual affiliate banks prepare various rules, standards, and bylaws for estimating credit risk in consideration of credit rating, country rating, credit risk metrics, and self assessment. Sanwa ensures adequacy of risk management by deciding on a series of risk management rules including Risk Management Basic Rules at the board of directors and operating and reviewing them regularly.

## **4. Fundamental Policy to Establish a Mortgage/Guarantee System**

### **4.1. Necessity to Build the Mortgage/Guarantee System**

#### **4.1.1. Objective of the Mortgage/Guarantee System**

Establishing a housing finance-related guarantee system in China has three major purposes:

- 1) To complement the credit of housing finance users as a type of the settled social systems significantly influential over the people's living. In this sense, the security system would lead to the construction of a credit system in the future for all over the Chinese society, especially directly to an improvement of personal credit.
- 2) To positively support those who desire a housing finance, especially among the medium-/low-earning strata. In this sense, the security system would turn out as the footing to support the wholesomeness of housing promotion and housing finance systems in the future of China. At the same time, it will back up a smooth implementation governmental long-term housing policies.
- 3) To support those housing finance users, who have really encountered with difficulties in refunding their loans. In this system, the security system does not contribute only to the safety and stability of personal living but also to the stability of all over the society.

#### **4.1.2. Necessity to Build the Mortgage/Guarantee System**

- (1) It may be safely said that China has not yet built up the housing finance mortgage guarantee system to date. Judging from the managerial status of each existing guarantee organization, an inauguration of housing finance guarantee services have had an obviously positive impact on the expansion of housing finance and of housing promotion. Nevertheless, some problems have been being actualized anyway, including a level-off of guarantee services in some cities, a more and more incremental pressure of risks, a poor supervisory management on housing finance guarantees and a future shortage for finance guarantee specialists, coupled with an extension of the housing finance guarantee services in the future.
- (2) There is a principle of safety as one of the basic rules for a banking institution to offer a loan. To this end, the bank investigate a loanee for credit. At the same time, they usually take credit preservation measures, such as mortgage, guarantee, insurance, etc. Housing loans, in particular, involve a large amount of money and a long term for

personal financing. Consequently, credit investigations and credit preservation measures are of great importance.

- (3) It is not limited to China only that those challenges imported on a guarantee system are how to maximize those willing to purchase housing while minimizing the risks of both individuals and banking institutions. To this end, it is essentially necessary to construct a guarantee system as tailored to the character of a real loan-user stratum and to set up a corresponding guarantee organization, including the buildup of an appropriate risk management system/techniques.
- (4) In China, furthermore, housing is expensive for income in general. With this actual situation taken into account, it is likely that a large amount of borrowings would lead to an excessive burden on making a monthly refund. With a credit rating system implemented in housing loanees, a refunding term should be set longer to reduce the monthly refund amount so that medium-low-income strata may obtain housing with ease. Thus, it is called upon to operate the system in a combination of loans and credit complements.

## **4.2. Direction in which Mortgage/Guarantee System be Established**

### **4.2.1. Constructing Mortgage/Guarantee System**

#### **(1) Introducing Credit-Complimenting Mechanisms:**

Existing national affairs and changing social environments in China make it very difficult for loan users to give surety for their loans. For a banking institution, housing finance is a long-term lending to an individual person. To examine the credit of a loanee and to control its mortgage, it is necessary to have the basic know-how different from that required for a conventional entrepreneurial finance. And wariness is essential to a possible growth of risks, coupled with an expansion of finance. From a housing loan user's point of view, on the other hand, failure to smoothly take an appropriate guarantee means makes financing itself difficult, thereby forcing the loan user to give up the obtainment of housing. This will surely have a directly harmful impact on the housing promotion policy all over the China.

To break through such bottleneck, it is considered as a significant course of designing the system to introduce the credit-complementing mechanisms on an agency-guarantee basis rather than on a personal surety guarantee basis. Considering that the credit compliment service itself has an inside-outside relation with the loan service, it is essentially necessary that a loan should act integrally with a credit preservation. The guarantee service has turned out to be a type of financial services. And a mortgage guarantee agency is also called upon to have a

function of financing.

(2) Introducing Governmental/Private Role-sharing Mechanisms:

It may be safely said that the rate of default in China will inevitably increase from now on, coupled with an expansion of housing loan users in this country. Public and private housing finances should cover their respectively different users while having political targets different to each other. Thus, both public and private banking institutions should complement their roles to each other, thereby forming the mechanisms for an overall housing finance system. In the mortgage/guarantee system, likewise, it is important to build up the public and private guarantee systems at the same time. And it may be safely said that an implementation of the mechanisms to have roles shared by and between governmental and private sectors would be indispensable for the stages of constructing the system.

The public guarantee system should play two roles as part of the public housing finance system: one is to expand housing loan users and the other to have a policy-oriented guide supported by a housing-acquisition behavior. To this end, the public guarantee organization's services should cover policy-oriented housing finance, first. In other words, the services should those loanees and loan properties, which would lead to an implementation of housing policies. Coupled with this, it is necessary for a public guarantee organization to make a more careful risk management than a private guarantee organization. With consideration given to the character of those to be guaranteed, however, it is necessary to minimize the guarantee cost all the more. It may be considered as mission of a public guarantee organization to be able to offer more favorable and convenient services for users through an optimum risk management and an optimum cost control.

(3) Introducing the Mechanisms to Combine a Traversal Service Scheme with an Intensive Supervisory Control System

China has such national conditions as a broad national territory and a significant difference from region to region in level of economy, industrial structure and financial services. Approximately one hundred guarantee organizations have been already established in China on the principle that every city should have at least one guarantee organization. Except for a few cases in individual cities, however, the existing guarantee organizations are mostly small-sized without lateral tie-ups.

From a risk management point of view, there are high possibilities that any scale merit could be implemented because the existing guarantee organizations are independently arranged in parallel from city to city or from region to region. This involves a fear that a guarantee organization may have its functions completely broken down for lack of flexibility in the event



of a real default, especially those defaults which may have concentratedly taken place temporarily due to a change in the industrial structure of a specific region.

To construct a nationwide guarantee system, it is a very effective means to install a nationwide deployment type guarantee organization having a certain level of size from the very beginning as tailored to the realities of each region so that a scale merit may be most effectively used while reducing risks to the minimum. At the same time, it is also a useful measure for a competent governmental organ to conduct on an intensively supervisory management to reduce a total of risks to the minimum.

#### (4) Introducing a Re-guarantee Mechanism while Striving to Diversify Risks

It may be safely said that risk management takes a nucleic position in guarantee services. To positively diversify risks and to preserve credits, it is necessary to taken into account the introduction of a re-guarantee mechanism in addition to the pursuit for mortgage/guarantee.

Generally, it is a re-guarantee mechanism to diversify personal and proprietary risks by buying a specific-purpose insurance.

It should take a basic stance that a public guarantee organization, in particular, links with a policy-oriented finance function to render guarantee services to the medium- and small-come strata. It could be supposed, therefore, that the public guarantee organization may take a higher level of risks than a private guarantee organization. It may be considered especially important, therefore, to provide a re-guarantee mechanism for diversification of risks from the system design stages.

#### **4.2.2. Building up Mortgage/Guarantee System Infrastructure**

To construct a mortgage/guarantee system, it is indispensably necessary to build up the system infrastructure, that is, to provide those conditions that would permit the system to perform its functions fully.

- (1) As nucleus of the system infrastructure, it is necessary, first of all, to build up the legislative architecture relating to obligatory and proprietary rights, claims for damages, auction, credit management and recovery. China has already obtained a WTO membership. In preparation for a more and more severely competitive environment with foreign capitals making inroads in the future, coupled with the participation in the WTO, it may be safely said that China is now urgently required to build up the legislative architecture.
- (2) To establish the personal credit determination criteria as well as to build up the relevant

legislation, it is essentially necessary, first of all, to build up a credit information agency and to accumulate personal credit data. To make a database of this type, it is necessary to construct such a system that would allow both lending enterprises and their customers may enjoy the merits of such database. It is unnecessary, however, for a guarantee agency either to establish a credit information organization by itself or to construct a personal database. Rather, a similar purpose would be achievable by creating those mechanisms where the system owned by a banking institution is effectively usable. To this end, how to construct the information system and to make its effective use is of critical importance.

(3) Guarantee services themselves, such as to confirm an obligatory right to be claimed or the like, are those operations which require some know-how. It will be necessary, therefore, to cultivate those specialists who are also skilled in collecting the credit. It is indispensable to tackle strategically and systematically the installation of a public agency to certify qualified people.

(4) In relation to what is referred to above, it is essential to establish the training system where expertise and know-how may be learnt to cultivate human resources. In addition, it may be safely said that such a training system is being built up in linkage with a certification system.

### **4.3. Measures to Establish Mortgage/Guarantee System**

#### **4.3.1. Establishing Public Guarantee Organization**

##### **(1) Key Points in Constructing a Public Guarantee Organization**

To set up a public guarantee organization, there are five essential and critical points as follows:

- 1) Make effective use of scale merits.
- 2) Grasp the causes of arrears and build up the measures to compress loans in arrears.
- 3) Set a guarantee fee and save an obligatory reserve fund.
- 4) Build up the specific measures to recover obligatory rights, including the related legislation.
- 5) Establish the legal position of a guarantee agency.

##### **(2) Public Guarantee Organization Framework**

As far as the framework of a public guarantee organization is concerned, its key points are proposed as shown in a table below.

