

Metropolitanization Choice for China's New-type Urbanization

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ABSTRACT: China has experienced rapid urbanization stimulated by the marketization in the country. Now facing a series of new challenges. In this paper, we use statistic and comparative analysis and put forward that metropolitanization is a necessary stage of urban development; under the circumstances of China's current industrialization, metropolitanization emerges as the primary direction in China's transitioning urbanization. This paper suggests certain measures for boosting metropolitanization and urbanization transition in China.

KEYWORD: Metropolitanization; Urbanization patterns; New-type urbanization

1 INTRODUCTION

Since 1996, China's urbanization started a stage of rapid development, the total urban population was 373 million and the urbanization rate was 30.48%; by 2013, the total urban population reached 731 million and the urbanization rate was 53.73%. According to the Ministry of Housing and Urban & Rural Development, China's urban population will exceed 800 million in 2015, and in the 10 to 20 years thereafter there will be 15 to 18 million people migrating to cities every year.

While impressed by the rapid urbanization in the country, people also find many certain common problems caused by urbanization in China, such as continuously increasing costs, deteriorating environmental conditions, irrational urban spatial layout and delayed planning. There have also been problems in collaborative efforts between different cities, in the efficient planning and construction of infrastructure, as well as problems relating to the coordination of different levels of city governments and the administration of urban fringe areas. Apparently, the traditional planning and administration methods centered in individual cities are no longer suitable for the socioeconomic development of the present day. It is a priority to explore efficient methods to break away from traditional urbanization patterns and realize a transition to an urbanization pattern that is in accordance with the requirements of the new-type urbanization and new-type industrialization.

1.1 *Definition of Metropolitanization*

A metropolitan area refers to a combination of a large population center and adjacent communities that are closely connected with the center through socio-economic activities. It also includes the urban-rural integration areas that are linked to the established area through socio-economic activities, but are not necessarily connected with these areas spatially. It is a process in which the scale of the central urban area and the suburbs keeps expanding with the large city as the center; as a result, the urbanization level of the region continuously advances. The concept of metropolitanization shows unlike traditional urbanization, it is not only the expansion of cities and the intensification of the "urbanized area", but also a regional spatial scheme guided by certain policies. The plan usually stresses the spatial gathering of the socio-economic activities, and places emphasis on fostering the center (or centers) of the regional space, as well as addressing the strategic role of the region in the process of globalization.

1.2 *Metropolitanization as a common phenomenon amid urbanization in developed countries*

In the 1920s, the urban population in the US exceeded rural population. The transportation revolution, a 'ladder' city system, and the inclination toward pleasant urban environments drove the urban population to the suburbs. The residential communities with adequate facilities marks the start of metropolitanization in the US. After 1940, development priority has happened to those

metropolitan areas where the population was larger than one million. During this period of time, the number of metropolitan areas increased to 317, and the population in the metropolitan areas grew to 223 million, making up 80.3% in the total population of the country. The development of metropolitan areas with a population larger than one million was especially rapid, with the total number increasing from 11 to 47, and the population growing from 33.69 million to 161.518 million, occupying 57.5% in the total population.

Metropolitanization also happened in European countries such as Britain, France, and Germany. London and Paris are both regarded as the oldest metropolitan areas in the world. And several metropolitan belts have been formed, such as the one in North-West Europe beginning in Paris and stretching to Ruhr and Cologne, via Brussels and Amsterdam, and the one in the middle of England from Manchester, Liverpool to London.

Metropolitan areas have also been in advanced development in Japan (called 'metropolitan circles' in Japan). There are seven metropolitan circles in Japan, in which the population scale of the central city is larger than one million, such as the "Tokyo circle", "Nagoya circle", and "Kyoto-Osaka-Kobe circle". Moreover, there are also four metropolitan circles, in which the population of the central city is larger than half a million. It is known that over 80% of the GDP of Japan is produced by the metropolitan circles stated above.

2 CHALLENGES TO CHINA'S TRADITIONAL URBANIZATION PATTERNS

2.1 *Difficulty in continuing traditional urbanization due to increased costs*

The cost of traditional urbanization is comparatively high, a situation reflected in the constantly enlarged disparity between the urban and the rural areas. In recent years, the ratio of per capita disposable income of the urban population and that of the rural population is over 3:1. It can be seen that the high speed of urbanization fails to realize a synchronized urban-rural advancement. The second proof of the high cost urbanization is the rapid consumption of resources. The third evidence is the huge economic cost. At this stage of rapid urbanization, when the urbanization level is increased by one per-cent, the cost for the newly increased urban population will be 300 to 350 billion yuan (RMB) every year. There is no doubt that the large-scale "city building" activity in the country not only fails to follow a appropriate sequence, but also drifts away from a healthy course for urbanization, and therefore is unsustainable.

