

Housing Market Dynamics in the Present Japanese Cities : A New Stage of Housing Affordability Problem

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Abstract

Increasing volatility and greater divide constitute the common features of many housing markets around the world. This article provides some theoretical and empirical explanations about the distinctive dynamics and relationships concerning those tendencies in the context of Japanese housing markets.

First, it presents an overview of the major developments of Japanese economy during the period from the 1990s to the mid-2010s. The income of most households decreased rapidly, resulting in growing poverty rates over this period. Second, it considers land policy and urban planning in Japanese cities. Under the conditions of concentration of capital and population into metropolitan cities, there is a bifurcation of land policy into two contrasting regimes : intensive deregulation for the centre of the metropolis and the ‘compact city’ policy for local districts. Third, it examines the main properties of the housing market dynamics in metropolitan cities. It is argued that on the one hand, there is an overabundance in the dwelling stock and differentials in quality. On the other, there is a polarisation of the housing market dynamics into growing and more volatile segments against stagnant segments. These market dynamics are reflective of serious housing problems. Fourth, it examines the limits of the housing policy, and in particular the lack of public intervention into private rented housing market. Finally, it draws several lessons from the housing problems and policy responses in Japanese cities.

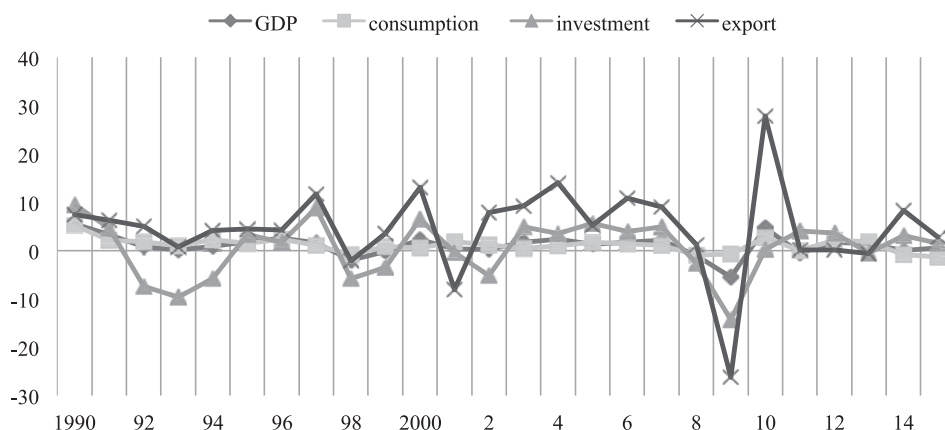
**Key words : deregulation ; housing affordability ; income disparity ; Japanese cities ;
market volatility ; shrinking population ; vacant houses**

1. Overview of the post-bubble Japanese economy

1-1 Long-lasting deflationary cycle

For a start, the introductory section presents an overview of the major developments of Japanese economy during the period from the 1990s to the mid-2010s. In light of the property bubble in the latter half of the 1980s and in the aftermath of its burst at the beginning of the 1990s, the Japanese economy has experienced profound changes including : (1) a recession since 1998 partly explained by ‘bad debt’ problems within Japanese financial institutions, the onset of the Asian currency crisis and the hike in consumption tax rate in April 1997 ; (2) an economic recovery during 2003 and 2007 attributed to the prominent expansion of exports ; (3) a reversion to recession in 2009 explained by the ‘Lehman-shock’ in September 2008 and the world financial crisis ; (4) a significant drop in households consumption due to another increase in consumption tax rate in April 2014.

Figure 1, illustrating the fluctuations of real GDP and its demand-side categories, provides a clear perspective on the major shocks and developments experienced by the Japanese economy over the last 25 years. Starting with the bust of the property bubble in the 1990s, the Japanese economy entered a long-lasting stagnation. Given the double constraints of post-bubble over-production capacity and intensive competition from emerging economies, the Japanese manufacturing industry was faced with difficult strategic decisions. In the context of decreasing exports due to the yen appreciation, Japanese manufacturers resorted to the transfer of production bases offshore, and cutback in labour costs by substituting regular employment with non-regular employment : part-time, fixed-term and temporary labour.



Note : The change ratio (percentage) to the previous year of real GDP, household consumption, private capital investment, and exports of goods and services.

Source : Government Cabinet Office, *Japan's National Account*.

Figure 1 Changes in GDP and demand-side categories in Japan, 1990-2015

With the prominent expansion of exports to the U.S. markets and Asian emerging economies, the Japanese economy turned into a recovery phase during the period from 2003 to 2007. Despite the appellation of ‘postwar longest economic recovery’, the growth rate of real GDP was confined to only 1 per cent annual average. Due to the rapid increase in exports from 56.7 trillion yen in 2002 to 92.2 trillion yen in 2007 amounting to 1.6 folds, the performance of major manufacturing companies remarkably improved. Capital investment increased by 24 per cent, from 65.1 trillion yen to 81 trillion yen over the same period. However the labour’s relative share in added-value for major manufacturing companies, composed of 2.5 thousands companies with capital of at least 1 billion yen, diminished significantly from 66.7 per cent in 2002 to 56.9 per cent in 2007. At the same time, retained earnings in the companies recorded rather an increase of 38.7 per cent from 55.1 trillion yen to 76.4 trillion yen.

There is a clear correlation between the fluctuations of exports and real investment. However an increase of investment is not necessarily conducive to rising employment and wage. Because non-regular employment with low wages is expanding across all industries, the decrease in employment and wages results in restrained household expenditures. Therefore, household consumption merely increased by just 3.6 per cent, from 277.6 trillion yen in 2002 to 287.5 trillion yen in 2007, and hence, the growth of GDP remained at a low level as well (Oizumi 2013).

This export-led economic growth was further weakened by the diminishing volume of international trade after the ‘Lehman-shock’. A rapid recovery of exports in 2010, coupled with expansionary fiscal spending on infrastructures for the post-disaster reconstruction purposes, enabled the process of extricating the economy out of recession. Negative growth has ensued nevertheless following the increase in consumption tax rate in 2014 and recessive household consumption.

Thus, Japanese economy has lapsed into a long-lasting deflationary cycle involving falling prices in the goods and services, stocks and real property markets. It can be argued that the deflationary cycle is partly caused by a complex mixture of macro-economic factors. First, the drastic elimination of manufacturers in regional economies results from the ongoing external shifts of factories across borders and keener competition among companies in domestic markets. Second, the significant transfer of income from the household sector to the financial sector implied by the ultra-low interest-rate policy adopted by the Bank of Japan. Third, the thoroughly curtailed employment and wage levels reflect the business downsizing strategies pursued by most companies. These factors bring about a severe decline in households consumption, and naturally, a lasting economic stagnation. In addition, there are aggravating factors including the demographical and income disparity problems in the Japanese economy, which are discussed below.