**Table 4-1 The Framework of a Public Guarantee Organization**

REQUIREMENTS	FUNDAMENTALS
Name (tentative)	Central Housing Guarantee Organization
Organization character	<ul style="list-style-type: none"> <li>• Public service body</li> <li>• Non-taxable legal person</li> <li>• Financing line of business</li> </ul>
Organization's service range	<ul style="list-style-type: none"> <li>• Guarantee involved in housing loans, housing brokerage</li> <li>• Insurance services</li> <li>• Policy-oriented</li> </ul>
Supervisory management scheme	<ul style="list-style-type: none"> <li>• Joint competence by Ministries of Construction and of Finance, People's Republic of China, People's Bank of China</li> <li>• Ministry of Construction: guarantee system and supervisory management of policies</li> <li>• People's Bank of China: supervising and managing the guarantee-related consignment finance services</li> <li>• Ministry of Finance: To supervise and control budgetary appropriations and financial standings</li> </ul>
Organizational structure	<ul style="list-style-type: none"> <li>• Regional deployment type organization on a nationwide level basis</li> <li>• Central head office (1 location) → ministerial level branch (one per ministry) → municipal sales office (one per city)</li> </ul>
Major functions of central head office	<ul style="list-style-type: none"> <li>• Adjust the Central Government's policies in relation to the guarantee of policy-oriented loans.</li> <li>• Adjust the Central Government's policies in relation to the guarantee of general loans.</li> <li>• Adjust mortgage/guarantee-related systems and policies (performance evaluation, property assessment, performance guarantee, completion guarantee, etc.)</li> <li>• Arrange and cultivate human resources (staffing and training).</li> <li>• Make arrangements on an inter-organization basis at a ministerial level (human and monetary).</li> <li>• Make arrangements with the head office of a consignee banking institution or of a tied-up insurance company or the like.</li> <li>• Issue bonds and debentures.</li> </ul>

REQUIREMENTS	FUNDAMENTALS
Main functions of sales offices at a municipal level	<ul style="list-style-type: none"> <li>• Make arrangements with local governments (human and monetary).</li> <li>• Adjust the guarantee-related systems and policies of local type (within a ministerial range and in a neighboring province).</li> <li>• Make arrangements with the branches of a consignee banking institution and of a tied-up insurance company.</li> <li>• Make a risk management in a region (within a ministerial range) (risk reverse funds, credit recovery, etc.)</li> <li>• Cultivate human resources at a ministerial level (staffing and training).</li> <li>• Make arrangements on the basis of inter-municipal sales offices within the ministry.</li> </ul>
Principal functions of sales offices at a municipal level	<ul style="list-style-type: none"> <li>• Make arrangements with a municipal government.</li> <li>• Make arrangements with the window to a consignee banking institution and of a tied-up insurance company.</li> <li>• Control guarantee fees.</li> <li>• Collect the credit (control the obligees whose compensation demanded).</li> </ul>
Fund raising	<ul style="list-style-type: none"> <li>• Central and local financial standings (budgetary appropriations)</li> <li>• Contributed by a group of the Central Housing Bank of China (tentatively named)</li> <li>• Issue bonds and debentures (in case where requirements are satisfied)</li> <li>• Guarantee fees (maintenance expenses)</li> </ul>
Risk Management Scheme	<ul style="list-style-type: none"> <li>• Unify with loan services (standardize examination procedures.)</li> <li>• Totally operate guarantee fees.</li> <li>• Ministerial pool type risk reserve funds (to be financed in the event of concentrated defaults)</li> <li>• Directly control those obligees whose compensation should be demanded (non-service consignment type)</li> </ul>
Service Consignment/Tie-up System	<ul style="list-style-type: none"> <li>• Consign the window of a commercial bank with such services as examinations, guarantee fee collection, account management, etc.</li> <li>• Tie up with an insurance company to render re-guarantee services.</li> </ul>

Source JICA Study Team

#### 4.3.2. Building up Commercial Bank-affiliated Guarantee Agencies

##### (1) Key Points in Constructing a Commercial Bank Guarantee Organization

The most critical key point for the private sector constructing an agency guarantee system is to build up the guarantee agency belonging to a commercial bank, that is, to build up a

guarantee organization affiliated with a commercial banks.

To build up a commercial bank-affiliated guarantee company, it is worthy of paying attention to the following requirements in addition to the five major ones already referred to when building up a public guarantee organization.:

- 1) Guarantee the housing loans offered by the parent bank as an affiliate with the banking institution.
- 2) Completely take over the examination and mortgage paperwork of the parent company.
- 3) Guarantee the default arising from an earthquake or any other disaster.
- 4) Permit the credit to be operated flexibly while making effective use of the relationships between parent and child companies.
- 5) Leave the room to undertake the guarantee of consumer finances in general rather than specializing in housing loans only.

## (2) Framework of Commercial Bank-affiliated Guarantee Organization

The lending commercial banks in China (typically the so-called four major commercial banks, such as Industrial and Commercial Bank of China, China Construction Bank, etc.) have already had a certain size as nationwide deployment type banking institutions. A guarantee agency affiliated with a nationwide deployment type banking institution would be able to make fully effective use of scale merits available in the group (a parent bank and a guarantee agency as a subsidiary). And it will be also possible to construct shops with functions different as tailored to a regional level.

Building-up a commercial bank-affiliated guarantee organizations is really difficult for each commercial bank to tackle at the same time. It may be recommended, therefore, that the project should be inaugurated by the commercial bank that has had such needs and satisfied the requirements. In the future, moreover, it is likely that those banks which have a relatively small size without having advanced the nationwide deployment will build up a jointly affiliated guarantee agency as required, considering that it is impossible for them to build up their own affiliated guarantee agencies.

As far as the framework of a public guarantee organization is concerned, its key points are proposed as shown in a table below.

**Table 4-2 Framework of Commercial Bank-affiliated Guarantee Organization**

REQUIREMENTS	FUNDAMENTALS
Organization character	<ul style="list-style-type: none"> <li>• Stock company</li> <li>• Taxable legal person</li> <li>• Financial line of business</li> </ul>
Organization's service range	<ul style="list-style-type: none"> <li>• Housing loan-related guarantee service</li> <li>• Miscellaneous guarantee/insurance service</li> </ul>
Supervisory management scheme	<ul style="list-style-type: none"> <li>• Lead taken by the People's Bank of China</li> </ul>
Organizational structure	<ul style="list-style-type: none"> <li>• Nationwide deployment type organization in an individual commercial bank and a federation of commercial banks</li> <li>• Central head office (1 location) → ministerial level branch (one per ministry) → municipal sales office (one per city)</li> <li>• Two or more affiliates are allowed to exist in an identical area.</li> </ul>
Major functions of head office	<ul style="list-style-type: none"> <li>• Make arrangements with the head office of a banking institution as parent company (e.g. head office of the four major commercial banks).</li> <li>• Make arrangements among affiliated guarantee agencies at a ministerial level (human and monetary).</li> <li>• Pool and adjust funds and risk reserves.</li> <li>• Arrange in place and cultivate human resources (staffing and training)</li> <li>• Issue bonds and debentures.</li> </ul>
Major functions of branches at a ministerial level	<ul style="list-style-type: none"> <li>• Make arrangements with the branches of a banking institution at a ministerial level.</li> <li>• Make arrangements with the window to a municipal affiliated guarantee agency.</li> <li>• Pool and adjust local funds and risk reserves.</li> <li>• Arrange in place and cultivate human resources (staffing and training)</li> </ul>
Principal functions of sales offices at a municipal level	<ul style="list-style-type: none"> <li>• Make arrangements with the counter of a banking institution at a municipal level.</li> <li>• Make arrangements with the window of a service-consignee bank.</li> <li>• Control guarantee fees.</li> <li>• Collect the credit.</li> </ul>
Fund raising	<ul style="list-style-type: none"> <li>• Contribute by a banking institution as parent company</li> <li>• Issue bonds and debentures (in case where requirements are satisfied)</li> <li>• Guarantee fees (maintenance expenses)</li> </ul>
Risk management scheme	<ul style="list-style-type: none"> <li>• Unify with loan services (standardize examination procedures.)</li> <li>• Operate guarantee fees totally among companies within the group.</li> <li>• Pool type risk reserve funds (to be financed in the event of concentrated defaults)</li> <li>• Do not specialize in housing loans only.</li> </ul>
Service consignment/tie-up system	<ul style="list-style-type: none"> <li>• Consign the window of a parent commercial bank with such services as examinations, guarantee fee collection, account management, etc.</li> <li>• Tie up with an insurance company or the like within the group.</li> </ul>

Source JICA Study Team

### 4.3.3. Building up Re-guarantee System

#### (1) Introducing Re-guarantee Insurance:

Owing to its nature, a housing loan has a long term before refunded. It is inevitable, therefore, that the default takes place at a certain percentage. It is necessary to stabilize the default rate (rate of loans in arrears) expected in the future, as a matter of course. The economic society, however, is always encountering structural changes, such as those in social and financial environments and on the labor market. Such a society is forced to take into account those risks which may take place in excess of the range (default rate) allowable in designing the guarantee system. It is essential to build up the re-guarantee system that could hedge such an abnormal risk difficult to predict.

Especially a public guarantee organization is in a position to play the roles of expanding a stratum of housing loan users and of supporting the political guidance involved in housing. Consequently, it may be assumed that the public guarantee organization may take a far more larger and unforeseeable risk, too. Nothing but the public guarantee organization must have established those mechanisms which would be sufficiently enduring against such an abnormal risk from the very beginning of system design stages.

A re-guarantee system design is not limited to one selection only. Nevertheless, the loan user has to bear a corresponding guarantee fee (insurance premium) finally. It should be made as a rule, therefore, to minimize the burden on users by suppressing a total amount of guarantee fees.

In the guarantee fees that loan users bear, an insurance may be separately bought for re-guarantee. With the realities of insurance in China taken into consideration, however, the scheme considered most efficient is likely to be interlocked with a collective life insurance, a non-life insurance or a so-called collective credit insurance. An insurance collectively handled would permit the insurance premium to be lower than usual.

Generally, it is a key point to create those mechanisms which will unify mortgage, guarantee and insurance, with a re-guarantee insurance introduced.