2.2 *A new urbanization pattern with large cities as main feature*

Since the reform and opening-up, especially after 1992, when the policy of "strictly controlling the development of large cities" was gradually weakened (its implementation was not successful in the first place), the development of large cities saw huge gains in both scale and number. The Gross Regional Product (GRP) of cities above the prefecture level (not including those counties under the jurisdiction of cities) increased from 6,429.2 billion yuan (RMB) in 2002 to 13,227.2 billion yuan (RMB) in 2006, marking a 1.1-fold growth rate and an annual 20.4% rate of increase; its proportion in the National GDP climbed from 53.4% in 2002 to 63.2% in 2006; and the number of cities whose GRP exceeds 100 billion yuan (RMB) rose from 12 in 2002 to 30 in 2006, among which 12 cities' GRP is higher than 200 billion yuan (RMB).

2.3 *City administration problems caused by "spatial mismatch"*

Due to suburbanization-the constantly expanding industrial and residential areas and the migration of the rural population from the rural to urban areas-there will be changes to both the traditional relationship between different cities and that between the central urban area and the suburbs. The economic development pattern based on the unit of administrative areas can't meet the demand for optimized resource allocation. For example, in many large cities, there are usually certain grey areas outside the established area. In these areas, the economic activities are quite active, but the social security, sanitation, and sustainable development administration is lacking. Besides, with increasing urban influence in the countryside, the contradiction between decreasing farmland in the suburbs and the need for job opportunities in the cities also needs to be addressed. The resolution for all of the problems stated above requires a larger spatial scale.

3 CHINA'S TRANSITIONING URBANIZATION PATTERN UNDER METROPOLITANIZATION AND NEW INDUSTRIALIZATION

3.1 *Formation and development of metropolitanization in China*

Related studies and practical conditions have shown that the rapid development of metropolises and city clusters is the most outstanding feature of the new pattern of regional development in China at present. Besides the three metropolitan regions centered around Hong Kong, Beijing, and Shanghai, the other metropolitan areas-centered at Eastern Liaoning Peninsula, Shandong Peninsula, Southwest Chengdu

and Chongqing, Xiamen-Zhangzhou-Quanzhou in Fujian Province, and Wuhan—are becoming new growth poles that boost economic development in China. And the studies of scholars declare that in the near future several metropolitan areas of different scales will be formed in China.

There are two things we can learn from the studies and from conditions on the ground: on the one hand, in order to realize the optimization, allocation of resources, different cities that are close to each other geographically should be connected through economic activities and share resources and information. On the other hand, the urban spatial structure of China has broken through the limitation of the administrative division, and a transprovincial regional urban spatial layout has gradually formed, which indicates the rapid formation and development of metropolitan areas in China.

3.2 Existing fundamental conditions for metropolitanization

From the view of logical relationships, industrialization can be seen as the content and urbanization as the spatial form for industrialization. Form and content cannot be isolated from each other; the content determines the form and the form must suit the content. The new industrialization that contains both informationization and industrialization not only brings along opportunities for China's urbanization, but also puts forward new requirements for the urbanization pattern; that is, the construction tasks for traditional industrialization should be finished as soon as possible and a transition under the conditions of informationization (from traditional urbanization to metropolitanization) should be accelerated. Since the development of metropolitanization (the higher development phase of urbanization) is closely related to marketization, industrialization, and informationization, the further development of marketization and industrialization—especially the industrialization driven by informationization—provides a critical impetus for the formation and development of metropolitanization.

A metropolitan area is an urban area formed by the central city and its peripheral areas. Its formation and development are directly influenced by the interaction of urban and the rural areas, i.e., Suburbanization indicates an improving productivity level and increased quality of living, as people tend to improve their housing conditions and move to the suburbs. Influenced by urban transportation system construction and various administrative policies, suburbanization of China is characterized by passiveness, weak foundations, and bidirectional and high speed growth. In certain large cities in the developed areas of China the construction of new residential areas leads to the rapid expansion of the

metropolitan area. The development of industrial development zones and new towns makes the suburbs of large cities where the concentration and expansion power in urban development coalesce. The mixture of the urban and the rural development stimulates the economic growth of the area, and the mutual limits and connection between the urban and rural areas powerfully boost the metropolitanization in the region.

Supported by rapid new industrialization and especially the development of information technology, the “Space of Places” in the metropolitan areas is gradually replaced by the “Space of Flows”. At the same time, the “flows” (labor force, materials, funds, and information) are further expanded through infrastructure such as transportation and communication facilities. Complete infrastructure can help in maximizing the connections between urban and rural areas, and therefore boost metropolitanization. In recent years, China has seen remarkable progress in infrastructure construction. It provides a sound material basis for the metropolitanization of China.

