ID 1439 | SHAPING THE CITY OF TOMORROW IN EAST ASIA: CONCEPTS, SCHEMES AND IDEAS FOR URBAN DEVELOPMENT FROM 1960S TO 2010, AND BEYOND

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1 INTRODUCTION

There is a growing interest about the urban visions and architectural ideas and vocabulary behind the formation of the large urban conglomeration in Japan, South Korea and China, and how the seeds of Western planning theories and architectural design practice have helped shaping and building the contemporary cites along the vast regions of Asia Pacific Region, and frame a local language in envisioning the city of the future.

Fuelled by an unprecedented economic boom in the recent decades, China has carefully planned a process of urbanization at a gigantic scale, supported by political will and determination in promoting a radical transformation of the economic system by shifting progressively from industry to services, and promoting the city as a fundamental element for this transition. South Korea and Japan are the models for this sort of urban transformation, both for the overall dynamics and the design and planning methods implemented, as South Korea experienced her fast urbanization process in the late 1980s whilst Japan has witnessed a great urban growth during the 1960s. Somewhat "old" concepts and ideas imported from the Western planning traditions, such as the design of new towns, neighborhood units, gated communities, green belts and garden cities, high-rise living etc. are still essential practical elements implemented for the planning and design of the modern/contemporary urban landscape, and are largely adopted in the planning processes used in the structuring and organization of the cities and suburbs built in the region. New progressive concerns related to environmental, social and technological issues such as the Climate Change, growing pollution, the need for sustainable planning and more energy efficient, smart and eco-friendly devices for transportation and domestic use, the constant ageing of the population, among others, call now for very new ideas and bold and innovative schemes in the design and development of cites in East Asia, as well as around the world.

Reflecting on the contributions from East Asia to the discourse of planning and design a city for the future as promoted by single actors, larger cultural movements and national elites fostering economic ambitions and political agendas of autocratic forces (e.g. from the experimental cities by the Metabolists in Japan, to the more "pragmatic" urban development projects fostered by local and national governments in South Korea and China), it can be worthy trying to explain some of the key socio-economic factors and planning engines which have dramatically and radically transformed the skylines of the most dynamic and growing influential area of the world at the dawn of 21st century, as well as briefly describe the origins of the various forms and elements of the modern built environments which have been shaped and molded by these same forces, and how/whether these urban forms embody a true genuine East Asian vision of the city of the future, and what is the current trend in terms of new urban forms and architectural design research at the beginning of 21st century.

1.1 BACKGROUND OF THE URBANIZATION IN EAST ASIA IN THE LATE 20TH CENTURY

Built on the lessons of other developed and developing nations which have adopted mass apartment buildings as strategy to foster modernization (Urban, 2012), a real estate revolution, driven by a powerful government-sponsored construction industry and the use of new technologies available, has been the engine which has led the processes of radical industrialization and frantic modernization from the second half of 20th century in Japan, and then in South Korea and China; this factor has consequently prompted a huge restructuring of the pre-existent urban fabrics and the progressive reshaping of city form, inner structure and urban landscapes. People mobility, infrastructure development, industrial modernization, growth of consumerism and of the service sectors, social restructuring have led an unprecedented

urbanization in this part of the world both in scale and rapidity, with very relevant implication in geo-political and economic terms.

Growing mega cities must accommodate a new class of urbanites and more immigrants from rural areas, with housing shortage being one of the foremost important issues. House as shelter and especially as status symbol characterizes the aspiration of the middle class generated by the economic success of Japan, China and South Korea, which follow a path set by other developed and developing nations, most notably the US, which adopted large scale planned communities and mass apartment buildings as strategy to foster modernization and create cohesive communities (Ellin, 1996; Urban, 2012). The Japanese live, work and move in the super-conurbation called Megalopolis of Tokaido, integrating infrastructures, productive zones and an intricate extension of residential urban fabric well represented by Tokyo skyline, which has developed in a sort of mainly horizontal and decentralized multi-polar urban entity (Kornhauser, 1976; Hirai, 1996; Sorensen, 2002); South Koreans live in a sort of "Republic of Apartments" whose main "smart" and "radiant" hyper-connected cities are composed by clusters of uniform and repetitive high-rise, dense residential compounds filled with shops, schools, services, landscaped areas and infrastructures inspired by Western planning strategies (Gelezeau, 2003; Lee, Choi, Jeong, Soon, 2015); likewise in the last decades, to fuel its urbanization and shift towards a market economy in a more globalized world, the Chinese government, to consolidate its political agenda has orchestrated the development of many modern new towns and futuristic eco-cities, reshaping the urban forms of many cities through the creation of vast extensions of new residential, commercial and business districts in the suburban areas around the major cities in order to promote both a modern urban development and lifestyle, and further support a larger industrial output and economic growth to foster their profile as true global cities on the international scene (Rowe and Kuan, 2002; Friedmann, 2005; Lu, 2006; Wu, 2007; Gregotti, 2009).