1-2 Decreasing and ageing population

The Japanese economy faces a full-scale compounded effects of ageing society and shrinking population. These demographic changes are the direct result of lower birth rates. Present Japan has one of the lowest birth rates in the world: the total fertility rate lies as low as 1.42 in 2014. This low rate is, in the long term, conducive to a significant decrease in the size of population and an increase in the proportion of elderly people. While Japan's population in 2010 was 128 million, it is expected to decline to less than 117 million by 2030, representing a shrinkage of 8.6 per cent over just two decades. Over the same period, the proportion of people aged 65 years and over is expected to increase from 23 per cent to 31.6 per cent (IPSS 2012).

Despite the shrinking population, the number of households continues to increase. In particular, the increase in the number of one-person households is rather conspicuous. This number amounted to 16.8 million and accounted for 32.4 per cent of the total households in 2010. The aggregate number of households is estimated to reach a peak of 53.1 million in 2019 and decrease afterwards to 49.6 million in 2035. These trends will certainly create a long-term decrease in housing demand. It is estimated that housing demand in 2035 would be as much as 3 million housing units smaller than its expected peak in 2019.

In addition, there is the problem of population movement towards the metropolis. Only few prefectures including Tokyo, Kanagawa, Saitama, Aichi and Fukuoka are still associated with increasing population. The gravity of problems related to ageing society extends beyond depopulated local areas to include metropolitan cities as well. As many as 2.97 million people aged over 65 years reside in Tokyo metropolis alone as of 2015, representing 22.9 per cent of its total population. Among the elder population of Tokyo, the proportion of single households amounted to 38 per cent in 2010, and this statistic constitutes the highest proportion among all prefectures. It is also estimated that the number of elder singles might exceed the 1 million milestone with the remarkable proportion of 44 per cent in 2035.

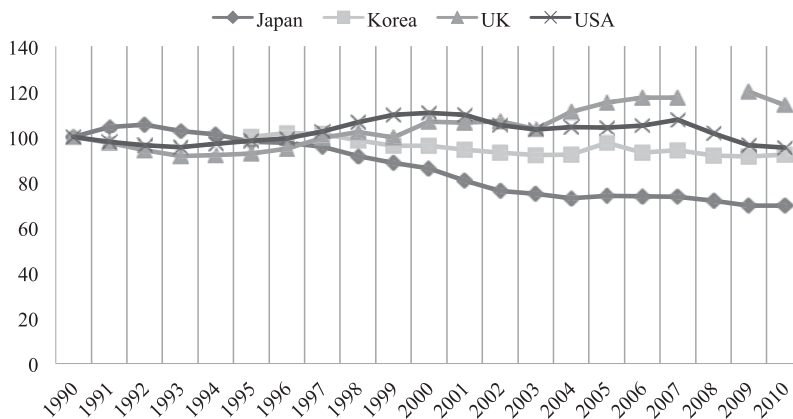
1-3 Inequalities in income distribution and poverty

In light of the structural changes described above, there is indisputable evidence that economic and social bipolarisation is growing. Job security has been substantially eroded for many classes of working people. The drastic changes in the labour market are conducive to increasing disparities of incomes and living conditions and greater economic uncertainty and social insecurity. These changes are not just affecting lower-income groups but the middle-income classes as well.

The World Wealth and Income Database (WID), organised by Thomas Piketty and other researchers, provides comprehensive evidence about the concentration of wealth into a handful of ultra-affluent classes in many countries. According to WID statistics for 2010, the share of the top-income 1 per cent

class into the whole income in Japan, Korea, the UK and the USA amounts to 9.5 per cent, 11.8 per cent, 12.6 per cent and 17.5 per cent, respectively. This statistical evidence may suggest that the extent of income disparity is relatively low for Japan. But the share of top-income 10 per-cent class, amounting to 40.5 per cent for Japan, is still comparable to the rates reported for other countries, which reach equally high levels of 43.3 per cent, 38.1 per cent and 46.4 per cent, respectively.

However the main concerns arise rather with respect to the conditions of the remaining 90 per cent class. As shown by Figure 2, it is important to note that the average annual income of the bottom 90 per cent class in Japan decreased by 30.2 per cent, falling from 2.14 million yen in 1990 to 1.49 million yen in 2010. The OECD defines relative poverty rate as the proportion of people with income less than half the median of income distribution. In the case of Japan, the poverty rate in 2012 reached 16.1 per cent, and the poverty line is associated with an annual income of 1.22 million yen indeed, which is nearly equal to the average annual income of the bottom 90 per cent class.



Notes : Each index is calculated on the standard of Year 1990 = 100. Korea's index is calculated on Year 1995 = 100, as the data during 1990 and 1994 are not given. Data of the UK in 2008 is not given.
Source : World Wealth and Incomes Database.

Figure 2 Changes in average income of the bottom 90% class, 1990-2010 : Comparison of Japan with Korea, the UK and the USA

The WID does not consider the stratification of income within the bottom 90 per cent class. But reference to the wage statistics in private enterprises, published by the National Tax Administration Agency, can be useful in providing proxies for these strata. The reported statistics for the year 2010 suggest that workers with annual wage income less than 6 million yen represent 82.3 per cent of the whole population of salaried workers belong to private enterprises. This income group can be considered within the bottom 90 per cent class, because WID estimates the threshold value of top-income 10 per cent class at 5.76 million yen in annual income. Within the lower-income group, the largest part is represented by the income class of under 2 million yen and that of 2 to 3 million yen, which are associated

with the shares of 27.9 per cent, and 21.4 per cent, respectively. Meanwhile, the class of income above 4 million and under 6 million yen is associated with a diminishing share from 30.2 per cent in 1990 to 28.8 per cent in 2010. Thus, there is no doubt that the intensive replacement of regular employees with non-regular employees caused a depletion of the middle class with annual income of 4 million-under 6 million yen and expansion of the 'working poor' with an annual income of less than 2 million yen.

In light of the socio-economic circumstances described above, consideration hereafter advances to the dynamics of land and housing markets. The next section elucidates the distinctive developments in land policy and land market in Japanese cities.

2 Deregulation in land policy and urban planning

2-1 Land policy and urban planning in Japanese cities

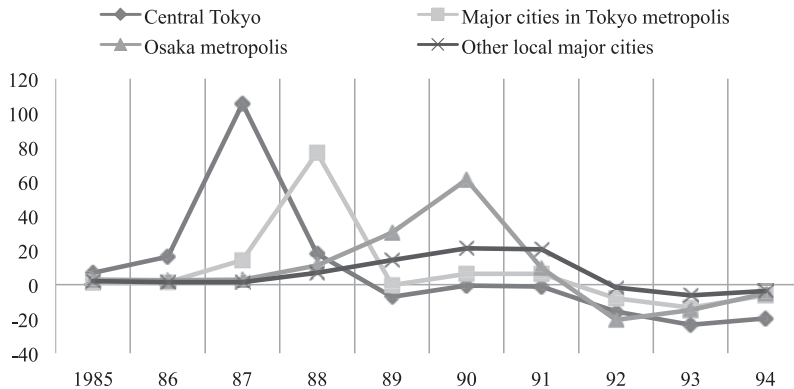
The City Planning Act of 1968 introduced various regulative measures about urban land-use : (1) designation of the city planning area composed of both the urbanisation promotion area (UPA) and urbanisation control area (UCA), (2) initiation of the development permission by planning authorities at prefectural level, (3) new subdivision of the land-use zonings composed of eight categories related to residential, commercial and manufacturing industrial land-uses.

