

## **A Study on Housing Provision System towards Housing Affordability in Shanghai**

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### **Abstract**

The aim of this paper is to examine the housing provision towards housing affordability in Shanghai and to develop a conceptual model for the supply of affordable housing. The target groups of the model are the low and middle income groups. The literature review suggests that these groups are suffering low affordability under the socialist market economic system of Shanghai. The top down approach for increasing the home ownership rate is one of the main targets of the housing policy, which affect the housing affordability of lower and middle income groups. This paper argues that government intervention should be stressed on housing need rather than housing demand. Finally this paper introduces a theoretical model for housing provision system on the basis of housing affordability in the context of Shanghai under the social market system.

### **Keywords**

Housing provision system, housing affordability, economic system, theoretical model, Shanghai

### **Introduction**

In the People's Republic of China, since the launch of economic reform in 1979, housing has become one of the significant components of economic reform because the provision of housing had been a heavy burden for the state. The transformation of the planned housing provision as an in-kind welfare benefit to a more market-oriented housing provision is the ultimate goal of the urban housing reform in China. Shanghai is the largest comprehensive industrial city as well as the centre of technological development in China. Shanghai stands out among China's major cities by its sheer size - a total land area of 6,340 square kilometre, its population density - in excess of 22,700 persons per square kilometre in the city centre, and its importance in the national economy - 5.5% of the national industrial output in 1995 (Wu, 1999). The metropolitan population is expected to rise to 14.06 million by year 2020<sup>1</sup>. The commodification of housing is the main target of policy measures in Shanghai. The top down approach to increase the rate of home ownership is one of Shanghai's main housing policies, which affect the housing affordability of lower and middle income groups. The primary housing reform initiative has developed a large gap among the affordability of the populace. Only high and highest income groups can afford the market price. This paper starts with a brief review of the policy measures on promoting home ownership and its affect on the housing affordability of lower and middle income groups and emphasis will be placed on how the policy amplifies housing inequalities. It will also try to focus on the government intervention towards housing demand and housing need and it will argue that government intervention should be stressed on housing need rather than housing demand. Finally this paper introduces a theoretical model for housing provision in the Shanghai context. The main

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<sup>1</sup> Shanghai Star, 5 June 1998.

reason behind for developing a theoretical model is to comprehend the housing provision and housing consumption under socialist market economic system of Shanghai with an emphasis on housing affordability.

### The policy measures under different stages of economic development

This section examines the changes over time in housing measures towards affordability in relation to different stages of economic development. From 1949 to now, China’s urban housing policy has undergone a number of profound changes, which influenced the housing intervention in Shanghai in relation to economic development. The government housing intervention at different stages of economic development in Shanghai could be generally categorized into three major distinctive stages (Figure 1).

Figure 1: The state intervention for housing provision in relation to different stages of economic development in Shanghai

<i>Stages</i>	<i>Policy measures</i>	<i>State Intervention</i>
<p><i>Stage 1</i> Planned economy (1950-1977)</p> <p>GDP Year 1950 - RMB 2,243 million Year 1977- RMB 23,036 million</p>	<p>Welfare based housing policy</p> <p>In 1949-1957, housing sectors were partially nationalized and managed by collectively or state owned enterprises, or work units at the local level.</p>	<p>Maximum Government Intervention</p> <p style="text-align: center;">↓</p>
<p><i>Stage 2</i> Socialist market economy (1978-1989)</p> <p>GDP Year 1978- RMB 27,281 million Year 1989- RMB 69,654 million</p>	<p>Initial reform measures</p> <ul style="list-style-type: none"> <li>- Work units were allowed to invest in housing for their employees.</li> <li>-The sale of publicly owned housing was carried out.</li> </ul>	<p>Sharing responsibility among state, local government and work units</p> <p style="text-align: center;">↓</p>
<p><i>Stage 3</i> Rapid economic growth (1990-now)</p> <p>GDP Year 1990- RMB 75,645 million Year 2000- RMB 455,115 million</p>	<p>Market oriented housing measures under the control of local governments</p> <ul style="list-style-type: none"> <li>- The 1991 Housing Reform Programme.</li> <li>- Provident Fund Scheme was introduced since 1991.</li> <li>- National Comfortable Housing Project was introduced (1993-1998).</li> </ul>	<p>State owned enterprises (SOEs) play a vital role in the housing market</p>