2 JAPAN: URBAN METABOLISMS OF A MEGALOPOLIS

Contemporary urban Japan was born from the ashes of the cities destoried during the WWII. The economy didnt recove till early 1950s, in coincidence with the start of Korean War and in the climate of the Cold War, and by the beginning of the next decade a new vision for the country, both modern and prosperous, unified the efforts and solidarity of the Japanese population and the central government. By the early 1960s all the strategic economic plans promoted by the government to recover from the war were completely fulfilled, and Japan joined the group of the most dynamic and advanced industrial power among the developed countries. The rapid economic growth brought the development of a modern system of urban infrastructures, a general improvement of the living standards, a unprecedented increase in the national wealth and fuelled investments to pursue a comprehensive technological progress. The economic success of the period however also caused new serious urban problems which posed a severe threat to the social life in the Japanese metropolises, which tried to keep the balance between the needs for a modern life with the persistence of the tradition (Woswo, 2002). Frequent cases of environmental contamination caused by high the levels of pollution (Ita-ita; Minimata, Yokkaichi) were reported, as direct consequence of planning flaws which for instance allowed for the co-presence of an high concentration of factories and industrial plants in urban residential areas alongside an high population density in the big industrial cities. The reason behind this was the need sustain an accelerated urbanization during the years of rapid economic growth which asked to privilge the industrialization and the economic development, which meant it was fine to set the industrial complexes in close proximity to each other and to the workers' residential areas (kombinatos). In the early 1960s the rampant urban immigration and uncontrolled urban sprawl led to the formation of the so-called Tokaido Megalopolis, but also resulted in serious problems related with these phonomena, which became source of serious concern for the Japanese government.

Metabolism as architectural and urban avant-garde movement was a product of the post-war economic growth condition of Japan in the 1950s. In the context of the country's economic regeneration and cultural innovation, Japan pursued a further stage of modernization through urban development, which fostered the construction of huge and extensive systems of infrastructures in the cities as urban and interurban networks of movement, communication and energy supply integrated with public spaces, industrial and residential zones, to support the fast urban growth. The Metabolist city, inspired my the myth of Futurism' New City and the fascination for Le Corbusier's Radiant City, intended to overcome the fixity and the mechanical structure of the Modernist City, whose theorethical fundamentals were in a state of crisis following the social and functional failure of many of the modernist urban renewal projects and schemes actually built in the postwar years. Many of the projects by the Metabolists presented high rinse mega-

structures made of support clusters of prefabricated apartment capsules, which could be modified and replaced according to their life cycles and the social demands and fashion. Rejecting the Modernist methodology based on the principles of Athens's Charter which focused on the use of a fixed master plan and zoning, Metabolists tried to control and plan the city through the tools available from industrial design methodology instead of the architectural principles. Indeed the idea of metabolic cycles of the Metabolist architectures, such as Arata Isozaki's plan for clusters in the air, derives from the vision of the world of technology and the functionality and flexibility of the assembly line of the industrial production system (Pernice, 2006; Koolhaas and Obrist, 2011).

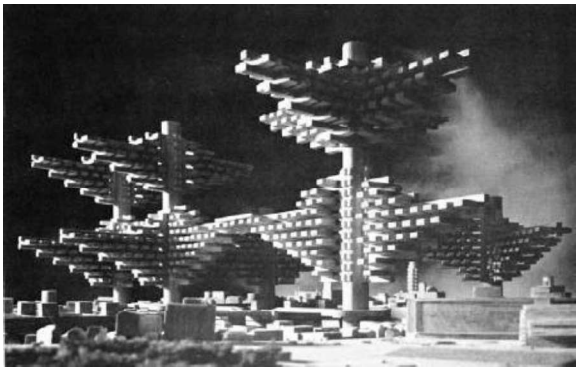

Figure 1 - City in the Sky 1962 (Isozaki.co.jp)

The idea of mega-scale and of a total controlled urban system conceived on the acceptance of a hyper-dense and highly technological built environment, in order to control urban sprawl and give visual coherence and order to the process of city growth, as proposed by Metabolistsand other visionar Japanese architects and planners was counterbalanced by a more pragmatic approach towards a regional and urban development, which found in the UK lesson of new towns development and the new research for mass housing provision the main response of the local and national authorities.

