

Investigating the Connection Between Income Inequality, Urbanization, and Real Estate Prices: A Comparative Analysis

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Abstract: This paper analyzes relationship of real estate, urbanization, road construction, and income disparity in the same system. It can theoretically solve problem of the excessive income disparity and slow urbanization. The author will utilize the literature research approach to clean up a lot of data in order to assess and summarize the three keywords in detail. This paper reviews and summarizes the literature at home and abroad from the perspective of three pairs of economic relations: (1) The impact of real estate price fluctuations on income disparity (2) the impact of urbanization on real estate prices (3) The impact of urbanization on income inequality. The relationship between the three are analyzed in the context of urbanization in the new era, From the literature research, it is concluded that the rise in real estate prices enlarges the gap of income inequality. (1) Real estate prices have an unsustainable impact on the urbanization path (2) The "negative effect" of the urbanization development model on the income gap will be greater than the "positive effect" Finally, according to the above analysis, it is concluded that urbanization can narrow the income gap between urban and rural areas through the medium of the real estate industry. Based on the research conclusions, the following suggestions are drawn: (1) Long-term development of urban planning: It is recommended to have more reasonable urban planning, avoid over-development of core cities, promote the development of small and medium-sized cities, and alleviate the upward pressure on real estate prices.

Keywords: Urbanization Roads, Real Estate Prices, Income Gaps.

1. Introduction

Objectives: To investigate trends in income inequality, real estate prices, and urbanization in the literature and data currently available.

This essay seeks to investigate the connection between the newly established urbanization trajectory in the modern period and the cost of real estate under the new regulations, and the income gap under the high-quality development pattern by using the literature research method. And use the case analysis method to solve the problem of wealth gap with the gap between the east and the west as a new idea. In terms of research scope, most experts and scholars focus on industrial upgrading, real estate prices, and income disparities as the research perspective, but this paper makes an

innovation in the research perspective, using urbanization road construction instead of industrial upgrading, and thinking about China's development from a more macro perspective.

2. Background

(1) Income gap: It was noted at the 19th National Congress of the Communist Party of China that China has transitioned from a period of rapid development to one of high-quality development, and that the country's primary contradiction now lies between the people's increasing demands for a better life and uneven and insufficient development.

Data from the National Bureau of Statistics regarding farmers' per capital net disposable property income (2014–2023) and the rate of increase in that income occurs between 14.1% in 2014, 10.3% in 2019, 11.0% in 2020, and 6.0% in 2023. In contrast, the rate of increase in urban regions' net per capital disposable income (from 2014 to 2023) For example, from 10.2% in 2014 to 5.4% in 2020 It has increased from 5.4% in 2020 to 9.2% in 2021 It reflects the characteristics of the large income gap between urban and rural residents in China in the new era. Engel's coefficient can also feedback on China's income disparity: (Regarding shifts in the consumption structure, a rule is derived that states that the fraction of household income (or total spending) spent on food increases with decreasing family income and decreases with increasing household income. Therefore, the proportion of food spent on food per citizen's average income (or average spending) increases with a nation's poverty; in 2014, China's urban inhabitants' Engel coefficient was 30.0%, while China's rural residents' Engel coefficient was 33.6%, while in 2023 the data for urban residents was 28.8% and the data for rural residents was 32.4%. Although the Gini coefficient of household income in 2010, 2012 and 2014 was 0.533, 0.504 and 0.495 respectively, showing a year-on-year decline, it is generally characterized by a large income gap.

Urbanization: China's urbanization path can be summarized into the following stages: the periods of urbanization's development and stagnation during the planned economy, its fast development during the emancipation and growth of productive forces, and its high-quality development throughout the modern economic system [1]. Based on information from China's National Bureau of Statistics, from 184,098.59km² in 2014 to 200,896.50km² in 2018, it showed an upward trend, but showed a downward trend after 2018 (From 200,896.50km² in 2018 to 191,216.77km² in 2022), it reflects the declining urbanization rate in the new era. From the founding of the People's Republic of China in 1949 to the end of 1977, the government of the People's Republic of China set the strategic goal of giving priority to the development of heavy industry in order to change the situation of poverty, backwardness and isolation, and adopted a well-organized but highly distorted political and economic system following the Soviet model. From 1972 to 2012, Since the 11th Central Committee of the Communist Party of China's Third Plenary Session, China's efforts have switched from viewing class conflict as the primary component of economic development [1]. The Chinese government has introduced market elements into the planned economy; the household responsibility system stimulates peasants' enthusiasm for production; The growth of township businesses has given the excess labor force in rural areas more jobs, while the "hukou" reform has encouraged the movement of labor between urban and rural areas. It has promoted the development of China's urbanization path (from 272.93 million in 2004 to 372.87 million in 2012, while the rural employment population decreased from 469.67 million to 389.67 million; The comparison between the upward trend of urban employment and the downward trend of rural employment can reflect the increase in urbanization rate and the promotion of population circulation From 2012 to the present, China has changed from high-speed development to high-quality development, and China's urbanization rate has slowed down under the background of high-quality development The urbanization rate of the registered population is increasing, and the urbanization path with migrant workers as the core is moving forward [1].