The first stage was concerned about the welfare housing<sup>2</sup> system under the planned economy before urban housing reform. Under the planned economy, housing was an in-kind welfare benefit for employees that distributed through the work units<sup>3</sup>, and work units were also under the control of the state and local governments. The second stage practiced the socialist market economy and the welfare housing system was replaced by a pro-market approach. The introduction of urban housing reform changed the responsibility of state, local government and work units. Market elements were introduced in the housing system. In 1978 the State Council held a National Urban Housing Working Meeting, in which the direction of “private housing purchase and construction, including marketing” was proposed, with an aim to change the old housing system (Wong *et al*, 1998). The third stage demonstrated by rapid economic growth, which was manifest to integrate both state and private sectors in a free market economy under local government planning measures. The most significant measure was the “Provident Fund for Housing”- a housing saving scheme. This measure aims to accumulate capital for housing production and consumption. The saving belongs to the employees and should be used for home purchase, self-building and renovation of employees’ housing units. The consequence of housing commodification, under the pro-market economic reform, is obviously shown in the emergence of a dual societal structure in urban areas (Chan, 1996, Lai, 1998).

#### *Policy impact on Shanghai*

The urban housing reform has shifted the welfare housing system to a more market oriented system. The private developers have performed their role under the regulation of local government. Only high and highest income groups and a portion of medium-high income groups have been able to afford the market price. There are no policy measures to meet the housing need of lower and middle income groups. In Shanghai the rent is still very low and if housing consumption of a family is below 5 square metre per person, only then they can apply for economical housing for rent. The housing reform in Shanghai is just positioned in between planned economy and free market system. The problems still exist with housing distribution and inequality. The production and distribution were decentralized and distribution depends on the status of household head. The production of housing decreased in year 2000 because of the accumulated volume of vacant housing. There was an estimated 10 million square metres of vacant housing in Shanghai (Yeung *et al*, 2002), but still there was a strong demand for affordable housing

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<sup>2</sup> “Welfare Housing” refers to housing units provided by the State through work units. Since the founding of the People’s Republic of China in 1949, Chinese leaders have followed the socialist model where housing was regarded as an in-kind welfare benefit to employees and was almost free of charge. Housing investment and construction was exclusively accountable by the State. Tenants, who work for state-owned or collectively-owned enterprises, were only required to pay nominal rent. Due to the significant characteristic of welfare in nature, dwelling given by the state referred to as “welfare housing” (Wong *et al*, 1998).

<sup>3</sup> Work units are not merely a place of work and production in China. It has many other economic, social and political functions. From job offer to marriage, the life of an employee is being taken care of by the work unit. Whyte, Martin K. and Parish, William L. (1984) *Urban Life in Contemporary China*. Chicago : University of Chicago Press.

at the lower end of the market. Therefore, low housing price, rather than strong purchasing power, was the main factor in making housing affordable (Chiu, 2002).

Different types of subsidy schemes have been used to increase the home ownership rate specially the Housing Provident Fund (HPF) Scheme, but the lower and middle income groups still facing low affordability. This scheme is similar to the Central Provident Fund (CPF) of Singapore, to which both employers and employees are forced to contribute. In Singapore the main objective of government is to create a home owning society and the policy objectives are rather political than economic or social demand for being home owner. It was seen as a way of bringing stability to a largely recent immigrant and racially mixed populace and housing was to be one vehicle for developing a sense of national identity (Ooi, 1994; Doling, 1999). If the selection criteria for HPF in Shanghai depend on the amount of saving of each employee, the high and highest income groups would benefit more from the HPF than the medium and low income groups. So there exit inequalities across income groups and the needy will be unable to obtain the housing benefits offered by the government. The inequality problem exists between high income enterprise and low income enterprise. The market price is not within the affordable level of less skilled workers who depend upon their work units to execute their housing need. Heavy subsidisation and direct housing supply by work units was the main factor to increase the home ownership rate in Shanghai as well as in other cities in China. The potential buyers in the housing market were profitable work units who had purchased housing units on behalf of their employees but most of the medium and low income groups work with less profitable work units. At present the direct housing supply from the work units has been cancelled but for the lower and middle income group market price is not at all affordable.