Although the Japanese planning system bears some resemblance to the planning system in Western countries, there are exemptions in the regulation of UPA and UCA planning areas. In the UCA where development should be restrained to prevent sprawl, the development of housing complex and large shop-buildings were permitted on exceptional basis. The scope of planning permissions was not exhaustive given the exemption of small-scale development in the UPA from this regulatory requirement. Poor regulation of UPA land-use was the result of conditions where shops and offices could be built anywhere in these areas except in two categories of districts designated exclusively for housing and manufacturing purposes.

These flaws were a natural consequence of governmental and municipal land policies with strong development orientation. These regulatory conditions had critical implications for land markets as well as housing markets. Urban land markets actually reflect a mixture of competitive forms of land-use due to relatively loose regulation. Residential development has advanced since the 1970s, not just in suburbs, but also into city centres and neighbouring areas, where the construction of condominiums went into full swing. During this expansion, the commercial accumulation towards suburbs and residential development towards city centres mingled with each other, thereby intensifying competition amongst the forms of land-use in suburbs as well as city centres. Therefore the dichotomy between centres and suburbs in land-use, which was a key concept of the modern urban planning, changed into a complicated and

sprawling differentiation. This competitive mixture of land-use forms caused a continuous rise in land prices. In addition, loose restraint on conversion of land-use furthered speculative land acquisition. The momentum towards higher pricing reached its climax during the property boom in the latter half of the 1980s (Oizumi 2002).

Figure 3 clearly presents the propagation process that underlies the behaviour of residential land prices during the property boom. The boom started at the central Tokyo, and extended to major cities in the Tokyo megalopolis. It subsequently spilled over to Osaka metropolis and other local major cities, with different time lags and maximum rates of land appreciation. A similar pattern of propagation could be observed in commercial land prices as well. The speculative land acquisitions by many firms provided a strong impetus for this propagation process. Indeed, the momentum was not supported by real property companies only, as many firms in virtually every sector competed in the launching of projects in real property business. Their criteria of land acquisition depended upon, not the zoning designation of land-use, rather that of larger floor-area ratio.



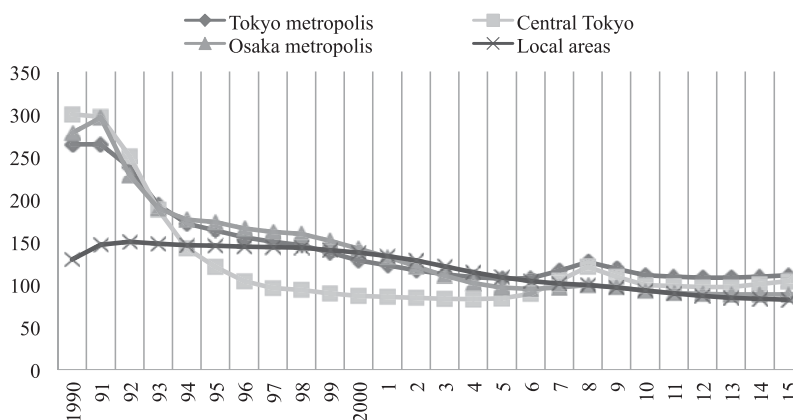
Note : The change ratio (percentage) to the previous year of residential land prices in each area.
Source : Tokyo Metropolitan Government, 1999.

Figure 3 Changes in residential land prices of Tokyo and other cities, 1985-1994

Upon the collapse of the property bubble, a deregulation policy was adopted with the purpose of reviving real property markets from stagnation. Its core instrument is the relaxation of floor area restrictions. The revised City Planning Act of 1992 subdivided three former categories of land-use in residential districts into seven categories. In aggregate, eight former categories were segmented into twelve. This means, in fact, raising the upper-limit of floor-area ratio and promoting mixed land-uses including commercial use in residential districts. The revised City Planning Act of 1997 introduced an even higher ceiling in floor-area ratio in newly designated districts to facilitate the induction of high-rise dwellings.

2-2 Bipolarisation of land markets and land policies

Figure 4 shows the trends of residential land prices in Tokyo and Osaka metropolis and other local cities after the property bubble. There is a long protracted period of declining land prices, and there are also signs of divergence in land markets at the beginning of the 2000s. While there is a pervasive stagnation in land markets throughout the country, several ‘hot spots’ in central Tokyo emerged with renewed activities in real property investment. Residential land prices in central Tokyo seem to reach bottom levels around 2003 and 2004, and exhibit a rapid increase from 2005 through 2007. Despite the sudden drop in association with the ‘Lehman-shock’ and U.S. financial crisis in 2007-2008, residential land prices seem to have resumed their upwards momentum over the more recent years. As of January 2016, residential land prices in Tokyo metropolis and Osaka metropolis showed 1 per cent and 0.5 per cent increase, respectively, from the previous year, while those in other local areas decreased at 0.7 per cent.



Note: Each index is calculated on the standard of Year 1983 = 100.

Source: Tokyo Metropolitan Government, 2014; MLIT, *Official Listing of Land Prices*.

Figure 4 Cumulative changes in residential land prices in Tokyo and Osaka metropolis and local areas, 1990-2015

2-3 Metropolitan cities : booming construction under deregulation policy

Changes in land market conditions were strongly influenced by the urban development policy as part of the government’s business stimulation package. A new stage of deregulation was indeed, started by the government’s urban regeneration policy. The Headquarters for Urban Regeneration in the Government Cabinet Office was established in 2001, and the Special Measures Law of Urban Regeneration was enacted in the next year. The objective of this policy is the redevelopment of the centre area of metropolitan cities, through the promotion of intensive land-use projects in city centres. The government designated a selection of sites within the centres of major cities as Urgent Redevelopment Zone (URZ). Among the 34 URZs covering 4,749 hectares, there were 7 sites amounting to 2,375 hectares in central

Tokyo, and 12 sites covering 1,072 hectares in Osaka City. That is, both cities occupied 72.6 per cent of the total area of URZs. Thereafter the URZs have been expanded up to 62 areas covering 8,037 hectares as of September 2014, and 49.3 per cent of the total area is occupied by Tokyo metropolis.

The concept of URZ represented the culmination of the deregulation process in urban planning. Standard regulations concerning land-use and buildings were not applicable to these exceptional zones, and developers were allowed to propose their own planning schemes without restrictions. Stimulated by the government's policy, the construction of high-rise office buildings and condominiums has subsequently boomed in central Tokyo, and with some time lag in central Osaka. These market dynamics will be discussed in further details in the next section.