Real estate sector: Due to its explosive growth, the real estate sector has drawn interest from both domestic and international specialists and researchers. Real estate investment is growing at a pace that is significantly faster than the growth rate of the gross domestic product, and the industry has been experiencing a golden age since the turn of the century, for example, from 498.4 billion yuan in 2000 to 147602 billion yuan in 2021, and the proportion of GDP has risen from 4.97% to 12.91% [2]. To a certain degree, the price of real estate in China has decreased. The 42 average sales prices of commercial real estate in China rose 381% from 2000 to 2021, from 2,112 yuan to 10,139 yuan; In China, the average price of residential and commercial real estate transactions rose by 434%, from 1,948 yuan to 10,396 yuan [2].

The area of urban housing has increased in line with the urbanization rate (from 20 m² in 1993 to 70 m² in 2018) Research implications: China is currently in the context of the failure of traditional economic growth points, the call for common prosperity and the Lewis turning point. This article will explore the relationship between urbanization, real estate prices, and income inequality. The urbanization road can provide jobs, liberate productive forces, and raise the rate of labor resource utilization, which influences the 50 percent income disparity between urban and rural areas as well as the fundamental needs for shared prosperity. The income gap affects the real estate price, which makes China's urbanization road unable to advance smoothly, and the excessively high real estate price increases the pressure on most residents, affects the urban-rural distribution, and hinders the process of urban-rural development integration.

3. Literature Review

In reading a lot of literature and materials, the review perspective of this chapter is also to sort and summarize the connections between the two, as the author discovered that most experts and scholars concentrate on the relationship between urbanization, real estate price, and income disparity, but rarely summarize and study the interaction between the three

3.1. An overview of studies on the relationship between income inequality and real estate prices

In the current context of high-quality development, Chinese real estate has ushered in a golden period of development this decade. Although the Chinese government recently implemented a number of macro price control measures to regulate the real estate market, the market was once slow and prices were nearly "cut in half," but overall, prices are still relatively high. The price of real estate is directly correlated with the income of both urban and rural citizens nationwide due to the inflexible demand characteristics of the real economy and the "bubble" of the virtual economy, which significantly affects the income disparity. Through the analysis of pulse response function and variance in the PVAR model, there is a positive relationship between real estate prices and the urban-rural income gap, and it is believed that the rise of real estate prices will further widen the urban-rural income gap, but the excessive urban-rural income gap will have a reverse inhibitory effect on the impact of real estate prices [3]. Guo Kailong used empirical study to validate his own hypothesis: (1) Housing price fluctuations can affect the income gap between urban and rural areas through wealth effect, credit effect, and inflation Guo Kailong believes that the wealth effect widens the income gap between urban and rural residents through the different investment attributes of urban and rural real estate. The credit effect is caused by the difference in investment channels between urban and rural residents, and inflation is caused by the income gap between urban and rural residents through their ability to resist inflation [4]. (2) There is a threshold effect of housing price fluctuations on the urban-rural income gap, and only when the housing price growth rate reaches a certain level (the housing price growth rate is higher than 3.58%) Will it affect the disparity in income between urban and rural areas?

According to Xiao Yao, real estate prices have a regional effect on the income disparity between urban and rural areas: (1) in the eastern region, the impact of real estate price rise is mostly "negative effect", and (2) in the central and western regions, real estate prices show a "positive effect"[5]. Through panel data analysis, it is concluded that the rise in commodity housing prices can promote income growth through the "wealth effect"[6].

3.2. A review of research on urbanization, roads and real estate

Many academics have now conducted enough study on the connection between urbanization roads and real estate in the context of the new urbanization road. There is a positive correlation between urbanization rate and real estate price (in the initial stage of urbanization, the impetus to real estate price is small, but in the acceleration stage, it is larger) [7]. Liu Jianfu and Liu Qiuming concluded through inter-provincial panel data analysis that urbanization roads promote population flow, such that both the degree of urbanization and real estate values rise. It has also been demonstrated that the improvement in urbanization level is positively correlated with real estate prices [8]. Huang Qingzhong and Jiang Song (2014) concluded through the inter-provincial panel data that urbanization road construction has a "gate effect" on real estate prices [9].