3.3 Metropolitanization as an effective way to ameliorate existing conflicts and problems amid urbanization

Metropolitanization will reduce the cost of urbanization because it can expand the flow of production elements inside the metropolitan area and promote the allocation efficiency. The connection and integration of urban and rural areas in the metropolitan areas creates conditions for the optimized allocation of resources in a larger space, and therefore reduces the impediments for the flow of production elements; a directional and orderly exchange is formed which effectively promotes the speed and the allocation efficiency of the production elements. As a result, the coordinated development between urban and rural areas will be realized.

Secondly, metropolitanization can effectively save resources. In metropolitan area, the utilization of resources like land and energy resources can be integrated and coordinated between the central cities and the surrounding cities or cities and the countryside via communication and transportation networks. Consequently, the spatial distribution of economic activities in the metropolitan areas will be more rationalized. It can not only bring a scaled effect into full play, but also ameliorate problems like traffic congestion and environmental pollution in large cities, and thereby integrate the economic, social, and environment benefits of the urbanization.

Thirdly, metropolitanization will stimulate the economic development of the metropolitan area and create more job opportunities. It will boost the development of an outwardly focused economy and the establishment of a rational industrial and

employment structure. In addition, by expanding the space for external socio-economic activities and enriching urban connection levels, the metropolis has increased economic vitality. In the meantime, the surrounding medium and small cities and small towns will be developed rapidly by taking on particular urban functions. And by creating more job opportunities, these cities and towns will help alleviate the employment problems caused by “spatial mismatch”.

Due to certain problems in the current system of administration division, the institutional power of the government is overly concentrated. One of the most important functions of China’s city government is to supervise economic activities. Given its particular political and economic background, the city administration system of China is rational to a certain extent; but with the rapid development of the metropolitan area, the spatial structure of cities started to change dramatically, and the contradiction between the current administrative and institutional systems and urban development is more and more prominent. In exploring the formation of the metropolitan area, the coordinated development of the society and the economy, and the effective application of policies and regulations in the area, it is evident that there are urgent institutional issues that need to be addressed. It is reasonable to believe that metropolitanization will boost the reform of China’s city administration system.

3.4 *Accelerating new industrialization and promoting “smart growth” in metropolitan areas*

As the spatial host of social-economic and industrial factors in modern times, the development of cities is boosted by the emergence of new industries and the elimination of declining industries. Efforts should be put into promoting industrialization through informationization, and promoting the optimization of industry so as to lay down a sound foundation for the development of metropolitan areas and make the central cities real “geographically concentrated industrial poles”. In order to avoid polluting the surrounding environment, which often happens in traditional industrialization, metropolitanization should adopt a “smart growth” development pattern, building up compact cities, developing green industry, constructing green buildings, and creating green spaces; in so doing, they will realize the harmonious unification of “human–metropolitan area–nature”.

3.5 *Enhancing planning and integrated construction in metropolitan areas*

In recent years, in view of the rapid development of metropolitan areas, many large cities carry out

related planning, such as in the metropolitan area of Nanjing-Suzhou-Wuxi-Changzhou-Xuzhou in Jiangsu Province. China ought to establish related institutions and organizations to start special surveys (many conceptual plans and metropolitan coordinating region planning can be used as references), in order to set up a metropolitan area planning system for China and guarantee the system under the City Planning Law. Before the enforcement of national policies, local governments can first put together related planning. Their emphasis should be on the coordination of the spaces around large cities, as well as planning for market integration, industrial integration, urbanization integration, infrastructure construction integration, and joint environmental resources development and protection.

3.6 *Enhancing construction of institutional innovation systems for metropolitanization*

Since China is in the middle of a rapid transition in its economic system, the establishment of an innovation system will help in creating a beneficial environment for development and eliminating the institutional hindrances for metropolitanization. From the perspective of methodology, due attention should be paid to the following three areas: firstly, the relationship between the metropolitan area and the existing institutional system of China should be clarified, so as to realize the real “city-governing-county” system. Secondly, the macro-level control of the government should be strengthened, the financing channels for chartered rights operation and BOT should be promoted, so as to boost the marketization of the construction fund for metropolitan areas and stimulate the development of these areas. Thirdly, special administration departments for metropolitan areas and the related cooperation administration mechanism should be set up, which will be in charge of organizing and implementing the planning of the metropolitan areas, coordinating the construction of regional infrastructure, overseeing environment protection and land development, as well as other issues. In so doing, the development of the metropolitanization will be not only strategic but also comprehensive and coordinated.

ACKNOWLEDGMENT

This research has funded by the General programmes from National Science Foundation of China (No.41271135), we have been helped by editors From *Urban Problems* in translation, they are Qian Fang and Liu Jiayan, the authors would express gratitude to them all.

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