2-4 Local cities : inception of 'compact city' policy

Apart from metropolises, local cities represent the opposite side of market bipolarisation in the land and property markets. Most of local cities are faced with the twin problems : decline of commercial accumulation mainly composed of privately-run small stores in city centres, and ageing-cum-decreasing population. In stark contrast to a once strong trend towards suburban sprawl, there is a 'reverse sprawl' reflected by a disorderly increment of vacant houses and lots in both urban areas and suburbs. Similar conditions can be observed also in the satellite cities of megalopolis.

In search for viable solutions to the demographic and urban impasse, many municipalities are eager to introduce the 'compact city' policy into their master plans. The 'compact city' model can be interpreted as a variant of the European 'sustainable city' model. The 'compact city' model involves a number of interrelated policy measures : (1) restraint on suburb development ; (2) preservation of landscape and environment ; (3) control of motorisation and advancement of public transport system ; (4) development of renewable energy ; (5) improvement and renovation of existing houses ; (6) induction of population to city centre ; (7) reallocation of communal facilities to city centre ; (8) recovery of good turnout at shopping street in city centre (Suzuki 2007 ; Oizumi 2013).

There are significant challenges in the pursuit of the objective of sustainable communities. Various movements with administrative/residents' initiatives are growing all over Japan. However, permissions are still granted for the development of housing and setting up of large retail stores in suburbs, measures which stand in sharp conflict with the 'compact city' policy. These conditions increase the potential for an accelerated 'reverse sprawl' in the near future. It is clearly difficult for many municipal authorities to slow down the momentum of development-oriented urban policy.

3 Housing stock and housing market dynamics

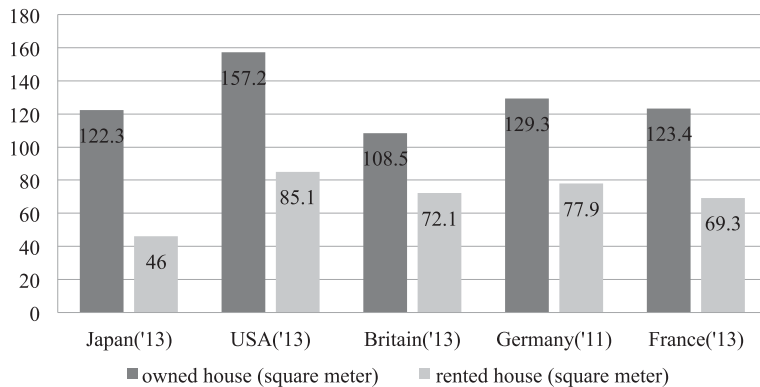
3-1 Housing stock : overabundance and differentials in quality

As of 2013, the total number of dwellings in the country amounted to 60.6 million units, while that of households amounted to 52.5 million. The number of vacant dwellings reached 8.2 million and its share in the total number of dwellings amounted to 13.5 per cent. Among these vacant houses, the proportion of houses for sale or rent is equal to 56.1 per cent. During the period from 1998 to 2013, while the total number of houses increased by 10.4 million units with a growth rate of 20.7 per cent, the number of vacant houses increased by 2.4 million and its rate of increase was 42.2 per cent (MIC 2013). Some inferences based on the underlying trends suggest that, unless housing construction unexpectedly recedes or vacant houses are extensively eliminated, the number of vacant houses would exceed 13.9 million units and its share in the total stock would reach 21 per cent by 2023.

Although the vacancy rates in the metropolitan cities are generally lower than those in local cities, the incremental increase in vacant houses has strong implications for the housing markets in the metropolis as well. For instance, in the central Tokyo (Chiyoda, Chuo, Minato, Shinjuku and Shibuya Wards), the vacancy rate of non-wooden apartment houses is estimated at 14.5 per cent on average. While the construction of towering condominiums is booming in the central area, vacant dwellings continue to increase in the existing apartments stock located in the surrounding area. In particular, the Minato Ward has a vacancy rate as high as 15.6 per cent, despite a booming bay-side housing development. Faced with the advent of the era of housing overabundance, the Ministry of Land, Infrastructure, Transportation and Tourism (MLIT) regards the solution associated with the redistribution of vacant houses as an important policy issue.

Another area of concern in the housing stock is the disparity in quality between owner-occupied and rented houses. An international comparison of the average floor space of houses helps to put this problem into perspective. As shown by Figure 5, the average size of owner-occupied houses in Japan (estimated at 122.3 square meters as of 2013) approaches or exceeds those in Britain, France, and Germany. On the other hand, that of rented houses (estimated at 46 square meters) is considerably smaller than comparable figures in other countries. There is a long-term significant improvement in the size of owner-occupied houses, which evolved from a historical estimate of 91.3 square meters in 1963. In contrast, the size of rented houses remains almost unchanged, compared to its estimate of 38.8 square meters of half-a-century ago.

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Source : MLIT, 2015 a

Figure 5 Average floor space per unit of owner-occupied and rented houses : Comparison of Japan with Britain, France, Germany and the USA.

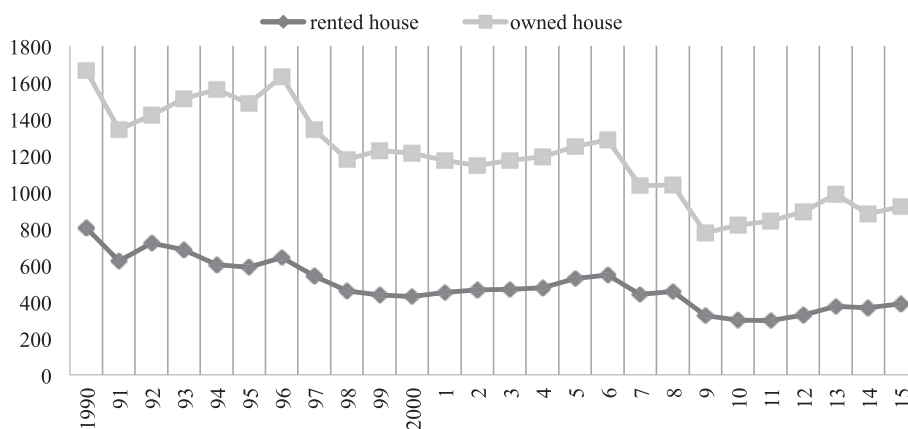
The problem of qualitative differentials is conspicuous for private rented houses in particular. In 1976, the former Ministry of Construction introduced the minimum housing standards with the policy objective to improve the quality of houses. The housing standards were conceived as the basis and essential condition for sound and cultural residence, aimed to be achieved for every household by 1985. But this goal has not been attained according to plan, and there are little signs thirty years later, that it would ever be achieved in the near future.

While the specific figures of these housing standards have often been revised, the present norms determine, for instance, the minima of 25 square meters of dwelling floor area for one-person household and 40 square meters for a family household composed of parents and two infants. The number of households residing in below-standard houses amounts to 3.7 million, 7.1 per cent of the total households. Among the households residing in private rented houses, the share of them reaches 20.6 per cent. Particularly there are 29.1 per cent (535 thousands households) of the total households residing in private rented houses in Tokyo metropolis, and 30.8 per cent (152 thousands households) in Osaka City who reside in below-standard houses.