3.3. A review of research on urbanization roads and income gaps

The authors of this paper have collected a large number of studies on urbanization roads and income gaps, and many literatures have a significant impact on income inequality on the surface of urbanization road progress [10]. 2018 Deng Qian and He Aiping Through panel data analysis, is determined that it is necessary to encourage the modernization of the rural industrial system. Additionally, urbanization will encourage the growth of secondary and tertiary sectors in rural regions, increasing rural labor productivity and reducing the disparity in income between rural and urban regions. Liu Chengqing and Ren Ling analyzed the panel data of 207 prefecture-level urban areas in China: the inhibition effect of housing price increase on urbanization rate will widen the urban-rural income gap [11]. Jin Chunyu and Shi Shukai constructed the SDPD spatial dynamic panel model and the GWR geographically weighted regression model and concluded that promoting new urbanization according to local conditions can help improve the institutional structure of urban and rural education investment, encourage the two-way movement of labor between rural and urban regions and reduce the disparity in income between them. Zhang Weiying mentioned in his article "Urbanization and Economic Development" that the high-income job opportunities brought by urbanization are mainly concentrated in large cities and economically developed areas, while small and medium-sized cities and rural areas may not have the same opportunities, thus exacerbating the income gap between regions [12].

4. Analysis of the comprehensive influencing mechanism of real estate prices, urbanization roads and income inequality

This chapter mainly expounds and summarizes the core concepts and theories studied in this paper, and the current research on urbanization road, real estate price and income gap is in a mature stage, and a series of relatively mature theories have been formed, which are the basis for discussing the relationship between the three.

4.1. Basic Concept Definition

4.1.1. The concept of a new urbanization road

The flow of factors and the process of resource allocation are the essential connotation of China's regional economy, and the main driving force and fundamental feature of the urbanization road is the flow of population at the spatial level, and the process of China's urbanization has always been centered on the main line of China's regional economic development. The process of urbanization in China is subordinated to the internal requirements of national strategies and national tasks and the spatial implementation of national policies. Therefore, in the context of the new era, the new urbanization is particularly important. National New Urbanization Road Plan (2014-2020) >> pointed out that new urbanization is an urbanization road that comprehensively improves the quality of urbanization (the urbanization of migrant workers is the core).

4.1.2. Real estate price concept

Property price is a complex economic concept with complex economic categories, such as land prices and housing prices. Houses and buildings are the fruits of human labor and have value, the same value as general commodities. However, the price of land is a non-labor product and has no labor value, and the capitalization of land rent caused by land monopoly is the reason for the existence value of land. To sum up, The value of real estate is the sum of the value of the land's natural resources, labor-intensive construction, and value of the home itself.

4.1.3. The concept of urban-rural income disparity

As the name implies, the disparity in income distribution between urban and rural regions is the cause of the urban-rural income gap. In a limited sense, it describes the economic disparity between rural and urban dwellers (mainly in terms of income), and in a broad sense, it refers to the gap between rural residents and urban residents in terms of social welfare, consumption, medical care, etc. This paper mainly studies the income gap from the comparison between the per capita net disposable income of urban and rural residents, the Gini coefficient, the Engel coefficient and the employment of urban and rural residents.

4.1.4. The impact of real estate prices on income inequality with urban and rural areas

Real estate prices have a direct and indirect impact on income disparity, and the gap between urban and rural areas in China is relatively large, and housing prices are generally higher, so when housing prices rise, they will be more inclined to high-income groups. Scholarly research and analysis indicate that the wealth effect (direct influence) of real estate prices on the income gap, wealth effect refers to the fluctuation of real estate prices affects people's investment behavior and consumption behavior, and further affects people's income distribution, when housing prices rise, residents who hold investment properties can increase their income by selling, renting, etc., while most of the residents with real estate are urban residents, and residents without houses need to bear more rent due to the rise in housing prices, resulting in an increase in consumer spending. Residents who want to buy a house also need to bear higher prices and pay more money, so in general, the low-income group has transferred some of their wealth to the high-income group, increasing the income gap. Real estate has two properties: the real economy and the virtual economy, the real economy is mainly the use value of the attribute, the virtual economy is mainly the value of the attribute, the value is the investment attribute, and the use value is the residential attribute. Guo Kailong shows that the effect of the "wealth effect" is different between urban and rural areas. The real estate transaction system in the urban area