#### (2) Mechanisms of Collective Insurance for Re-guarantee

##### 1) Personal Insurance

In preparation for such an unforeseeable event that an obligee has died or has been disabled at an advanced level, the personal insurance has a purpose of refunding a total of credit so that the loanee can secure its house and that the loaning institution may preserve the credit. Thus, risks are diversified into three parties: loan user, loaning institution and guarantee agency.

For mechanisms, the loan user signs an obligation compensation consignment contract (tentatively named) with a public guarantee agency in the form of a collective credit life insurance. With the guarantee agency acting as both policy holder and beneficiary, a collective credit life insurance contract is signed with a specified life insurance organization, while reckoning the loanee of a public banking institution as the insured. The insurance money paid by the life insurance organization is used by the guarantee agency to indemnify the balance of obligations on a blanket basis.

The insurance is undertaken jointly by the leading life insurance companies who have deployed their services at every part in China while the paperwork is being done region by region. Upon startup of the system, however, there are also possibilities that a single insurance company satisfying all requirements may be designed.

The insurance has a policy-oriented nature. It may be envisaged within a field of view, therefore, that the Government provides a financial support through a budgetary appropriation to organize a specific service department, to develop a lower-priced insurance article than usual and to deploy services, too.

## 2) Property Damage Insurance

If the property covered by a loan should be damaged by a fire, disaster or the like, the property damage insurance is intended to refund the obligations or to restore housing with the insurance money so that both banking institution and guarantee agency may conserve their credit.

Insurance services are rendered similarly to the personal insurance referred to above.

The insurance money payable covers a range of mainly fires, lighting, explosion, storm, flood and water leakage in the event of an accident in a feed/sewerage system. As far as the special damage due to an earthquake, volcanic eruption, high tide or the like is concerned, it is necessary to study whether or not such damage is covered by the insurance. As compared with the coverage of an ordinary insurance signed by an individual person with an insurance agency, the property damage insurance involved in housing should preferably expand a range payable.

## 3) Building up Re-guarantee Agency (developing a re-guarantee article)

The insurance agency that offers insurance services or insurance articles for re-guarantee to a public guarantee organization may be deemed to have a political function in a certain sense. With a financial allowable available, it may be envisaged to install a public insurance agency specializing in re-guarantee services only. The similar purpose, however, will be achievable if the footing and network of an existing insurance company are effectively used to develop a housing loan re-guarantee article



newly. In this case, it is necessary for the Government to provide a budgetary appropriation or a deregulation and the like to support a private insurance company sufficiently to cover such policy-oriented insurance article.

To select an insurance company, who offers a re-guarantee insurance services to a public guarantee organization, it is desirable that the insurance company should be capable of securing scale merits while being nationwide deployed similarly to the public guarantee organization.

For an image of the re-guarantee agency (services), the key points enumerated in a table below are proposed:

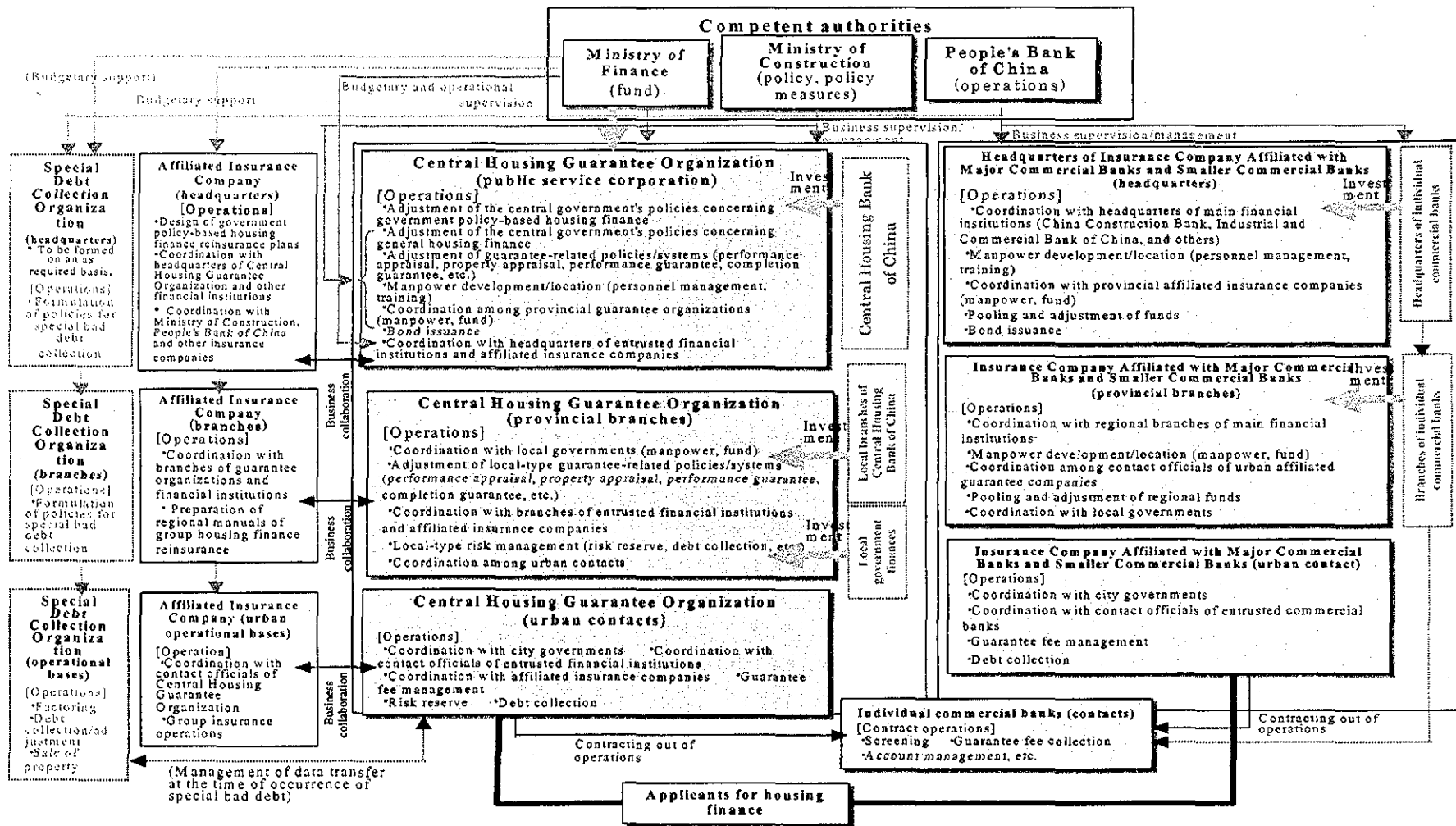
**Table 4-3 An Image of The Re-guarantee Agency (services)**

REQUIREMENTS	FUNDAMENTALS
Organization Character	<ul style="list-style-type: none"> <li>• An independent public insurance agency or a specific public service department in general insurance companies</li> </ul>
Organization's service range	<ul style="list-style-type: none"> <li>• Insurance services, including a housing loan re-guarantee insurance</li> </ul>
Supervisory management scheme	<ul style="list-style-type: none"> <li>• A supervisory control department or financial department (to supervise public budgetary appropriations) in the insurance industry</li> </ul>
Organizational structure	<ul style="list-style-type: none"> <li>• A nationwide region deployment type organization (compatible with a public guarantee organization)</li> <li>• A system of one company per region, in principle</li> </ul>
Major functions of head office (related departments)	<ul style="list-style-type: none"> <li>• Design a housing loan re-guarantee insurance.</li> <li>• Make arrangements with the head offices of a public guarantee organization and of a banking institution.</li> <li>• Make arrangements with the Ministries of Construction and of Finance, People's Bank of China and an insurance business entity.</li> </ul>
Major functions of branches at a ministerial level	<ul style="list-style-type: none"> <li>• Make arrangements with the branches of a public guarantee organization and of a banking institution.</li> <li>• Prepare a regional manual relating to housing loan re-guarantee insurance.</li> <li>• Pool and totally operate insurance premiums.</li> </ul>
Principal functions of sales offices at a municipal level	<ul style="list-style-type: none"> <li>• Make arrangements with the window to a public guarantee organization.</li> <li>• Services on a collective insurance basis</li> </ul>
Fund raising	<ul style="list-style-type: none"> <li>• Invest in the body of an insurance company.</li> <li>• Partial financial support</li> <li>• Insurance premiums (maintenance expenses)</li> </ul>

Source JICA Study Team

4.3.4. Overall Image of Mortgage/guarantee System (Organization) involved in Housing Finance in China

Figure 4-1 Image of Guarantee System/Mechanism



Source: JICA Study Team

## **5. Direction in which Infrastructure Supporting Housing Finance-related Systems Reform should be Built up**

### **5.1. Housing-related Information Systems and their Buildup Measures**

#### **5.1.1. Building up Housing Finance Information Systems**

##### **(1) Functions Required for Housing Finance Information System**

###### **1) Stages of Transfer from Existing System to Control Organization Type:**

At present, there are approximately 2300 Provident Fund Management Centers (PFMCs), which are to be consolidated in the order of Municipal PFMCs → Ministerial PFMCs → Central PFMC. The Central PFMC may be deemed to have two main functions: one is to promote the consolidation of municipal PFMCs and the other to arrange human resources in place. These are called upon to be materialized from an information system buildup point of view, too.

###### **2) Stages of Transfer from Management Organization to Systematic Finance Type**

The Central Housing Finance Organization has a function of newly issuing debentures so that funds may be independently raised from the financial market. This organization, therefore, is to render loan services newly to house-supplying bodies to sell and lease private housing. With loanees so extended, a new system buildup will be required for loan examination, mortgage evaluation, credit guarantee, claim recovery, etc. The Ministerial Housing Finance Organization, moreover, will be able to inter-regionally finance, as required, those provident funds consolidated from ministerial PFMCs. These are called upon to be materialized from an information system buildup point of view, too.