The first modern new town built in Japan was Senri in 1958, which was followed by 15 new towns developed after a new law for the development of new residential areas was passed in 1963. Tama new town, the biggest of these cities designed as a satellite town of the main conurbation on the outskirt of Tokyo, was built thanks to both private and national capitals and its scheme based on a system of neighborhoods, and approach further refined in the following decades focused on the promotion of various new technopolises.

Figure 2 - Tokyo townscape (the author)

The cities which constitute the Tokaido Megalopolis, a super urban conurbation stretching from Tokyo to Fukuoka, offer a vivid example of what has been termed "railway urbanism", a form of urban growth where a regional area is organized as a sysyem of cities structured as a hierarchical network of mass transport pathways (expressways, metro, railway lines), which intersect in sub-node-points always connected to major nodes of services and movement (major railways and subway stations) and which are central functional and visual points of large residential urban areas. Indeed the transportation infrastructure and especially the railways development have had a strong impact on the formation and development of the modern Japanese urban environment (Kornhauser, 1976), which present the main central urban areas of the cities, especially Tokyo, as the core of the national socio-economic system. Here new multi-level and multi-functional urban spaces were created in new districts of the cities especially since the 1980s, which

contributed in creating a complex urban townscape in which huge patches of extensive residential fabrics merged with newer residential developments in the form of clusters of towers integrated with cultural facilities, offices, retails and restaurant to form a multipolar urban structure in the city in order to organize key reference central nodes and balance the growing suburban sprawl (Sorensen, 2002).

Indeed the process of urban growth in Japan in the last decades has been driven by an unparalleled expansion and integration of the transportation development in the structuring of the city, well expressed by the case of Tokyo. As capital and most important cultural, political and economic center of the nation, Tokyo is a model of megacity whose urban landscape extends at regional scale, which needs an efficient, capillary and very extensive transportation network for the daily activities of the residents, who typically commute long hours from suburban residential districts to central working areas. The city is a clear example of what has been termed "railway urbanism", a process of urban organization which disregard cars as main means of movement and, heralding the modern T.O.D. design approach and planning methodology, conceiving the city as a hierarchical network of mass transport pathways (expressways, metro, railway lines) which intersect in sub-node-points always connected to major nodes of services and movement (major railways and subway stations). The easy access of commuters and the special linkages between private railways/metro companies and commercial and market groups has created an urban landscape where the location of the main chains of department stores and shopping malls is essentially close or literally built around huge decks/plazas in front or above subway and railway stations or interchange stations, which are truly fundamental urban nodes and fundamental interchange link points of larger residential and mixed-used districts. The necessity to rely entirely on the efficiency of mass transport system in terms of movement and services has inevitable consequences on the development of a very peculiar urban landscape and lifestyle in a high-density city like Tokyo and other Japanese cities, whose dwellers are more and more compared to "urban nomads" living their existence commuting between vast artificial habitats of fragmented realities, often on the urban rural fringes (Desakota) of the large metropolises.

The challenges of constant natural disasters and the constraints of the limited space available in the city due to the rising costs of land and services, have both been functional in an approach to technology as a necessary tool to improve and make safer the daily life in the large metropolises, and in the appreciation for a living in low rise dwelling. Therefore the Japanese city, retaing from the past just the finer urban grain of historical residential areas and the apparent irregular layout of the streets and conplexity of the townscape, is mostly defined as a complex mosaic of fragmented landscapes composed of scattered high-rise and high densities mixed used blocks, and vast districts of detached houses or row house residential enclaves.