In fact, the problem of disparities in the quality of housing stock lies principally in the private rented houses located in the metropolitan cities. The MLIT is pursuing policies to promote changing houses among residents, and thereby resolve the twin problem of overabundance and differentials in quality. The growing circulation of existing houses is therefore ranked as an important policy issue. However the redistribution of housing stock through market solutions does not advance as well as expected. On the contrary, the housing market dynamics seem to be acting towards the aggravation of the existing problems of housing stock.

3-2 Housing market : bipolarisation and high volatility

Housing construction can be considered as a barometer of housing dynamics. Figure 6 demonstrates the behaviour of housing construction classified in owner-occupied and rented houses. After the collapse of the property bubble, housing construction amounted to 1.5 million units per year by the end of 1990s, compared to 1.7 million units per year at the height of bubble from 1987 to 1990. During the 2000s, housing construction recorded 1.2 million units per a year by 2006, but in association with the onset of the U.S. financial crisis in 2008, it sharply reduced to 780 thousands units in 2009, and then hovered around 800 to 900 thousands units per year. A short-lived increase appeared in 2013, due to a ‘last-minute’ surge in housing demand precipitated by the imminent increase in the rate of consumption tax in 2014.



Notes : Data (thousand unit) are shown stacked by sector. Rented houses include public rented and company housing.

Source : MLIT, *Housing Starts Statistics*.

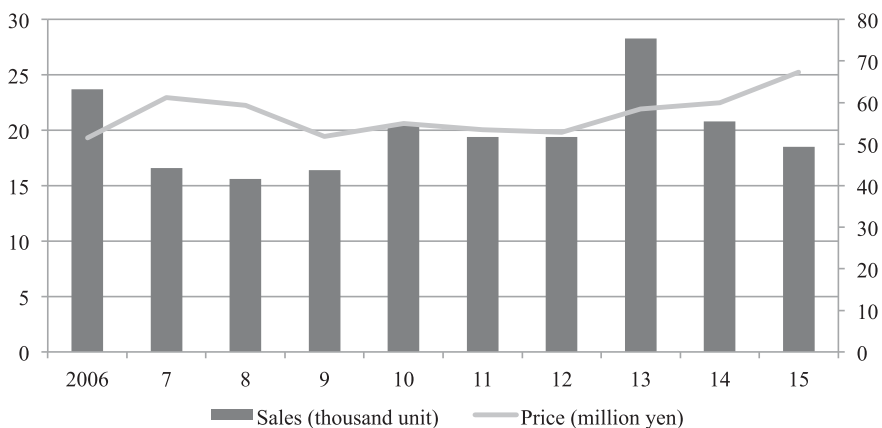
Figure 6 Construction of owner-occupied and rented houses in Japan, 1990-2015

There are widening disparities in regional economies and household incomes, which cause uneven distribution of housing demand among various cities. Under these conditions, housing markets have been bipolarising into growth segments in the metropolitan cities and stagnation segments in local cities. The booming construction of condominiums is representative of these particular developments. Since the beginning of 2000s, the construction of this type of housing has been brisk in the metropolitan area, and in particular the Tokyo metropolis. Although the construction boom of high-rise condominiums in 2006 and 2007 was disrupted by the onset of the U.S. financial crisis, it is emerging again with anticipations of greater prosperity in association with the Tokyo Olympics 2020. During the period from 2010 to 2014, the total number of condominiums under construction amounted to 576 thousands units, with 56.7 per cent concentrated in the Tokyo metropolitan area.

As already stated in the second section, the booming markets were the result of the government's urban redevelopment policy targeting the centre areas of metropolitan cities. The revised City Planning Law of 1997 introduced a new zoning district for high-rise dwellings, where the upper limit of floor-area ratio of building was raised to 600 per cent, and the off-site shadow control was relaxed. From 2002, Urgent Redevelopment Zones were designated at the centre areas of metropolitan cities, where the limit of floor-area ratio was raised to 800-1,200 per cent at maximum. Thus a series of deregulatory measures has boosted up the construction of towering office buildings and condominiums in metropolitan cities (Iwami 2016). During the period from 2004 to 2014, the number of towering condominiums newly provided in Tokyo and adjacent prefectures (Kanagawa, Saitama and Chiba) exceeded 525 blocks, with 158 thousands units. It was equivalent to a quarter of the total number of apartment houses newly provided in these districts over the same period.

However these booming markets are also more volatile. Because the supply of land exhibits strong rigidity against changes in price and demand, land and housing markets are imperfectly competitive markets in essence, and hence contribute toward accumulative disequilibrium. Under the conditions of diminishing total volumes of housing demand, a larger part of this demand converges towards investment and financing into few growing market segments. Though this process is conducive to disequilibrium, it cannot be persistent. Because there are only isolated booming markets, there is limited room for further investment and construction, and the increase in demand is repressed by soaring house prices.

In fact, the sales of condominiums in the whole country were consecutively reduced in 2014 and 2015. The sales in 2015 amounted to 78 thousand units, representing a drop of 6.1 per cent compared with the previous year. There is in particular, a decrease of 11.1 per cent in the Tokyo metropolis, as

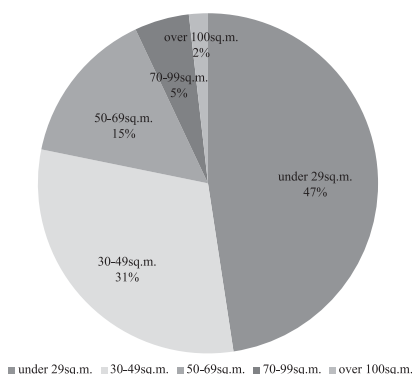


Notes : Data on 23 Wards of Tokyo metropolis. Left axis indicates thousand unit. Right axis indicates million yen.
Source : REEI, 2016.

Figure 7 Changes in sales and averaged price of condominiums in Tokyo metropolis, 2006-2015

shown by Figure 7. Due to a surge of building materials and labour costs, the average sales price of condominium in the whole country reached 46 million yen per unit, with a rise of 7.2 per cent. In Tokyo metropolis, the average sales price reached 67 million yen with a rise of 12.3 per cent. The market is faced with the depressed demand caused by aggravated conditions in housing affordability.

Figure 6 indicates also that the construction of rented houses, a large portion of which is represented by private houses to let, has maintained historical levels of large volume. Nevertheless, as already shown by Figure 5, the problem in quality of private rented housing stock is not solved yet. Figure 8 shows that a large share of 47.6 per cent in the private rented apartment houses located in 23 Wards of Tokyo is occupied by cramped dwellings with less than 29 square meters. In fact, a larger part of the rental housing construction has been devoted to the speculative construction of small studio apartments with 20-30 square meters, which are associated with anticipations of high profitability.



Note : Total number of the houses amounted to 1.4 million units.