###### **3) Stages of Transfer from Systematic Finance Type to Policy-oriented Finance Type**

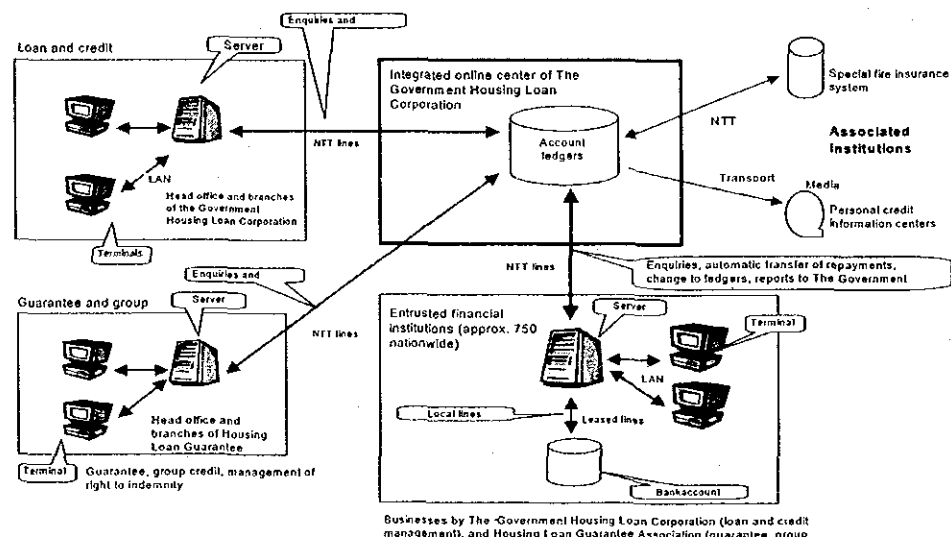
The Housing Central Bank of China (tentatively named) should dissolve the unequal feeling issue likely to increase from now on in the "Stratum Unable to Own Housing" and reduce the burden incurred on lease housing construction, maintenance, control, and repair provident expense at the parts jointly used in collective housing. With these challenges taken into consideration, the HCBoC is to conduct on a wide diversity of fund raising and operations, such as to deposit and operate funds in the Ministerial Housing Finance Organization, to intensify arbitrary provident funds and object taxes and to issue MBS/debentures by making effective use of the capital market.

(2) Specific Network Images of an Integral On-line system between Public Housing Finance Organizations and Commercial Banks

Shown on this page is a specific network image of the integral online system between a public housing finance organization and commercial banks, with the Government Housing Loan corporation and commercial banks in Japan taken up as an example.

The loans offered by the Government Housing Loan Corporation are policy-oriented. The integral online system will also require a system change or changes, coupled with an alteration of the scheme. The system changes do not only require a replacement of the program versions employed in the host but also an upgrade of the versions for the applications borne in exclusive terminals. In addition to the scheme revision, some functional improvements and the like have been done. Such a functional improvement would also require a change in host programs and an upgrade of the versions for exclusive terminals. To carry out these operations, a remote maintenance technique is used so that any changes in the government Housing Loan Corporation may be automatically transferred to the exclusive applications in entrusted banking institutions to rewrite such application software.

Figure 5-1 Integrated Online System Network of The Government Housing Loan Corporation



Source: JICA Study Team

(3) Road Map toward the Materialization of Housing Finance Information System Buildup

1) Clarifying Position of Administrative Organs

It is urgently necessary, first of all, to clarify which organ as administrative organization in charge (a specific department or section in charge belonging to an

organization, such as People's Bank of China or Ministry of Construction) is to be responsible for carrying out the project .

In addition, it is necessary to urgently study what means should be used to materialize the buildup of that housing finance information system (to financially secure budgetary appropriations and to make effective use of the vigor in the private sector, including BOT), etc.), and to what extent the private sector is able to support the system construction and operation, with the private sector assumed to take part in, and what room will be given to a foreign capital, such as a Japanese enterprise, to make inroads in China, including a linkage of partnership with a local enterprise.

#### 2) Road Map toward Materialization of Housing Finance Information Buildup

- Grasp the realities in the housing finance information systems by region.
- Make case studies of Shanghai and Chengdu as forerunning examples.
- Arrange in order the challenges in the existing housing finance information system.
- Outline the housing finance information system asked for.
- Make a Japanese case study (hearing in the Government Housing Loan Corporation).
- Analyze cost-benefits.
- Arrange in order those conditions under which a private enterprise makes inroads into the business.
- Evaluate private enterprises' project chances.
- Prepare a detail road map toward the information system buildup.

### 5.1.2. Building up Personal Credit Information System

#### (1) Functions Required for Personal Credit Information System:

The functions that a personal credit information system is asked to perform are to gather and control the personal credit information according to the contents of transactions in a loan, credit cards, etc. so that such information may be offered for reference to determine a credit rating and manage a transaction after contracted among members. The personal credit information system, therefore, is required to have the following functions:

- Gather the personal credit information.
- Control the personal credit information.
- Prepare and offer the reference materials for credit rating determination and post-contract transaction management.

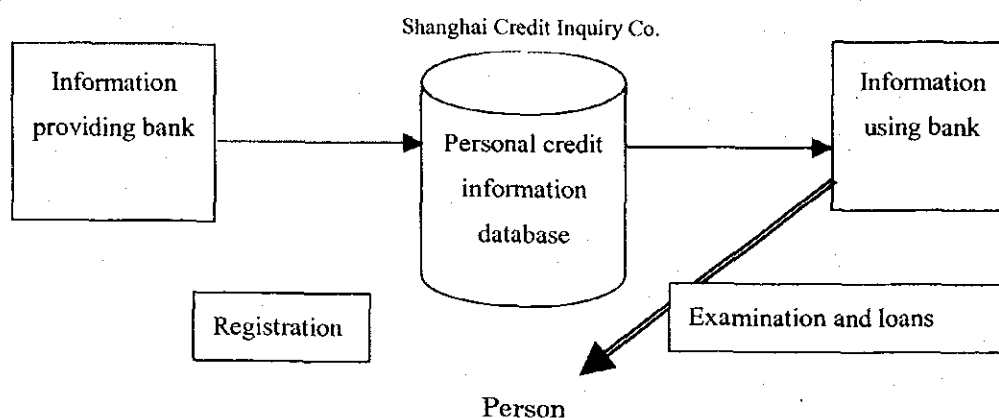
(2) Specific Image of Personal Information System

1) Shanghai Credit Inquiry Corporation (China)

Based on an "Opinion about Expansion of Personal Consumer Loans" published by the Head Office of the People's Republic of China in May 1999, Shanghai Credit Inquiry Corporation (a personal credit inquiry firm, hereinafter abbreviated as "SCIC") was established as the first personal credit inquiry system in China in the same year. SCIC opened an inter-bank personal credit inquiry system for the banks located in the Shanghai area in June 2000. SCIC developed a comprehensive evaluation system of personal credit history in 2001. In June 2000 when the system was opened, SCIC had the inquiry data broken down into 1.8 million personal credit inquiry cases, based on the materials on opening the 680 thousand personal consumer accounts in banks and of 1.18 million accounts for debit cards (a card, which permits a loan to be automatically received from a deposit account).

SCIC is managed under the mechanisms where 0.2RMB is paid to an affiliated bank per case of data sources while collecting 10RMB per case of offered information retrieval.

Figure 5-2 Personal Credit Enquiry System in Shanghai (cited again)



Note: Arrows (→) indicate the flow of information.

Source: Study Team; based on the materials from Shanghai Credit Inquiry Corporation

## 2) Road Map toward Buildup and Materialization of Personal Credit Information System

Recommendably, the personal credit information system buildup should begin with establishing a company to operate a region-limited type personal credit information system, first of all.

More specifically, it is necessary to study a joint establishment of the system integrator to consolidate the computer hardware/software-related business in collaboration with consumer-finance-specializing firms, credit sales companies, credit companies belonging to groups of electric household appliance manufacturers/automakers, department stores, discount shops, bank-affiliated card firms, specialty stores' associations, lease firms, guarantee companies and so on, including the participation of a local administrative organ in some cases.

Subsequently, it may be envisaged that a credit information network is to be constructed in collaboration with two or more personal credit information system buildup/operation companies so as to expand a range of the coverage.