is mature, and the educational, cultural and infrastructure construction is perfect, so the urban residents can quickly sell and rent the real estate and use it as an investment behavior that is not just needed for housing, so the housing in the urban area has two values and attributes. At present, the rural areas of China implement the system of collective ownership of rural land, and the land is owned by the collective, so the rural real estate cannot enter the market for trading, and the lack of educational resources and infrastructure construction in rural areas leads to the lack of investment in rural housing. So, when the price of real estate rises, the value of real estate owned by urban residents appreciates, and when urban residents who hold real estate sell and rent out their properties, it will increase their family wealth income. However, the collective nature of rural housing makes it impossible to carry out market transactions, so that it cannot enjoy the wealth and property income brought by the wealth effect of high housing prices. Therefore, when housing prices are high, there is a significant income disparity between urban and rural communities. The disparity in income between urban and rural areas is indirectly influenced by real estate prices: when real estate prices increase, the cost of renting and buying houses in the city is raised, the threshold for rural labour to enter the city is raised, the mobility of rural labor force is slowed down, and the wage income of rural labour force population declines, and when the real estate price rises, the wages of urban residents will rise in real time, resulting in no significant change in their purchasing power, and the adjustment of labor wages in rural areas is a relative lag state, so the potential for rural income growth is limited. It cannot effectively resist the problem of declining purchasing power caused by the rise in housing prices. Consequently, it causes the income disparity between urban and rural regions to grow.

4.1.5. Analysis of the impact mechanism of urbanization on income inequality

In the context of the new era, the Chinese government has opened the road of new urbanization to break the dual structure of urban and rural areas. The differential settlement of the new urbanization and the urbanization of the rural population make the first group to settle in the urban area as the rural high-income group and high-skilled talents, which makes the marginal loss of talent and capital in rural areas higher than the average in the short term. However, in the long run, the new urbanization measures are conducive to breaking the dual structure of urban and rural areas, increasing the mobility of urban and rural labor, and making the rural surplus labor population flow to the cities, It will eventually help close the income gap between rural and urban regions, raise the per capita productivity of the rural labor force, increase the income of the rural people itself, and improve the efficiency of rural land output. The construction of the new urbanization road is favorable to encouraging the upgrading and development of the secondary and tertiary industry structure, which provides many jobs for the rural surplus labor force. Urbanization can also impact the income gap between urban and rural areas through the industrial structure, and improving the wage income of the rural population, and the new urbanization road will lead to an increase in the per capital land resource endowment, improve the labor productivity of the primary industry, and further reduce the income gap between urban and rural areas. When the dual structure of urban and rural areas is broken, the dual structure of education is also broken, and in the process of promoting the new urbanization road, the urban and rural education resources will be more balanced, the urban and rural education gap will be reduced, and the income gap between urban and rural areas will be fundamentally changed.

4.1.6. Analysis of real estate prices and their impact mechanism on urbanization

In the context of the new urbanization road, it is inevitable to discuss the relationship between real estate prices and the new urbanization road. Real estate prices have an inhibitory effect on the new urbanization: the core of the new urbanization lies in the urbanization of migrant workers, and rural residents must have a large demand for the real estate industry in the process of transforming into

urban residents, while the current situation of high real estate prices in cities will lead to the rise of the cost of buying and renting houses for rural residents, and increase the threshold for them to enter urban life, which will lead to the slowdown of the new urbanization road and affect the process of the new urbanization road. Real estate prices also have a positive effect on the development of new urbanization: (1) real estate prices have an indirect role in promoting the development of urbanization roads, as mentioned above, the real estate industry has the nature of housing and investment attributes, the investment attributes of real estate can make when the price of real estate rises to increase the income of urban residents and some rural residents, and the development of the financial industry can be promoted through the "credit effect" of real estate prices on the income of urban and rural residents, and the real economic nature of the real estate industry In addition to offering a significant number of jobs and employment prospects for rural inhabitants, it can encourage the growth of the secondary sector, facilitate the movement of rural surplus labor to cities, and accelerate urbanization. It can encourage the growth of the secondary sector, offer rural populations several employment options, and facilitate the movement of excess labor from the area.