Table 1: Affordability ratio over the period from 1995 to 2000

<i>Year</i>	<i>Average household monthly income</i>				<i>Mortgage payment/ income (%)</i>			
	<i>Low Income</i>	<i>Medium Income</i>	<i>High Income</i>	<i>Highest Income</i>	<i>Low Income</i>	<i>Medium Income</i>	<i>High Income</i>	<i>Highest Income</i>
1995	767.98	1103.38	1677.50	2306.36	163.56	113.84	74.88	54.46
1996	861.68	1258.64	1865.80	2620.86	174.67	119.58	80.67	57.43
1997	898.05	1327.28	1982.07	2673.59	163.25	110.46	73.96	54.83
1998	942.96	1361.03	2031.80	2767.11	162.73	112.74	75.52	55.45
1999	1144.6	1596.25	2551.95	4026.43	137.43	98.55	61.64	39.07
2000	1276.0	1764.42	2710.35	4018.51	98.38	71.15	46.31	31.24

Source: Shanghai Municipal Statistics Bureau, 2001

It has been identified that the housing reform in Shanghai just makes houses too expensive. According to the definition of affordability in the context of this study the mortgage payment to income ratio should be kept around 50% to ensure an affordable level of housing. Table 1 show that the property market price was not within the reach of those who were at low and medium income groups. The down ward direction of 'mortgage payment to income' ratio was due to interest rate of monthly repayment that revised by the China Construction Bank of Shanghai in year 1999 and implemented since 2000. The revised rate is now 5.58% but it was 10.35% in the past. The rate has been

revised to increase the rate of homeownership but still low and medium income groups are not able to afford the market price. In year 2000 the average monthly income of highest income group was 4018.51 RMB which was quite high as compared with the other income groups (Table 1). The less skilled workers who belong to lower income group become poorer and they would not be able to meet their housing need without government subsidy.

### **A theoretical model for housing provision system towards affordability**

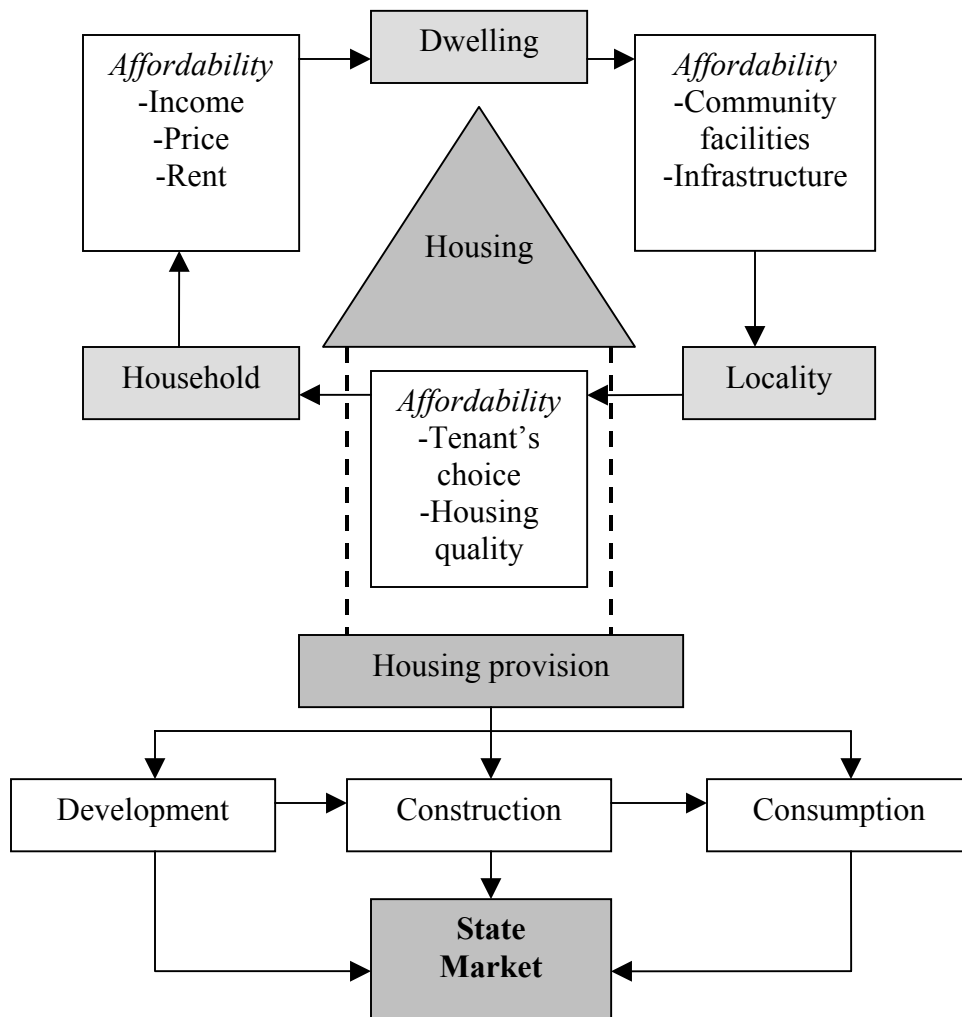
This section develops a theoretical model for housing provision towards housing affordability in the context of Shanghai and to provide recommendations on the method and mechanisms for the supply of affordable housing. This model tries to establish that housing is not only a commodity for speculation or investment rather it's a home, where we can exercise our rights and link ourselves to the community, and the community to the region in which it grows and progresses. Figure 2 shows the relations within the different components of the proposed model. The main components of the models are housing affordability, housing provision, state and market.