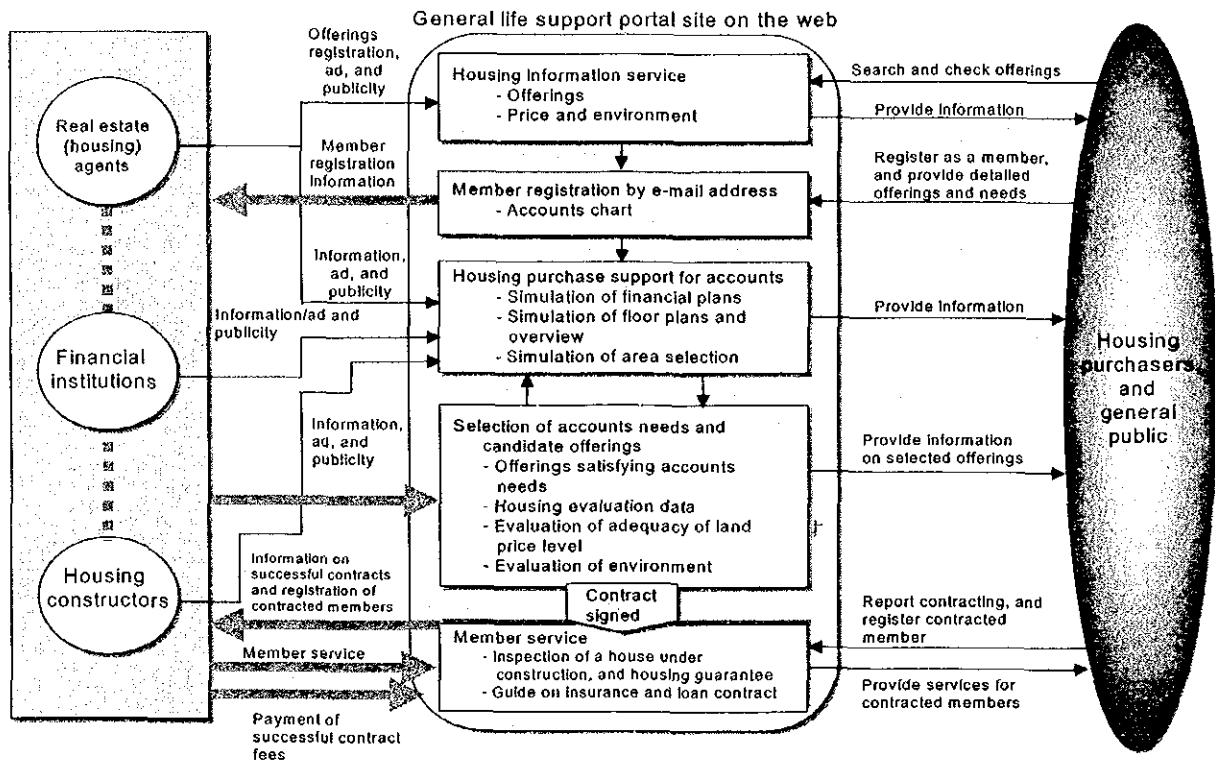
As far as the personal credit information system construction is concerned, moreover, European and American countries, including Japan, are way ahead of China in terms of the housing finance information system as earlier referred to. On the assumption that such information system construction is promoted with the lead taken in the private sector, it will be important to proceed with the materialization of the project while taking into consideration the joint participation of a foreign capital, with the system construction/operation reckoned as incentive.

### **5.1.3. Building up Housing Distribution Information System**

#### (1) Functions Required for Housing Distribution Information System:

The mechanisms of a housing distribution system are described hereunder while using a business model as shown below.

Figure 5-3 A Business Model of Housing Distribution Information System



Source: JICA Study Team

The key lies in who is to construct and operate the housing distribution information system, and who bears the fund required. First, let's think about who bears the fund. A transfer of the price for the housing distribution information system over to the end user (those desiring to acquire a house) would allow us to predict a final exhaustion into price competition, which is naturally not an advantageous measure. Those who could be expected to bear the fund include housing developers, constructors and sales brokers and housing acquisition fund loan entities, including banks. Housing developers, constructors and sales brokers themselves could expect to explore potential customers, expand the sales route, and reduce the fixed cost (labor cost) by offering housing distribution information system services to the end user. When developing personal housing loans, a bank will be also able to offer the added-value service called "housing distribution information system" to the end user while keeping the sales cost suppressed. Both, therefore, may have the fund-bearing mechanisms in a form of property insertion fees, transaction (potential customer) introduction/brokerage and remuneration success in contracting. On the other hand, who should preferably operate the housing distribution information system? It is an Internet portal site where an immense volume of (potential) customer information is available while giving and taking a variety of information to and from



those daily living. At this threshold to the living people's information exchange (portal site), a housing distribution information should be constructed to offer services. This will permit the system to be put into most efficient operation. In addition, the local housing distribution information updating should be entrusted to housing developers, builders and sales brokers and to banks, thereby possibly enabling them to offset their above-mentioned contributions to the fund (partially). With a business model of the housing distribution information system though out as referred to above, it is called upon to be given the following functions:

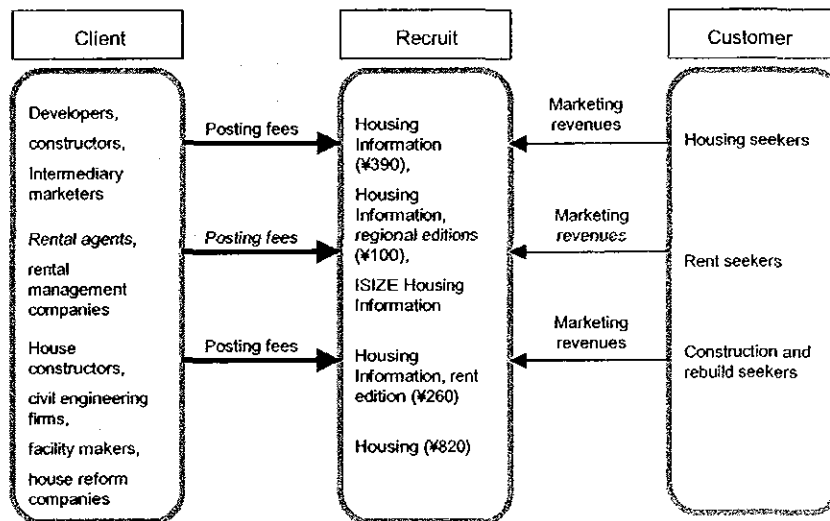
- Register, insert and advertise properties.
- Act as property broker.
- Search for a property.
- Support the fund-planning by those desiring to acquire housing
- Examine the information inserted.

In addition, information screening system, which conducts pre-examination, follow-up examination, and handles user complaints, is established. The ultimate purpose of this system is to convey right information to consumers.

(2) Matching Service Business with Effective Use of Magazines and Internet:

Business Model

Figure 5-4 Recruit Business Model



Examples from "Weekly Housing Information (Metropolitan version)"

Headlines (2 pages): JPY2,000,000/week

Comprehensive properties information: JPY10,000/week

Source: Recruit Co., Ltd.

### **(3) Road Map toward Buildup/Materialization of Information Buildup/Distribution System**

The housing distribution information system should be finally built-up and operated by a private enterprise. It would be difficult, however, to secure the profit for the private business without affording a certain size in the beginning. In addition, it involves some risks in the initial stages of constructing an information system. China, furthermore, has had housing in stock as former corporate houses under the planned economy. In this sense, it is necessary to establish the mechanisms to promote the effective use, maintenance and renewal of such social capital, too. To this end, it is considered that China should bear a certain level of financial burden. Initially, therefore, it may be also envisaged that the housing market brokerage information system should be built up by an organization to be established as invested by the local government under its housing bureau. The existing Housing Real Estate Exchange Center may well guide functions. Even in the private sectors inside the Chinese territory, on the other hand, some enterprises have begun to insert the housing information on Internet. And others have already had a plan to deploy more than 1,000 stores of a housing brokerage franchise (handling not only in-house properties but also conducting on agency operations for brokerage of properties owned by other companies) over the nation on the web by the end of next year. There are possibilities that such enterprises may compete with a public organization, such as the above-mentioned Housing Real Estate Exchange Center, etc. Finally, however, an option belongs to information providers and house vendors as information sources. It is considered, therefore, that good ones should survive and others not so good should be weeded out.

Such housing distribution information should be thought out so as to cover not only PC holders but also those other than Internet subscribers to be informed, with not only brokerage counters but also paper media, such as weekly or the like.

## **5.2. Cultivating Human Resources Concerned with Housing Finance and Establishing Certification System**

### **5.2.1. Direction in which Human Resources Concerned with Housing Finance should be Cultivated and Certification System should be Established**

As footing to construct a housing finance system, it is indispensably necessary to cultivate those who have technical occupational knowledge and abilities.

Training specialists with professional knowledge/abilities and placing these individuals in appropriate and relevant organizations is critical, as a basis of housing finance system. Sustainable personal development can be made possible by developing the right

training programs. Also, staffing can be made more successful by introducing certification system, which systematically places certified employees in the organization.

Housing is real estate. Since civil law is still underdeveloped in China, the relationship among properties, and debentures, mortgages in housing can be very complex. In fact, real estate transactions tend to be troublesome in any countries. One of the ways to make real estate transactions safer and to develop housing finance system soundly and effectively is escrow system.

In order to establish an escrow system, which is based on professional abilities and credibility of third parties, the existing national certifications should be utilized. In addition, comprehensive housing finance-related certifications should be newly established.

For example, certification system for "Housing Finance Manager" that tests knowledge in loans (screening, loans, debenture management, collection), escrow (commission a reliable third party to sell/buy houses, which is subject of loans, and ensure that transaction is conducted accurately) is recommended.

Training programs should be designed while considering certification system.

#### **5.2.2. Methods of Cultivating Human Resources concerned with Housing Finance and of Establishing Certification System**

(1) Constructing an integral training scheme:

1) Building up an integral training organ:

Finally, it is desirable to establish such an organization as a vertical type training organization covering across financial and residential fields, e.g. Central Housing Finance Training Center (tentatively named). It is indispensable, however, to make preparations and accumulate training know-how, such as to build up facilities, start up a training program and secure a staff of instructors. As the first step, therefore, it may be considered more realistic to strengthen the existing training schemes in both People's Bank of China and in the Ministry of Construction more than ever so that it may begin with a new creation of the housing finance-conscious training curriculum. To this end, it is indispensably necessary for the departments in charge of human resource cultivation in the People's Bank of China and in the Ministry of Construction to use their leaderships to make arrangements with the related department of each commercial bank or with each regional construction department. The steps as a whole are supposed as under.

a) The People's Bank of China and the Ministry of Construction make arrangements

with their own training schemes inside their own in-house systems, and build up an intra-system vertical training organization while providing the contents of housing-related training.

- b) Strive to keep the People's Bank of China in close contact with the Ministry of Construction so as to share the housing-related training programs, and allow for the use of training facilities, and form a joint network of instructors, so as to establish the scheme in which some training units may enjoy training to each other.
- c) Build up the housing finance joint training facilities under joint jurisdiction of the People's Bank of China and the Ministry of Construction so as to start up a common training program.
- d) As required, install a Central Housing Finance Training Center (tentatively named) and its local centers so as to build up a nationwide network of training systems. Under the Central Housing Finance Training Center (tentatively named), it is necessary to install the secretariat, training management department, training aids department, training facility operation department, etc. Though dependent upon the overall size, moreover, it is also necessary to cultivate instructors and to organize a purchase-collaborating department, too.