Source : MIC, 2013.

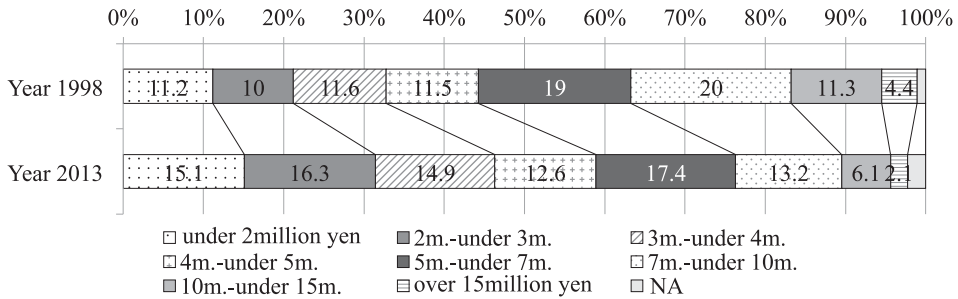
Figure 8 Component ratio of the volume of private rented apartment houses classified by floor space, in 23 Wards of Tokyo metropolis, as of Year 2013

The housing provision through volatile markets thus furthers the problems of overabundance as well as disparity in housing stock. This adds to the aggravated problem of affordability, which represents an obstacle to the appropriate distribution of houses. The focus is hereafter made on this important issue of housing affordability.

3-3 Housing affordability problems : homeowners and tenants

Figure 9 shows the component ratio of each income group in homeowner's households. The proportion of homeowners with annual income of less than 4 million yen increased considerably from 32.8 per cent in 1998 to 46.3 per cent in 2013. In contrast, the proportion of households with annual income of 5-7 million yen decreased from 19 per cent to 17.4 per cent, and that of households with annual income of

7-10 million yen decreased from 20 per cent to 13.2 per cent. This middle-income class decreased not just on relative basis but in absolute terms as well. Hence, it is evident that income distribution among homeowners is increasingly skewed towards lower-income groups.



Note : The number of homeowner's households amounted to 26.5 million in 1998, and 32.2 million in 2013.
 Source : MIC, 2013 and various years.

Figure 9 Component ratio of each income group in homeowner's households in Japan : comparison between Year 1998 and 2013

Part of the reason for this skewness towards lower-income homeowners may have done with the increment increase of aged homeowners reliant on pension benefits. But there are also other important reasons behind the increase in lower-income home-buyers including the decrease in land and house prices, and historically low interest rates on housing loans. However, the burdens of loan repayment are putting stronger pressure on household accounts despite the very accommodative ultra-low-interest rate policies. Table 1 shows the average income and loan repayment of worker households with housing-loan borrowings. It is evident from the comparison between data observations from 2000 and 2013 that a remarkable decrease in disposable income (reduction rate of 11 per cent) results in a stronger burden in loan repayment.

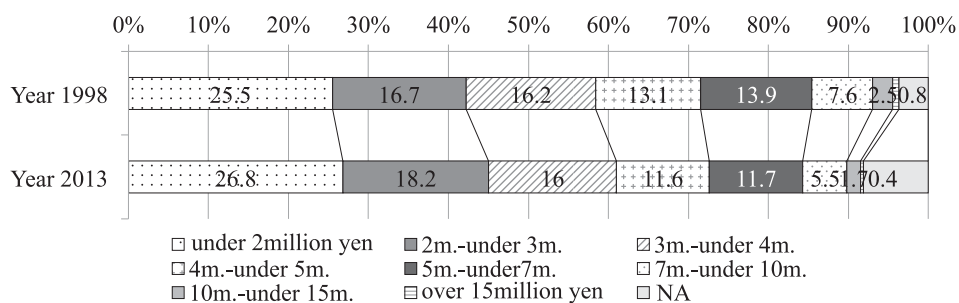
Table 1 Average income and loan repayment of worker households borrowing housing loans in Japan : comparison between Year 2000 and 2013

Item description	Year 2000	Year 2013	Rate of change
Number of persons in household	3.77	3.67	-
Householder's age	46	45.9	-
Total income (yen per month)	653,760	601,951	-7.9%
Disposable income (yen per month)	545,334	485,331	-11.0%
Loan payment (yen per month)	101,770	99,867	-1.9%
Rate of loan burden (%)	19	21	-

Note : Rate of loan burden = loan payment/disposable income
 Source : MIC, *Household Accounts Survey*.

Next, Figure 10 shows the component ratio of each income group of worker households occupying

private rented houses. The proportion of tenants with annual income of less than 3 million yen increased considerably from 42.2 per cent in 1998 to 45 per cent in 2013, with the aggregate number reaching 6.6 million. Table 2 shows the average income and rent payment of worker households occupying private rented houses. There is also a remarkable decrease in disposable income (indeed, at a faster diminishing rate of 23.1 per cent), which resulted in a heavier burden of rent payment.



Note : The number of tenant's households at private rented houses amounted to 12.1 million in 1998, and 14.6 million in 2013.

Source : MIC, 2013 and various years.

Figure 10 Component ratio of each income group in tenant's households at private rented houses in Japan : comparison between Year 1998 and 2013

Table 2 Average income and rent payment of worker households residing at private rented houses in Japan : comparison between Year 2000 and 2013

Item description	Year 2000	Year 2013	Rate of change
Number of persons in household	1.47	1.28	-
Householder's age	38.7	40.6	-
Total income (yen per month)	459,826	369,979	-19.5%
Disposable income (yen per month)	397,256	305,674	-23.1%
Land and house rent (yen per month)	62,693	57,296	-8.6%
Rate of rent burden (%)	16	19	-

Note : Rate of rent burden = rent/disposable income

Source : MIC, *Household Accounts Survey*.

It is noted that data observations used in the above analysis represent average values. Under the prevailing conditions of worsening job security and declining household income, there is a proliferation of marginal groups including younger, middle-aged and elderly singles with lower income, single parent households, and homeless peoples.

The National Consumption-State Survey by the Ministry of Internal Affairs and Communications (MIC) reveals the increasing rent burden of young singles. Judging from the expenditure of working singles within the age category of less than 30-year old, the proportion of rent payments in the monthly average consumption expenditures considerably increased between the years 1999 and 2009. The rent ratio

for a male single increased from 14.6 per cent to 21.6 per cent, while that for a female single increased from 24.2 per cent to 31.1 per cent. Such wide differentials in rent expenses between genders may be explained by two principal reasons. First, the proportion of non-regular and low-wage employees is much higher among the population of female employees than that of male employees. Second, there is a stronger tendency for female singles to prefer better located, well-equipped, and hence more expensive houses, as security factors remain an important determinant of their housing preferences.

The proliferation of these marginal groups of low-income households provides an economic rationale for the arguments about the 'housing poor'. Households with lower income levels have to unwillingly accept residences of very poor quality and insecure tenancy. This state-of-affairs is symptomatic of the serious socio-economic implications of the present housing problems (Inaba 2009).