#### ***Basic framework of the different components of the model***

Here the core concept of housing in the model is analytically broken into three parts following the concept of Kemeny (1992); i.e. household, dwelling and locality. Figure 2 develops a linkage between those components. The housing affordability is not only related to household but also have relation with dwelling and locality in different aspects. In the basic framework of the proposed model, in terms of affordability it shows the affiliation between household and dwelling is related to household income and housing price or rent. The dwelling and locality is related to affordability through infrastructure and community facilities and the locality related to household with tenants' choice and quality of housing. The whole process is closely associated to determine household affordability.

The relationship among the components is analyzed under housing provision system and the main forces of this system are state and market. The different stakeholders which intervene in the housing provision are state, market and households. The role of state and market has varied under different market mechanism with relevance to different economic system. The model is considered on the basis of housing provision, which categorised into three different stages: a) Development b) Construction and c) Consumption. The whole housing provision process has been categorised by different stages like development, construction and consumption, through each stage all houses will move from initiation to demolition (Doling, 1999; Ambrose, 1992).

Figure 2: Basic framework of the different components of the proposed conceptual model

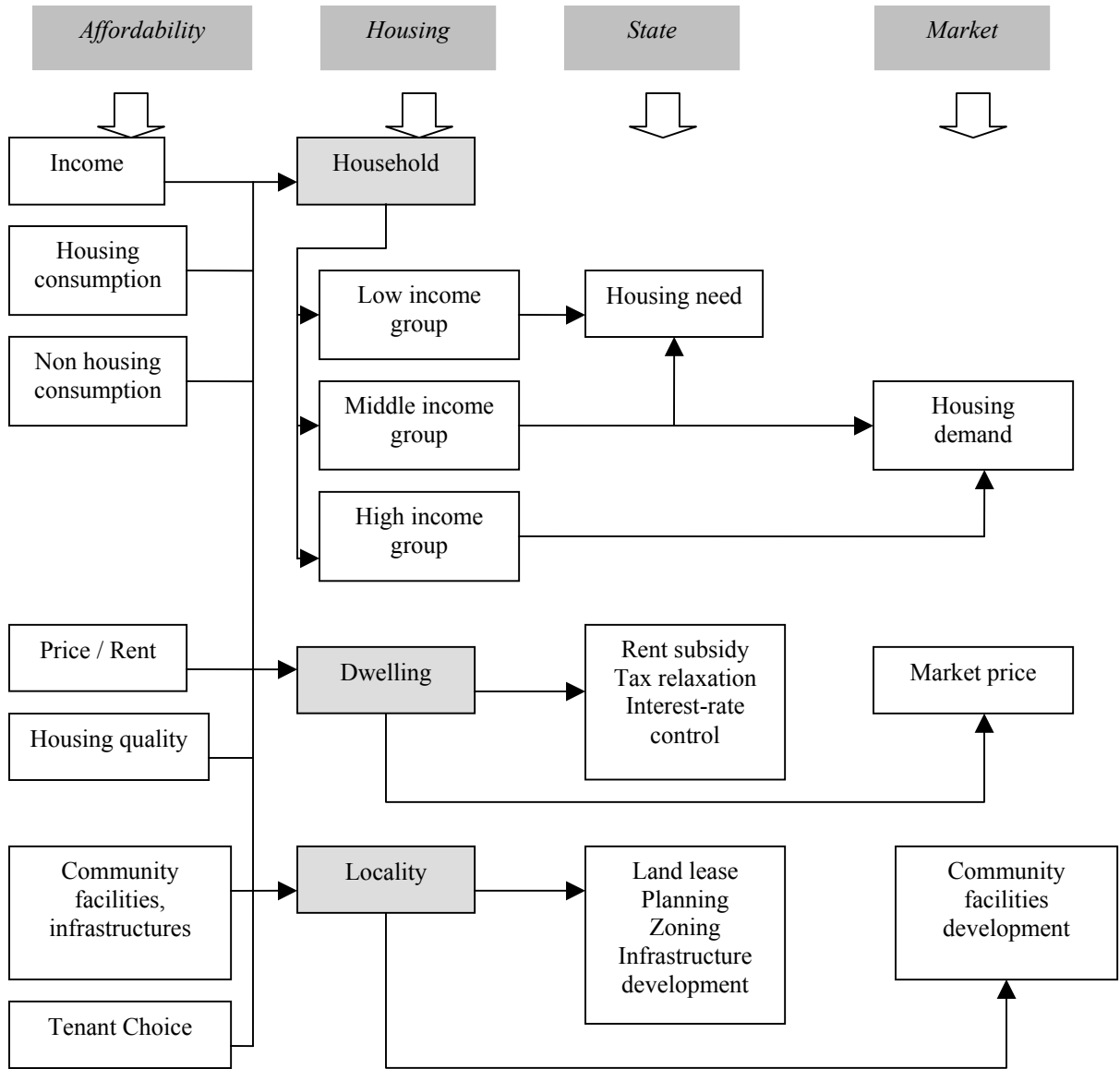


***The relationship within affordability and different stakeholders of the proposed model***

This section tries to propose the role of state, market and household towards affordability. It shows the lower income groups and a portion of middle income group has created housing need, on the other hand better off middle income and upper income groups create housing demand. The model is proposed that the state intervention should focus on housing need and home ownership should be the concern of market. The government subsidy policies should be demand sides by rent subsidies, housing allowance, tax

relaxation, interest rate control to help the middle income group for better housing choice from the market.

Figure 3: The relationship within affordability and different stakeholders of the proposed model



***Adjustment of the proposed model under different economic system***

The basic structure of the model will be adjusted under different market economy. The structure will analyze and propose the policy measures through the three phases of housing provision: development, construction and consumption phases. Here the model tries to adjust under the socialist economic system of Shanghai.