What is peculiar to Japan is the limited number of large apartment blocks in the city. In contemporary Japan most people still preferred to live in ordinary low-rise single family houses, a trend quite interestingly different from the rest of East Asian countries. Indeed by the late 1990s, and after the 1980s economic downturn, it was not the apartment block but the (suburban) single family detached house with private garden and parking plot was the favorite urban residential typology as indicated in a survey of 70% of the Japanese, a trend further consolidated by the progressive transformation of Japan, like many other developed nation, in a ageing society (Hirai, 1998; Inabe and Nakayama, 2000). Less population, the need for more daily-care and a certain natural predisposition for acceptance and interest among the Japanese in new robotic technologies, spell clearly of a future of highly technological advanced "shrinking cities" in this part of Asia.

3 SOUTH KOREA: COMPACT APARTMENTS FOR SMART CITIES

The rapid modernization of the Republic of Korea become a priority for the Korean government in the second half of 20th century, following the end of four long decades of Japanese colonial rule in 1945 and the end of subsequent Korean War (1950-53), which split the country in two blocks. The priority was to promote a comprehensive modernization of many aspects of the traditional Korean society, from economy to industry and life-style, on the model of what Japan did at the end of 19th century. The development and construction of large housing complexes received a particular attention as this related directly with the necessities of larger redevelopment projects in the cities which could be planned, organized and integrated with new urban infrastructures and in general related to the broad process of industrialization, economic growth and eventually modernization of the country. Since the late 1980s and early 1990s the design of

new and larger (complex) high-rise apartment blocks was especially encouraged, and the Korean apartment block (Apatu Tanji) became also extremely important for the development of a strong and influential construction industry, and being functional to the formation of a growing middle class, especially in order to sustain the economic growth of Korea, turning the country in what many foreign observers define a “Republic of Apartments” (Gelezeau, 2003).

The evident and sometimes annoying repetitiveness in the design of the identical facades and exteriors of the Korean apartment blocks, and the standardization of the interior layouts of the apartments, presenting the same basic spatial organization/features in several parts of the big cities and regions throughout the country, is balanced by the soundness of the structural technology implemented for high-rise buildings and by the high standards in terms of comfort and management, with organizational schemes of the residential towers which show several fundamental elements derived mostly from the British and the US planning traditions (Lee, Choi et al., 2015).

Figure 3 - Apartments complex in Daegu (the author)

Where South Korea have shown an original contribition and a pioneering spirit in promoting new forms of urban planning and design is in the pormotion of Smart Cities. Koreans distinctive approach for this city model has been largely support by the capitals and know-how of large industrial conglomerates (chaobol) of interntional renown brands, mostly active in IT, such as Samsung, LG and Hundai. As the one of the most connected country in the world and a powerhouse in the production of semiconductors and investments in IT research, South Korea has embraced the ideas of Smart Cities and Smart Dwellings design with an enthusiasm which has few equivalent elsewhere. The most clear exemple of the infatuation for this idea of city is the city of New Songdo built from scrath near the port town of Incheon, East of Seoul. Songdo was built from 2005 on reclaimed land from the Yellow Sea as an industrial park and then a special economic zone in order to attract foreign direct investments of multinationals and international corporations, with low taxes and less regulation, in open competition with similar zones in East Asia. High tech industries and the government sponsored most of the works, with the idea of creating a fully networked and automated city, whose omnipresent sensors, diffuse cctv cameras, digital technologies and wireless connections assure a constant monitoring and instantly interaction between users and services (Townsend, 2013). In spite the loud slogans and the artificial appeal of the original project, this typical smart city planned for smart people presents a un-impressiver plan for mobility organized on grid of roads, with clear zoning and vast park-like green spaces separating various discticts. The typology chosen for the residential buildings is the apartment tower, which add the sense of vertical growth of the city, in stark contrast with the surrounding natural landscape which is essentially flat and with very few hills.

Figure 4 - New Songdo (sogdoidb.com)

Bundang new town is a good exemple of a series of new towns developments undertaken by the Korean government to consolidate the large area of Kyonggi-do, the regions which surrounds Seoul and is the economic, political and industrial core of the nation. (Shane, 2011) Together with a few more planned and developed new towns, Bundang was built as a large size satellite city set in the ring of land around the capital, which is a green and mostly restricted area where new housing could not be built, a zone clearly insired by the scheme of English green belt, which was established in the UK with the 1947 Town and Country Planning Act and initially was proposed by Patrick Abercrombie’s Greater London Plan in 1944.