4.1.7. Analysis of the comprehensive influencing mechanism of real estate prices, urbanization roads and income inequality

The comprehensive impact of urbanization, real estate prices and income disparity is a complex and multi-dimensional process, and the three affect each other and restrict each other. This section will elaborate on the relationship between urbanization, income disparity, urbanization trends, and real estate values according to earlier research. (1) The impact of the new urbanization road on income disparities and real estate prices: the new urbanization road will drive the excess labor force from the countryside to relocate to the city, increasing housing demand and perhaps creating a scenario where supply outpaces demand. Similarly, when housing prices rise, residents who hold investment properties can increase their income by selling, renting, etc., while most of the residents who own properties are urban residents, and those who do not have houses need to bear more rent due to the rise in housing prices, resulting in an increase in consumer spending. Residents who want to buy a house also need to bear higher prices and pay more money, so in general, the low-income group has transferred some of their wealth to the high-income group, increasing the income gap. Therefore, when the process of urbanization is promoted, it will increase the price of real estate and indirectly increase the income gap. (2) The reaction of real estate prices to urbanization and income disparity: the continuous high real estate prices will lead to a higher threshold for migrant workers to enter the city, which will make the migrant workers in the city have higher living costs, which will limit the flow of rural residents to the city and slow down the urbanization process. The rise in real estate prices will have a "wealth effect" on the income of urban and rural residents, which will reverse the transfer of wealth to the high-income group and widen the disparity in wealth between rural and urban regions. High-income groups' overall property income has increased due to rising real estate values, which has encouraged them to participate in the financial sector and enhance their wealth and income. This has also widened the income gap between urban and rural regions. (3) Income disparity affects both urbanization and real estate prices; it will encourage the migration of people from rural areas to urban areas, expand the urban labor force, and encourage urbanization, all of which will contribute to the growth in real estate prices.

5. Conclusion and Policy Recommendation

The interaction between urbanization, real estate prices and income inequality is a multidimensional and complex dynamic process. Here's an in-depth look at the relationship between the three:

(1) The impact of the new urbanization road on the mechanism of real estate price and income gap is explored.

The advancement of the new urbanization path has prompted many rural surplus labor to migrate to cities, which has generated a huge demand for housing, which often leads to a situation where supply exceeds demand in the market. According to the basic principles of microeconomics, when an industry welcomes many customers, the demand curve shifts to the right, which in turn drives prices up. In the real estate market, this surge in demand has led directly to an increase in house prices. As house prices climb, city dwellers with investment properties can increase their income by selling or renting out their properties. In contrast, homeless residents face higher rental costs due to rising home prices, and homebuyers also must bear higher home costs. As a result, a portion of the wealth of low-income groups flows to high-income groups, thus exacerbating income disparities. To sum up, the promotion of the new urbanization path has not only increased real estate prices, but also indirectly widened the income gap.

(2) the impact of real estate prices on urbanization and income inequality

Persistently high real estate prices have become a major barrier for migrant workers to enter the city, increasing the cost of living in the city. This phenomenon restricts the movement of rural residents to cities, thereby slowing down the process of urbanization. In addition, the rise in real estate prices has also produced a "wealth effect", which has caused more wealth to flow to high-income groups, further widening the income gap between urban and rural areas. And there is also a "credit effect", where rising housing prices have greatly increased the property income of high-income groups, driving them to invest in the financial sector, thereby gaining more wealth and income. This reverse transfer of wealth exacerbates the income gap between urban and rural areas

(3) the impact of income inequality on real estate prices and urbanization

To a certain degree, the migration of people from rural to urban regions has also been influenced by wealth inequality. The income level of urban dwellers is comparatively high, and many excess rural workers are drawn to the metropolis in pursuit of better job prospects and greater incomes. The urbanization that has resulted from this population mobility phenomena has boosted the real estate market's prosperity and price increases. As a result, income inequality indirectly encourages the growth of real estate prices in addition to having an impact on urbanization and population movement.

In summary, there is a strong and complex link between urbanization, real estate prices and income disparity. They influence and restrain each other, and together they constitute an important part of economic and social development. Based on the summary of the relationship between the three factors, the following policy suggestions are provided.

Housing supply policy optimization: Due to the large income gap between urban and rural areas and the rise in real estate prices, it is recommended to increase the housing provident fund and affordable housing to alleviate the housing pressure of rural residents and the cost of housing purchase, promote the flow of rural surplus labor to the city, and promote the development of urbanization.

Tax and fiscal policy adjustments: Due to the investment nature of the real estate industry, a large number of middle- and high-income groups are addicted to real estate investment with non-rigid housing demand, It will cause real estate bubbles and higher real estate prices, which will widen the economic disparity between urban and rural areas, and the Chinese government can reduce investment housing purchases by adjusting the property tax. **Housing supply policy optimization:** put forward policy recommendations to increase the supply of affordable housing for low- and middle-income families, such as encouraging the construction of affordable housing or increasing the utilization rate of housing provident fund.

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