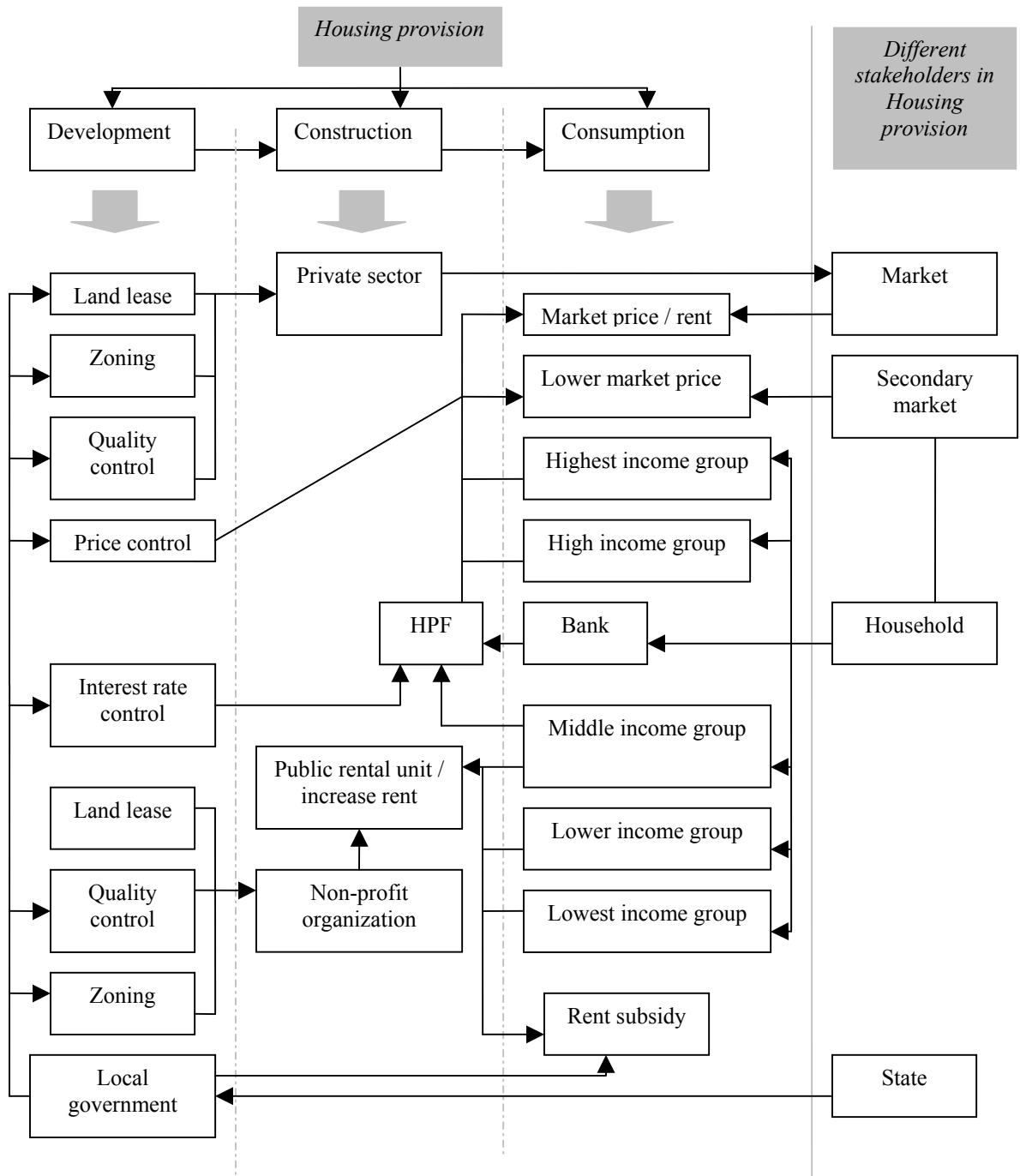
### *Adjustment of the model in the Shanghai context*

A large number of households have suffered low affordability in Shanghai. As it evaluated in Table 1, only high income and highest income groups and a portion of medium-high income groups (categories by Shanghai Municipal Statistic Bureau) have been able to afford the market price. After the urban housing reform China has shifted from the planned economy and try to develop more market oriented housing measures under the control of the local government. But in reality housing reform has made houses more expensive and at the lower end of the market there exist a strong demand for affordable housing. In compare to Hong Kong, Shanghai does not have a strong stock of public housing stock to meet the basic housing need of the populace. The primary housing reform initiative has created a large gap among the affordability of the populace. Different policy measures like HPF scheme has only benefited the higher income groups and others have just relied on the work units. Therefore state owned work units play the major role in the market.