## 2) Making Effective Use of Existing Facilities

Constructing an integral training scheme is mainly to integrate a control organization and consolidate the principal contents of training. To this end, the existing facilities, such as a research facility owned by a leading commercial bank, should be made most effective use of. Besides, an effective use of facilities in a university or the like may be considered as one of the choices.

## (2) Starting up Compost Training Programs and Making Effective Use of Diversified Training Forms

### 1) Starting up Composite Training Program:

When starting up a housing finance-related training program, it is necessary to intentionally think it as something composite. More specifically, it is necessary to provide some course elaborately thought out as tailored to a level of trainees, purpose of the training, field to which importance be attached, main occupation ability type, interlocking certifications and so on.

As leader training levels, for example, it is necessary to provide the primary class (chief term member and team leader), medium class (superintendent and chief), and advanced class (superintendent and above). General personnel training also need be

ranked into primary level (new comers), medium class (experienced workers), and advanced class (those with a career). Technical training, moreover, should be divided into two fields: financing and housing. Besides, what is contained in related fields should be also included.

## 2) Making Effective Use of Diversified Training Forms

If a balance is taken into consideration between the needs of training and the training facility buildup/program startup, it is indispensable to make effective use of diversified training forms from a short-term point of view.

As an alternative, it may be envisaged to open a related technical course or specializing seminar in a university. For time zones, training may be continuously opened in the nighttime and intensively during the summer or winter vacation. To secure instructors, moreover, the issue will be dissolved smoothly through their cultivation or through collaboration with the university.

In initial stages, furthermore, the existing information network and an available communication means may be used to take into consideration cable TV training and Internet remote training.

### **5.2.3. Building Certification System in Housing Finance**

#### (1) Making Effective Use of Existing Certifications

To construct a housing finance-related certification system, the first step is to make effective use of the existing certifications closely related with housing finance services. In other words, the organization (including the autonomous efforts of an individual) is to positively support the personnel engaged in housing finance services to obtain a certification suitable for their respective services and careers. In this stage, a training program is also desirably to install a specific certification course.

#### (2) Building up Certification System at Three Levels;

To build up the certification system, it is necessary to create those mechanisms which would allow a certification candidate to make efforts step by step. It is not intended, moreover, for an organization to let personnel obtain a higher level of certification (national certification) itself but to aim at improving the ability of rendering services, coupled with the obtainment of a certification so that the personnel may upgrade their performance. Different levels of certification systems, therefore, are called upon to coexist.

The table below shows a basic image.

**Table 5-1 Building up Certification System at Three Levels**

LEVEL	APPLICATION (APPROVED)	CONTRIBUTION TO ORGANIZATION (POSSIBILITIES)
National certification Certification and certification at a national level	Nationwide (partially effective internationally)	<ul style="list-style-type: none"> <li>• Contribute to an upgrade of the organization to a higher rank.</li> <li>• Contribute to an improvement of manpower level all over the organization.</li> <li>• Contribute to an improvement of performance all over the organization.</li> <li>• Appealable to the exterior.</li> </ul>
Individual industrial license, certification and certification Composite industrial license, certification and certification	Within an industrial sector	<ul style="list-style-type: none"> <li>• Contribute to an improvement of manpower level all over the organization.</li> <li>• Contribute to an improvement of performance in an organization.</li> </ul>
Intra-organ certification (service ability assessment norms)	Within an organ (e.g. within a bank/within a bank group)	<ul style="list-style-type: none"> <li>• Contribute to an improvement of basic manpower level.</li> <li>• Contribute to an improvement of performance in an organization.</li> <li>• Contribute to a transparent and objective evaluation of personal affairs.</li> </ul>

Source: JICA Study Team

A certification within a limited organization, however, is persistently apart from a promotion in the so-called management line rankings. It is an intra-organization system to determine, based on certain standards, such as personnel ability, occupation, school education, number of service years, etc. The intra-organ system should generally take into consideration the status of those national certifications and/or licenses obtained validly within an industrial sector. It should be noted, however, that the intra-organ system is characteristically different from a national system.

### (3) Creating Comprehensive Housing Finance Certifications for the Future

Comprehensive certifications in the field of housing finance need to be developed for the future, in addition to utilizing numerous types of existing certifications. Creation of "Housing Finance Manager (tentative name)" certification should be investigated, together with trainings related housing finance.

Persons in charge in banking institutions may be trained for the purpose of learning the knowledge about finance services (examination, loan, credit management, recovery, etc.), including the updated information about the public housing finance system. Upon completion of such training, they take an examination to qualify as the "housing finance manager" as mentioned above. Organizations mainly concerned, such as Ministry of Construction, People's Bank of China, may prepare an examination questionnaire for the certification. Coupled with the progress of systems, policies and techniques in the housing finance field, moreover, periodic training may be mandatorily required. And it may be taken for the requirement to renew the validity of certification.

## **5.3. Aiming at Activation Housing Market**

### **5.3.1. Necessity of Studying the Measures for Activation of Used/Rented Housing Market**

A thought about the medium-/long-term sustained activation of housing markets in China should be based on the following fundamental recognition, with priority given to the formation of used housing and private lease housing markets:

Owned and rented houses are two wheels used to establish an activated housing market. Especially in a large city, dwellings are moving remarkably, coupled with a population inflow and a change in family configuration/life style. Nearer and near to the urban centers, moreover, private rented houses (houses to let) have their importance increased all the more. In addition, it should be desirably recognized that both owned and rented houses are meritorious for house-purchasing prospects and housing market developments (economic growth). And it is desirable to expand a range of the housing-loan users' selections from the viewpoint that economic resources should be effectively distributed. A housing policy, including a financial policy, requires consideration and response for the formation of houses in stock, maintenance and improvement.

In China, a variety of policies have been being deployed to supply and dwell (consume) owned houses newly constructed. This country, however, has lagged behind in deploying studies and policies to distribute used houses, important component of the housing market, and to form and activate the (private) rental market. Especially to stimulate the

middle-income stratum to consume private rented houses, any action has not been making any progress at all. Irrespective of ownership forms owned or rented, the middle-income stratum in China show a high level of housing consumer needs. Activating their consumption from both sides of supply and consumption (while prompting the distribution of used houses) will lead to an enhancement of the filtering function on the housing market, eventually inducing the demand for (purchasing) housing newly built. Singles, and young and old households (including singles), in particular, are assumed to dwell in a house for a rather short period, and does not always require their housing to have a living area of more than 100 m<sup>2</sup>, center of the current demand for newly constructed housing. To satisfy the diversified housing needs that such demand strata have, it is important to map out and implement the measures to supply market-supplementing private rented houses while stimulating their consumption, including the measures to promote the used housing distribution.

To study and implement the measures to supply private rented houses and stimulate their consumption in a large city of China, a public sector should not construct new houses or supply rented houses directly to the middle-income strata, but to induce and stimulate the private sector indirectly by building up the environments for activation of the market, and giving incentives in such institutional aspects as taxation and financing, including the buildup and disclosure of the individual property information relating to both existing and new stocks. *These measures are considered realistic, with consideration given to the financial recourses and human limitations seen in local governments.*

In China, most of the houses supplied and operated as corporate housing in the public sector were sold to individuals by the Government. This housing stock has been existing in a significant scale and must be effectively used and fluidized according to the quality and/or age of each house in stock. A smooth progress of such effective use and fluidizing would surely induce a new demand for housing. Regarding the existing housing stock, a study should be made of a governmental involvement to rearrange the information, a temporary buy-out, maintenance and repairing, and a re-throw into the used and private rented housing market.

### **5.3.2. Housing Activation Measures**

An outline of the housing market activation measures proposed is given below. (Refer to Fig. 5.5.)

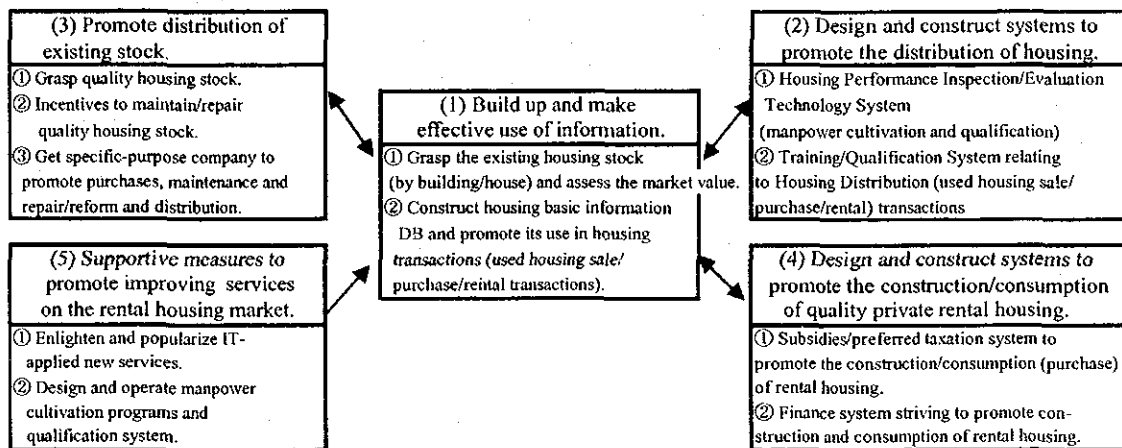
(1) Building up Housing Basic Information Registration System and Making Effective Use of Database:

It is important for three market players, “consumers,” “suppliers (builders)” and