At the bottom of the housing markets, there are indeed lucrative opportunities that can benefit some businesses at the expense of the 'housing poor'. The provision of 'illegal rental rooms' is achieved through the partitioning of house floors or buildings into many small rooms that are more akin to 'rabbit holes' than habitat for human beings. In fact, those rooms are divided by flammable-panel walls without windows. It is obvious that such floor partitions are made in clear violation of the Building Standards Law. The MLIT investigated in December 2014 the prevailing floor conditions for the first time, and exposed 1,148 illegal cases in the whole country. Tokyo metropolis presented the highest number of 944 cases accounting for more than 82 per cent.

4 Housing problem and housing policy

4-1 Restructuring of government's housing policy

In the post-war Japan, public policy to promote housing provision was served mainly by the three institutions established in the 1950s: the Government Housing Loan Corporation (GHLC) financing the middle-class purchasing home, the municipality-managed Public Housing System providing the lower income groups with rented houses, and the government-sponsored Japan Housing Corporation (JHC) providing residents of the metropolitan cities with houses for rent and sale. Those institutions played important roles in the mass housing system whereby acute housing shortage caused by rapid urbanisation was to be solved. However, from the mid-1990s the government engaged in drastic restructuring of those institutions.

With the revision of the Public Housing Law in 1996, the upper income limit for tenants of public housing was lowered, while the government simultaneously curtailed its subsidies for public housing construction. The former JHC, which was already reorganised as the Urban Development Corporation and began to withdraw from housing provision, was at last abolished in 2004 and replaced with the Ur-

ban Renaissance Agency (UR) to provide support for private urban redevelopment business. The GHLC was abolished in 2007 and replaced with the Housing Finance Agency (HFA), dealing exclusively in securitisation of bank housing loans. A series of restructuring was in accordance with the principle that housing policy was to be limited to supplement the operation of the market. It essentially followed a neo-liberalist approach that supported both privatisation and deregulation in housing system. As an overall finish, the Housing Construction Plan Act of 1966, which provided the legal basis for the post-war housing policy, was abolished and replaced with the Fundamental Law of Housing Life of 2006.

The government determines and regularly revises the Housing Life Master Plan as a guideline for municipality's housing policy. The recent master plan is setting the policy targets as follows : (1) Creating a living environment that supports safe, secure and affluent residential living ; (2) Proper management and renewal of existing apartment buildings ; (3) Preparing the conditions for a housing market in which the circulation of existing houses grows ; (4) Assuring housing stability for those who require special support for housing (MLIT 2015 b).

The government's housing policy is challenged by a full-scale emergence of ageing society with falling birth-rates, declining population and family households, and the socio-economic climate of deteriorated employment and decreasing household income. In this context, the above third and fourth targets are much significant.

Advancement of the market for the circulation of existing houses : Within the whole housing market in Japan, the transactions of existing houses hold only 14.7 per cent at very low level compared to Britain and the USA with the share of 88-89 per cent. It means, in spite of there being actual housing stock available, this stock is not used for upgrading and/or moving house. Therefore the MLIT emphasises that it is important to activate the distribution of existing houses through the market.

Enhancement of the housing safety net for low-income earners : The provision of public housing is an important safety net for low-income earners including the unemployed, elderly, disabled, and single-parent families. Nevertheless, under the reduced subsidies by the government, many municipalities have reduced the construction and provision of public housing. In line with the 'marketisation' of housing policy, the measures of government and municipalities are shifted to using private rented housing for their purpose.

4-2 Housing policy and private rented housing market

The historical transition in composition of housing tenures demonstrated with Table 3 reflects some features of Japanese housing policy. While the housing policy has strongly promoted the spread of owner-occupied dwellings, the provision of public rented housing has been throughout remained at a low level, and the public intervention in the market of private rented housing has not been executed. Instead, a

large part of the assistance for residence in rented houses has been taken over by the corporate housing welfare, providing employees with low-cost rented housing (company housing) or housing allowance. But the beneficiaries of this system are limited to the regular employees of companies.

Table 3 Housing stock and component ratio of housing tenures in Japan, 1958-2013

year	total number (million units)	owned house (%)	private rented (%)	company housing (%)	public rented (%)	vacancy ratio (%)
1958	17.9	71.2	18.5	6.7	3.5	2
1963	21.1	64.3	24.1	7	4.6	2.5
1968	25.6	60.3	27	6.9	5.8	4
1973	31.1	59.2	27.5	6.4	6.9	5.5
1978	35.5	60.4	26.1	5.7	7.6	7.6
1983	38.6	62.4	24.5	5.2	7.6	8.6
1988	42	61.3	25.8	4.1	7.5	9.4
1993	45.8	59.8	26.4	5	7.1	9.8
1998	50.2	60.3	27.4	3.9	6.7	11.5
2003	53.9	61.2	26.8	3.2	6.7	12.2
2008	57.6	61.1	28.7	2.8	6.1	13.1
2013	60.6	61.7	28	2.2	5.4	13.5

Note : Public rented houses include JHC/UR housing.

Source : MIC, 2013 and various years.

Given the scarcity of public rented housing, many people have to rely upon private rented housing, but in the absence of a general scheme of rent assistance. Thus tenants with low-income are faced with a structural gap between supply and demand in the market : the tenants' limited rent-payment capacities are not able to meet the supply prices compensable to cost for appropriate maintenance and/or replacement of rented dwellings. This dilemma naturally follows the serious affordability problem for many tenants and the provision of rented housing of poor quality, as already mentioned in the third section.

Under the present condition where both the shrinking provision of public housing and the companies' withdrawal from housing welfare have advanced, the structural defect of private rented market and the housing problem for low-income class people are increasingly remarkable. A questionnaire recently conducted by the Big Issue Japan Foundation, an advocacy NPO to save the homelessness, reveals the housing distress of young people. Among 1,767 of 20-39 years old singles with annual income less than 2 million yen, who dwell at Tokyo and Osaka metropolis, the bearers of rent burden ratio (rent/disposal income) amounting to more than 30 per cent reach to 57.4 per cent of them, and besides those who bear rent burden ratio of more than 50 per cent occupy indeed 30.1 per cent. Incidentally the singles with annual income of less than 2 million yen mean, in fact, those who are in condition below the official standards for livelihood protection system. Nevertheless they are left without any public assistance.

It is also serious the situation where the elderly singles are laid. As stated in the first section, Tokyo

metropolis has the highest proportion of elderly singles amounting to 38 per cent as of 2010 among all prefectures. For instance, in Minato Ward of central Tokyo, where the construction of towering buildings and condominiums is booming and the population is increasing, it is confirmed there are 5,656 elderly single residents as of 2011. As for their dwellings, 15.9 per cent of them resides at private rented housing, while 20.8 per cent resides at public rented housing. Their income is generally at low level, 48.6 per cent of them have annual income of less than 2 million yen. The housing problem for elderly singles have complicated aspects including not just the risk in housing affordability but also the risk of social isolation (Kawai 2015).