In the context of Shanghai, there is a significant leap from welfare housing policy to more market oriented housing measures, which may contribute to form a gap in terms of housing consumption among the populace. A large portion of populace in Shanghai belongs to the working class. According to social scientist John P. Dean (1951), home ownership probably works well for middle income families but not for the working class families (Stegman, 1991). The home ownership based policy may generate a huge burden on the local government in future. Hence the model for Shanghai should not be followed the way of Hong Kong. Hong Kong has exercised its housing provision for a long period under a *laissez faire* economy, where market performance is more flexible than Shanghai. The proposed model for Shanghai should be followed by a middle of the road approach, like the corporatist countries or in another term, comprehensive policy countries (Donnison, 1967), where market has been controlled in order to be submissive to social interests, but housing is seen as a productive element. The major pressure groups are the working class (example- Sweden). They have a large rental sector and renting is attractive than the demand for home ownership (Kemeny, 1995). The overall standard of housing is very high in those corporatist countries than in liberal regime. On the basis of basic composition of the proposed model, the housing provision process of the Shanghai model is suggested in relation to the socialist market economic system. Figure 4 analyze the housing provision system in the context of Shanghai and develop a housing model under the socialist market economy.



Figure 4: Proposed conceptual housing model towards housing affordability under socialist market economy of Shanghai



### *Development*

In the development phase state should take the major role in determining housing production, land lease, type of housing, location and would try to achieve the desired output. The local government would take the responsibility to provide the necessary demand side subsidies. State will monitor the whole process and allocate budget for the local government. The secondary market in Shanghai is not within the affordable level and often the price even higher than the first hand market. The model suggested that the secondary market price should be controlled by the local authority to ensure an affordable price for middle income group and initial feedback should be given to non-profit organizations to develop public rental units for low income, lowest income and a portion of middle income group people who may not be able to afford the market price. The state intervention should emphasis on housing need rather than home ownership rate.

### *Construction*

The private sector and the non-profit organizations should be encouraged to participate in housing construction. State or work units should not be involved in construction. That will ensure a free market competition and quality housing. The role of state owned work units should be shifted to individual households and a portion of middle income group, high income group and highest income group can fulfill their desire for home ownership by using the HPF scheme from market in market price or from secondary market in a subsidised price. The state or local government or the work units should act as an initiator.

### *Consumption*

The consumption of housing mainly intervenes by the state and the major pressure group would be the working class. The rent subsidy should be provided by the local government to those who are in great need and facing low affordability. The HPF scheme should be used to fulfill the housing demand and the interest rate should be controlled by the local government. A controlled secondary market should be facilitated to ensure affordable price. State should play a direct role in this housing consumption phase. The loan system should be controlled to avoid market speculation. In 2003 the bank took initiatives to restructure its policy. For the buying of the first property bank would provide an 80% mortgage loan but for second property the percentage of loan would be down to 50%. However the policy has not yet implemented.

### **Contribution to knowledge**

The model will help the state and local government to analyse the housing affordability of the populace and will help to determine the mechanism and method for supply of affordable housing under the prevailing market system.

### **Theory to practice- guidelines to apply the model**

The proposed theoretical model suggests some requirements as a pre-requisite to apply the model;

- Find out the minimum socially acceptable housing and non housing consumption in the context of Shanghai.
- Measure the housing affordability of the targeted populace by applying the economic principle of affordability.
- Find out the role of state and market in housing provision system with relation to economic system.
- Evaluate the role of market, state and households towards affordability of middle and lower income groups with consideration of different subsidies from government.
- Adjustment of the model in different economic systems to consider the housing affordability of lower and middle income groups.

### **Conclusion**

This paper has reviewed the policy measures on promoting home ownership under the socialist economic system of Shanghai and the policy affect on the housing affordability of lower and middle income groups and emphasis is placed on how the policy accelerates low affordability of housing. The model proposed that state intervention should focus on housing need and home ownership should be the concern of the market. The model also proposed that subsidies should be demand based rather than supply based. In the case of Shanghai, a significant leap from welfare housing policy to more market oriented housing measures has created a gap in terms of housing consumption among the populace. This change seriously affected the affordability at the lower end of the market. The model proposed a mid way solution (in between free market economy and planned market economy) for Shanghai like other corporatist countries, where market has been controlled in order to be submissive to social interests, but housing is seen as a productive element. The model shows only a conceptual framework for housing provision and affordability and tries to analyze it under different market economies. Further research should be developed on the proposed theoretical model for its validity performance.

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