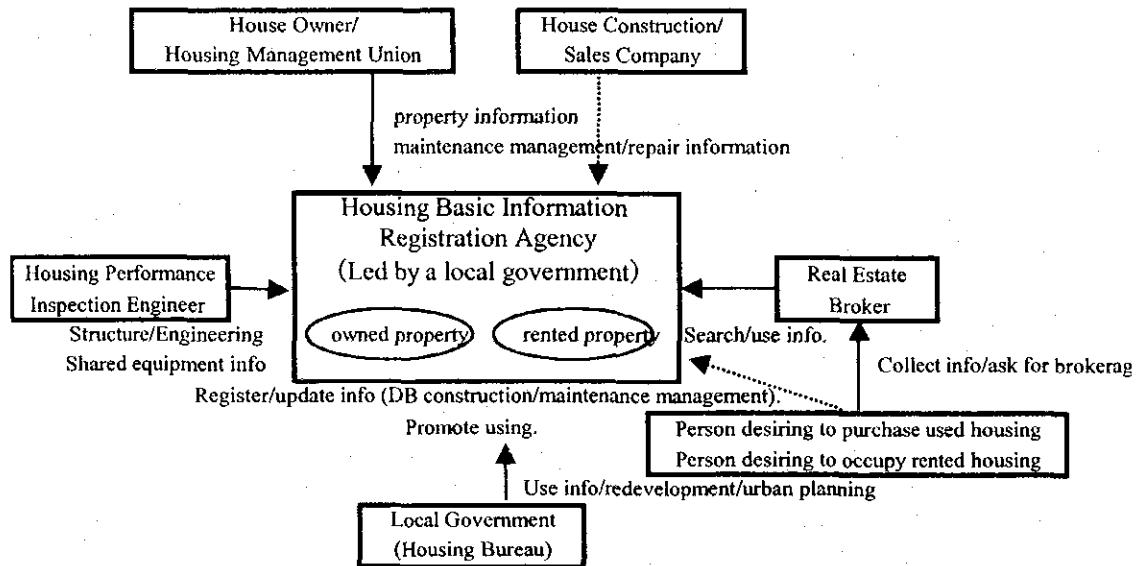
“information/service providers,” to effectively retrieve and utilize the quality information when acting to buy and sell housing, transact with rental/lease, render brokerage and information services. In this sense, it is necessary to build up and effectively utilize the information relating to housing assets, such as the existing housing stock and the currently increasing product houses newly constructed. To this end, the “Housing Basic Information Registration System” has to be built up while constructing and operating a database, based on the data available from the HBIRS.

**Figure 5-5 Measures to Activate Housing Market and their Flow**



Source: JICA Study Team

Figure 5-6 Image of the Housing Basic Information Registration System to Activate Housing Distribution/Rental Market



Source: JICA Study Team

To build up the housing basic information, a local government-led housing basic information registration order should be established to construct and map out the database design/operation procedure/standards, while absorbing the private needs in consumers and suppliers. Under the housing bureau of a local government, for example, it may be envisaged that an organization wholly owned by the local government may be established and operated. (Refer to Table 5-6.) To use the information registered in the database, a fixed rate of charged should be collected from users from the viewpoint of furnishing them with many merits. This will minimize the financial burden involved in running cost to the least.

## (2) Building up Housing Distribution Promotion System

### 1) Designing and Establishing Housing Performance Investigation/assessment Technology system (technology and certification):

The housing performance investigation/assessment technology system is to contribute to the activation of the housing market by furnishing and building up quality housing basic information, based on an appropriate evaluation and judgment of the existing/newly constructed housing performance, including safety standards. The technical standards established by the government or local government, and a

certification system divided into a few stages meeting such standards, should be designed and set up to cultivate a large number of the housing performance investigation engineers enough to cover the qualities of housing constructed, sold and distributed.

**Table 5-2 Outline (Draft) of Used/Rented Housing Management Public Corporation (tentatively named) in Local Large Cities (1<sup>st</sup> Phase 2002 thru 2005)**

OBJECTIVE	<ul style="list-style-type: none"> <li>To activate the housing market by promoting the distribution of the existing housing stock. (used housing purchase/sale and rental transactions)</li> </ul>
Capital	<ul style="list-style-type: none"> <li>Non-profitmaking legal person wholly owned by a local government</li> <li>Study the feasibility of establishing the legal person, with two or more private real estate companies contributing to the capital in some regions.</li> </ul>
Organization/Manpower	<ul style="list-style-type: none"> <li>Partially transfer the functions of a local government (Housing Development Bureau or the like).</li> <li>Initially secure a personnel of about 20 persons, which are to be transferred from the local government either temporarily or permanently and from private real estate companies.</li> <li>Perform the functions of a secretariat in relation to the map-out of a basic policy/detail plans for a variety of institution designs while taking the design, construction and operation of a housing basic information database for the first objective.</li> </ul>
Main Functions	<ol style="list-style-type: none"> <li>Build up the basic information relating to the existing housing stock (by building/by house) (first objective for the time being). (To design and construct a housing basic information database and to offer information)</li> <li>Study, design, establish and operate a housing performance survey/evaluation technology system</li> <li>Study, design, establish and operate an education/qualification system relating to the housing distributic (used housing purchase/sale, and rental)</li> <li>Map out specific measures to promote the fluidization of the existing housing stock, including former corporate housing. (Temporarily buy, maintain and repair, and input all over again into the housing market, with a specific-purpose company established.)</li> </ol>

Source: JICA Study Team

(3) Designing and Establishing Education/Certification System relating to Housing Distribution Transactions (used housing sales and purchases and rented housing transactions):

To proceed smoothly with the used housing sales/purchases and rented housing transactions, while making effective use of the housing basic information, including the housing performance investigation/assessment information, it is necessary for a real estate brokerage firm to provide the manpower that has abilities to determine architectural skill/market values, knowledge about the housing finance system, IT utilization skill and legal knowledge and skill, including contractual paperwork. To secure these human resources, it is necessary to design and construct a certification system, such as "Chief Real Estate Hander" in housing sales/purchase and housing rental contracts. In this sense, it is essential to example the certification requirements fully matching with the contents in the housing basic information registration system. After setting up medium-and-term targets by type of the manpower to be

cultivated institutionally, it is necessary to design and operate a manpower cultivation (education) program, which should satisfy the requirements referred to above.

(4) Promoting Existing Stock Distribution and Making Effective Use of Specific Purpose Company

1) Grasping Genuine Housing Stock, based on Housing Performance Investigation/Assessment Information

The existing housing stock should have both quality and quantity grasped by using the housing basic information (database), including the housing performance investigation/assessment information. Especially in the quality aspects, a certain level of assessment standards should be established first. Based on such standards, "houses should be rated." According to such house ratings, measures should be studied to map out a variety of incentives so as to promote used housing sales/purchases and rented housing distribution and corrective action for maintenance, repairing and redevelopment (scrap & build). (Refer to Table 5-2.)

2) Studying and Designing Incentives for Continuous Maintenance and Repairing of Genuine Housing Stock:

The Government Housing Loan Corporation in Japan has been striving to reserve and form the funds to support a planned repair of sky-scraped housing. In this sense, the GHLC provides some fancying tools, including the "Multistoried Housing Repair Debenture Reserve System" which permits a housing loanee to receive some privileged measures when borrowing the cost for repairing. Besides, the "Multistoried Housing Commonly Used Portion Reform Loan" is also offered to cover a variety of maintenance and repairing works. In China, it is desirable to study and design various incentives from taxation and finance system points of view, to promote the further maturity and fluidization of the housing market.

3) Studying Implementation by Specific Purpose Company to Temporarily Buy, Repair and/or Renew Existing Housing Stock, and to Promote Distribution (used housing sales/changeover to rented housing):

The existing housing stock contains some buildings that require a medium scale of repairing and/or renewal. Repairing them, however, will naturally entail costs. With the fact of a scarce market value taken into consideration, however, a system covering all of the legal, tax and financial aspects, should be studied to enable a specific purpose company to be established and operated for the specific purpose of buying, repairing, renewing, reselling and/or renting the existing housing stock entirely on a collective house, by collective house basis. The specific purpose

company should buy every existing house in stock at reasonable prices and take sufficient time to repair, and rebuilt the buildings on the body and commonly occupied zones, while reforming door to door. Later, the houses should be re-thrown into the housing market as properties to be sold or rented as used. In terms of proceedings and taxation, preferred measures are to apply to the price at which each house is brought from the existing owner, including the treatment of the existing owner's current and future residence issue, fund raising for repair/renewal works, proceedings and taxation involved in the establishment and management of the specific-purpose company. At the same time, studies should be also made about the feasibility of establishing the specific purpose company as joint venture owned by private real estate company and local governments, and to introduce a competitive auction system with two or more consortia.

**Table 5-3 Measures to Promote Fluidization, based on Quality Evaluation of Existing Housing Stock (example)**

RATING	QUALITY EVALUATION	MEASURE (FLUIDIZATION-ADDRESSING MEASURES)
A	<ul style="list-style-type: none"> <li>• 10 or less years elapsed after construction without necessity of repair/renewal for the time being.</li> <li>• Fully possible to distribute the house on the market, as it is, on a used housing purchase/sale/rental transaction basis.</li> </ul>	<ul style="list-style-type: none"> <li>• Encourage an enhancement of the maintenance/management system. (Study the feasibility of organizing a management union and of constructing a repair provident system.)</li> <li>• There is no incentive, in particular, to promote distribution.</li> </ul>
B	<ul style="list-style-type: none"> <li>• Necessary to repair/renew in small scale though 10 years or less have passed after construction.</li> <li>• Fully possible to distribute the house on the market on a used housing purchase/sale/rental transaction basis after repaired/renewed in small scale.</li> </ul>	<ul style="list-style-type: none"> <li>• Encourage to organize a maintenance/management union and to renew/repair on a self-assisting effort basis (Encourage to set and use a full-scale repair loan.</li> <li>• Reduce tax on the distribution/transaction of property after completion of maintenance and renewal.</li> </ul>
C	<ul style="list-style-type: none"> <li>• Of high quality though 10 years or more have passed after construction but requiring repair/renewal in medium scale</li> <li>• Fully possible to distribute the house on the market on a used housing purchase/sale/rental transaction basis after repaired/renewed in medium scale.</li> </ul>	<ul style="list-style-type: none"> <li>• Study the feasibility of a blanket purchase by a specific-purpose company and of repairing/renewing building by building. The existing owner, if desired, is allowed to occupy on a rental/lease basis while selling the rest as used property.</li> <li>• Give a specific purpose company a preferred treatment under the taxation system.</li> </ul>
D	<ul style="list-style-type: none"> <li>• 10 or more years elapsed after construction and requiring repair/renewal in full scale</li> <li>• Possible to distribute on the market on a used housing purchase/sale/rental transaction basis but requiring significant cost.</li> </ul>	<ul style="list-style-type: none"> <li>• Study the measures similar to those for housing Rank C. If impossible to commercialize, study the measures similar to those in Rank E (incentives as term-limited rental property, etc.)</li> </ul>
E	<ul style="list-style-type: none"> <li>• Constructed too many years ago and structurally difficult to drastically maintain/repair.</li> <li>• Considered to have a residual serviceable period of within 10 years</li> </ul>	<ul style="list-style-type: none"> <li>• Map out a medium-term transfer of proprietary tight plan/occupant move program as redevelopment (scrap and build) measure</li> <li>• Study incentives as a term-limited rental property.</li> </ul>