Housing market tends to exclude the minorities such as the elderly, handicapped, foreigners and single parents with low income. There are actually many cases where they are refused move-in to private rented houses by landlords with prejudice and mentality to evade troubles with tenants. Against this problem of social exclusion, the government aims at facilitating them to obtain a home through the Housing Assistance Council, composed of administration, real estate agents, landlords and citizen organisations, providing with housing assistance such as information and consultation services. While there are 61 councils in all prefectures and 14 municipalities as of April 2016, the government targets on establishing them at more cities.

Although such kind of assistance is welcome development, it is obviously insufficient to assure housing stability for low-income earners in serious need of decent residential living. Given the rapid increment of low-income class people, the provision of good quality and low rented housing should be a core of housing policy. As stated in the third section, the dominant supply of poor rented housing was a result of the lack of housing policy for this sector. Desirable development of private rental housing markets will not be attainable unless production subsidies and housing allowances are extensively allocated to landlords and tenants.

4-3 Proposal for housing policy : housing allowance and social housing provision

The logic of the government's policy is using vacant stock for providing good quality home, through making the stock of owner-occupied houses available for rent. However affordability problems for low-income tenants operates as a crucial bottle neck to prevent from smooth moving home. There is the gap between demand and supply in private rented housing market. The measures to solve the gap is a combination of housing allowance and social housing provision. To provide low-income class people with decent home, vacant houses meeting standards should be kept with priority as 'quasi-public housing'.

In the context of a remarkable increase in low-income households and single households, the needs for decent houses with low rent are growing among them. However there is the striking disparities in quality of the stock between owner-occupied houses and rented houses, and besides the increment of

risk-vulnerable tenants and the 'housing poor'. Therefore the security in residence, which leads to human security, is a keystone in rented housing policy.

However the principle of the security for decent residence is not reconcilable with the housing policy of neo-liberalism. The 'safety net' allowable in the neo-liberalism approach is a minimal relief measure for the economically disadvantaged people difficult to gain access to the market. Whereas the security in residence is a general principle for every people without distinction of house-owners and tenants. But, although the security policy in residence might be irreconcilable with the neo-liberalism, it is not completely irreconcilable with the housing market. This proposing a question leads us to a consideration on the relationship between the security in residence and the housing market.

The present housing market is facing with the especial structure of housing demand : (1) The aggregate amount of housing demand is decreasing, because of the decrease and ageing in population and the failing of household income as a result of deteriorated employment. (2) The disparities among the decreasing housing demand are widening on two sides. (3) On the one side, the disparities among housing demand are widening as the uneven distribution among regions. On the other side, the disparities among housing demand are widening caused by the income disparities. (4) These kinds of the decrease and disparities in housing demand are resulting in the bipolarisation of housing markets in both the metropolitan cities and local cities.

Such structure of housing demand is a postulate for the market, and the market has not the function to alter the demand structure itself. On the other, the system and policy of the security in residence can operate the change in the structure of housing demand through rectifying the disparities in household income. Therefore the security in residence can be a favourable condition to stabilise the growth of housing market.

The measures of rented housing policy to achieve the security in residence are both rent assistance and social housing provision. First, the government should establish the comprehensive and permanent system of rent subsidy for low-income tenants. Actually the rent assistance schemes for private rented housing is conducted by 75 municipalities as of 2009. The tenants qualified for assistance are various depending on the purpose of each scheme : the elderly, young with low income, the handicapped, single parent household, newly married couple and couple raising small children. However the municipalities conducting this scheme are very few, and besides the duration of benefits is limited in varying degrees. Supported by the government's sufficient grant, the scheme should be introduced by all municipalities, and should be permanent as far as tenants are eligible for benefit.

And second, the improvement in quality of rented housing stock should be promoted through the increasing provision of social housing. The municipalities should actively cope with construction of public housing, leasing of private rented houses and introducing the European social housing system. The pol-

icy package of both the rent assistance and the social housing provision is effective to promote the provision of decent and affordable housing in the rented housing market. This coherent public policy approach to the rented housing market can be conducive to a stable growth of owner-occupied housing market, and hence a sustainable growth of the whole housing market.

5. Concluding remarks on housing policy agenda

Growing divides in housing markets constitute the core of the present housing problems around the world (UNECE 2015). This article revealed the distinctive dynamics and relations involved in housing divides in Japan's case. The final section summarises several lessons and policy agenda derived from the Japanese housing experiences.

Bipolarisation in land and housing markets : The collapse of the property bubble resulted in the long-term stagnation of land and housing markets. But, from the early 2000s, an increase in property and housing investment started in Tokyo metropolis. Since then, the bipolarisation of land and housing markets has advanced into the growing market segments and stagnant market segments. In this context, land policy has been also bifurcated in both metropolitan cities and local cities.

There is a boom in the construction of towering condominiums and office buildings in the centres of metropolitan cities. This expansion is strongly promoted by deregulation in land-use policy. Contrastingly, there is the ongoing 'reverse sprawl', disorderly increasing of vacant houses and sites, in both urban area and suburb of local cities with deeper depopulation. Faced at this problem, many local municipalities are eager to introduce 'compact city' policy. It is a significant challenge in the pursuit of sustainable community.

Housing market dynamics and housing problems : Housing stock has increasing vacancies and the disparity in quality between owner-occupied and rented houses. These problems are closely associated with the housing market dynamics in the metropolitan cities. Volatile housing construction is conducive to further increases in vacant houses, and speculative construction of small apartments causes the incremental differentials in rented housing stock. In fact, disparities in the quality of housing stock are centered in the private rented stock located in metropolitan cities.

Under the conditions where income distribution among homeowners and tenants is skewed towards lower-income groups, housing market dynamics operate on worsening housing affordability. Despite a few decline in loan repayment and rent, a significant decrease in disposable income implies heavier burdens of both mortgage loan and rent payment. In particular, marginal groups with lower-income suffer from excessive housing expenses and wretched residences.

Proposal for alternative housing policy : In the context of rising vacancies, there is a need to de-

velop the housing markets for a better circulation of existing stock. The provision of affordable housing for low-income earners is a necessary remedy to the problems of ‘housing poor’. The government aims at using the vacant stock to provide good-quality homes by making the owner-occupied houses available for rent. However, the affordability problem for low-income tenants constitutes a serious bottle-neck that prevents smooth movement into decent housing.

The appropriate measures to address the affordability problem for low-income tenants include a combination of rent assistance and social housing provision. A comprehensive and permanent scheme of rent allowances is crucially needed for low-income tenants. To provide low-income tenants with decent homes, the vacant houses that satisfy the minimum housing requirements and standards should be reserved and prioritised as ‘quasi-public housing’. The coherent public policy approach to the rented housing market can be conducive to a stable growth of the whole housing market.

Additional remark :

The author participated in an international symposium on housing market and land policy held at the University of Hong Kong, on 15 and 16 May 2016. This article is a revision of the research paper submitted to the organizing committee of that symposium. Comments are welcome.

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