Source: JICA Study Team

#### 4) Building up System to Newly Construct/Promote Consumption Genuine Private Rented Housing:

With the incentives on rented houses under the "Specific Preferred Rented Housing system" in Japan taken up as reference, a system tailored to the realities in China will be studied to clarify the certification requirements for the preferred system by targeting a constant income stratum and young/old households taken for consumers.

In order to complement the current newly built product housing supply system liable to satisfy the needs of broader residence for a high-income stratum, a wide diversity of consumers will try to be induced to the market to satisfy a wide diversity of the consumer needs. To design and operate such a system to promote the formation of a genuine private rented housing market, it is necessary to provide a variety of incentives, such as subsidies, preferred taxation, financial system, etc. Options available include a "subsidy for construction," "an aid for the rent for occupation," "grants for a preferred construction loan and for paying the loan interest" and so on. After taking into considering the situations on the market, local characteristics in China, and in local large cities, it is necessary to review what the conventional housing-related tax reduction with the first priority given to owned housing, and grants for economical housing construction should be. Instead, a comprehensive study must be undertaken to determine a newly designed system, that will promote the construction and consumption of rented housing, as tailored to the progress of the housing market, including how to allocate the housing-related financial burden.

#### **5.4. Establishing Infrastructure for Promoting Housing Policy**

Three main perspectives desired in the development of housing plans in China are as follows:

- 1) China is currently going through variety of social and economic changes, such as rapid urbanization, economic development, increasing number of elders, and permeation of urban life style. Therefore, it is critical for China to grasp changes in people's needs towards housing and living accurately, and to develop housing plans accordingly.
- 2) In order to ensure the effectiveness of housing plans, housing plans/policies should be monitored regularly and a framework, which incorporate results of monitoring in the next housing plans, need to be built ("Plan"=>"Do" =>"See").

Following two strategies should to be examined thoroughly, in order to carry out above plans.

- A. Developing and utilizing housing-related statistical system.
- B. Establishing a process to build housing plans (housing fund plans).

#### **5.4.1. Developing and Utilizing Housing-Related Statistical System**

##### **(1) Basic Direction of Examination**

Currently, numerous types of statistics are being developed in China, such as statistics for investment and sales provided on-line. However, utilization/usage of these data is extremely limited, and a wide-range of information required for building housing plans is not yet created.

Therefore, housing statistics system, which shows current situations of housing (amenities), people's needs toward housing, and effects of establishing houses, should be developed. In addition, a method that systematically incorporates these issues into housing plans should be established.

##### **(2) Specific Issues**

###### **1) Studying the housing statistics to be built up with priority:**

The statistics relating to housing stock and the industry-related tables for analysis by the construction sector, have been absolutely lacking at present. To prepare these statistical data, it is necessary to study the technical challenges (including those treated out of the existing statistics) and to establish the housing statistics standards and what a scheme should be organized to gather statistics.

Figure 5-7 What is Specifically Contained in Housing Statistics

- 【Housing Basic Statistic Group】**
- Housing flow statistics (by method of construction, number of works started by form, value of work started (investment)  
[Japan] : Annual Statistical Report of Construction, number of public works started, and construction unit price survey (GHLC)
  - Housing Stock Statistics (how to construct, form, number of residential houses by status of equipment, area)  
[Japan] : Housing Statistic Survey <Ministry of General Affairs>
- 【Housing Industry/Real Estate Sales Statistics Group】**
- Housing sales statistics (selling prices, number of houses sold, types of houses sold...)  
[Japan] : Real Estate Economics Laboratory
  - Housing Industry Statistics  
[Japan] : Real Estate Industry Statistics <Ministry of National Land and Traffic
- 【House Purchaser Statistics Group】**
- Annual Income/Consumption Statistics (consumed value by goods/service, disposable income, ...)  
[Japan] : Housekeeping Survey Annual Report, Consumption Fact Finding Survey <both Ministry of General Affairs>
  - Savings Statistics (value saved, value of assets owned, ...)  
[Japan] : Savings Trends Survey <Ministry of General Affairs>
  - Housing Needs Survey (questionnaire survey assumed)
- 【Housing Fund Statistics Group】**
- (Housing) Fund Circulation Statistics (value of funds raised, amount of loans by organization and by field, ...)  
[Japan] : Fund Circulation Statistics <Bank of Japan> , Financial Banking Statistics Monthly Report <Ministry of Financial Affairs>
  - Housing Fund User Fact-finding Survey (value borrowed, types, such as purchased house construction method, form, etc.)  
[Japan] : User Fact-finding Survey <Government Housing Loan Corporation
- 【Housing Evaluation Statistics Group】**
- Industry-related chart (value of annual investments by construction member, value of transaction by construction member industry...)  
[Japan] : Industry-related Chart for analysis of the construction sector <Ministry of National Land and Traffic>
  - Housing User Fact-finding (satisfaction level) Survey/Statistics (level of satisfactions by house and by equipment, ...)  
[Japan] : User Fact-finding Survey (Government Housing Loan Corporation)
- \* ● stands for those items which China is especially required to provide:

Source: JICA Study Team



2) Studying Scheme to Gather, Control and Furnish Statistics:

Studies will be made about what organization should be, so as to enable a local government to gather stably and richly (in Japan, a local statistical main organization is functioning) and how to secure human resources (statistic investigators).

3) Studying Statistics buildup Strategy as viewed from Housing Statistics Utilizing Point of View

Housing statistics may be built in precisely while being effectively utilized. A future course toward an improvement of statistical elaboration is to be studied with the housing demand/housing fund demand measuring process assumed.

4) Studying Central-Local Online Statistics Gathering System:

An information system is to be studied to support those statistics preparation services to be performed across local to central governmental agencies, such as to prepare, gather, and inspect (audit) statistics. To furnish statistics, moreover, it is necessary to study the implementation of magnetic media (CD-ROM, etc.), and OA equipment for statistical survey paperwork, and software developments to improve the paperwork efficiency.

5) Studying Measures to Cultivate Human Resources to Make Effective Use of Statistics:

Studies will be made about how to secure the manpower with a certain level of knowledge about statistics and what a training system be so that an effective and efficient statistical investigation can be implemented while making most of the abilities available in the existing statistical personnel. A detail study will be made about what a training system and a training organ should be, to invite from the exterior the manpower with a broad range of knowledge such as: to forecast a demand for personnel, specialty in statistics, techniques of prediction, skill and the like on a short-term (1 year) basis and cultivate those in China on a long-/meium-term basis.

#### **5.4.2. Establishing Process for Building Housing Plans (Housing Fund Plans)**

(1) Basic Direction for Consideration

In order to cope with rapidly changing housing market, and to promote effective housing policies (which is in line with housing finance) for mid-and-long period of time, current mid-and-long term housing plans need to be enhanced and looked at from a different angle. Particularly, the Five-Year Plan and Development Plan need further review and modification.

Traditionally, developing plans and relevant fund raising/financing have not been properly linked in Chinese housing plans. A framework and process, which will help forecast demands for housing/housing fund accurately, and to incorporate results of forecast in housing

(construction) plans flexibly and promptly should be developed. As a result, housing (building social assets) and financing collateral (loan plans, budgetary steps) will be linked and “effective” plan development can be made possible.

## (2) Specific Issues for Consideration

### 1) Developing housing demand prediction technique and studying course of utilization:

In China, the housing demand has been so far predicted by a regression analysis on the premises of the economic structure in the past. To accurately predict a structural change, a demand predication technique is to be developed while incorporating the changes in environments and the needs in the future. And measures are to be studied to implant the technique. To reflect the housing demand precision results on the housing loan plan and fund raising plan, it is necessary to develop and study the techniques for predicting the demand for housing funds while achieving a further precise level of prediction.

### 2) Studying Organization to Map out and Deliberate Housing Policies Crosswise:

In Japan, a housing/residential area council has been playing a leading role in the Housing Buildup Five-Year Plan. With a couch a council taken up as model, studies will be made about what a cross-ministerial public/private jointly working type policy map-out/deliberation organ should be, with the governments at central and local levels collaborating. At the same time, a study will be made toward the establishment of such an organ in China.

### 3) Studying the Information Network Supporting Ma-pout of Housing Plan:

To support sending and receiving data, and decision making discussions, etc., promptly and smoothly, all required in the process of mapping out a housing plan, a study will be made about what a large-capacity human interface-oriented policy map-out support information system should be.

### 4) Studying How to Secure and cultivate Specialists:

To map out a new housing policy as tailored to a demand prediction, a study will be made in detail about how to cultivate the manpower with a broad range of knowable relating to the effective use of statistics and demand predication, specialty in statistics, predication technique/skill from the viewpoint of what a training system and a training organization should be.