Inspired by the need to promote a modern blueprint in terms of city of the future, and developed by combining Western planning methods (mostly from the Anglo-Saxon lesson in regional planning), Japanese emphasis on transportation development and Singapore and Hong Kong well known approach to urban vertical growth centered along the main mobility hubs (subways, metro stations), South Korean planners and urban designers rush to implement the most updated know-how into the delivery of large and hybrid urban schemes of high density and strictly organized new towns, of which Bundang , designed and built by Korea Land Corporation in 1989-1996 is an exemplary model. The city was designated to host 1 million people and is organized as a linear settlement gathering a collection of neighborhood units as high rise residential and office towers enclaves, mostly gated, organized as a chessboard of superblocks. Most multistory and dense commercial zones are organized around the main streets axes, with the city presenting an elongated development along the main river and the metro line to Seoul, and with the major street network running N-S, an axial scheme which is surrounded by several different green areas constituting a system of urban parks for local residents. Here is very evident the idea of (re)creating the townscape as image of the city in a park, or a vertical city in the garden, a clear homage to Le Corbusier' Radiant City conceived in the late 1920s.

More recently South Korean government has embraced the idea to move the national capital from Seoul to a new site in the center of the nation, and the urban model chosen for the planning and design of the new capital is the Eco-green city. Since 2007 Sejong city has been developed as a multi-functional administrative capital city as an attempt to decentralize and decongestion activities and people from crowded Seoul. The program proposed by received a major setback though the plan to relocate most of the ministries and governmental offices is still on-going. Among other reason for the construction of Sejong city, which is still largely unexecuted, is the scope to create an urban pole able to promote a more balanced regional development of the country, as this new city is located in central area between Seoul and Daegu-Pusan metropolitan area, the second larger conurbation of South Korea. Like for many similar scheme of eco-cities, the key element of the project if the design of many energy efficient and futuristic shaped buildings integrated in a larger system of circulation avenues; the masterplan has been arranged with a loop-shaped lay-out and the city in the blueprints and renderings shows a somehwat conventional urban image made of towers insert in a series of layers of grids of low-rise eco-buildings featuring organic shapes and green roofs, long vistas of green parks and a fast mobility on broader road arteries, a sort of hybrid combination of Chandigarh and Milton Keynes.

4 CHINA: VERTICAL URBANISM OF GATED COMMUNITIES

Since the start of the policy of "Open Doors" in 1978, China has witnessed the largest urbanization process of history, with more than 300 million people moved from rural regions to urbanized areas, compressing in much shorter time what western countries and other Asian developed nations, especially Japan and South Korea had achieved over longer periods. This process of sustained urbanization in China during the last 3 decades is also the direct consequence of a radical shift in the economic structure and the massive phenomenon of immigration from the rural areas of the country piloted by the central government, which constatly operates in order to assure a progressive process of modernization and assure a more relevant geo-political role of the nation in the world economy (Rowe and Kuan, 2002; Friedmann 2005; Wu, 2007). Large numbers of works have moved from the West and central areas of the country towards the coastal cities, richer in services and infrastructures, real engines of the socio-economic life of China, and cultural cores of resurgent Chinese ambitions. The need to implement a specific plan to control the growth of the economy and the expansion of the main cities has fostered the development of planned cites and new towns in their suburban areas, though what effectively controls and influence the planning approach of the Chinese cities is the fact that the land is still property of the govenrment and is "sold in leasing" for 70 years to private developers and individuals, and the system of Hukou, the household registration system, which in practice discriminate between the legal local residents and the external workers, to whom many urban services are precluded.

Among the most representative urban projects which have inundated China in the recent years and well represent the rush to modernize cities and view of the urban future for most Chinese are for instance the construction of SIP Industrial Park in Suzhou, a series of new prototypes of green and eco-cities, as well as bold program for new towns development around Shanghai Metropolis, the most global of the Chinese cities.

Figure 5 - Gated community in Suzhou (the author)

Shanghai municipality promoted the design of a series of model new towns called “1 City, 9 Towns Plan”, a system of satellite cities on the outskirts of the larger metropolis to be completed by 2010, whose design was based on different foreign styles and city planning traditions, in order to both create new growth poles and decentralize people from the congested center and to foster external investments and marketing the city and her position in the global economy (Den Hartog, 2010). Among these new towns set on the fringe of Shanghai, the most relevant are Anting (German Town), Pujian (Italian Town), Thames Town (English Town) and Gaoqiao (Dutch Town). In the case of Thames Town and Gaoqiao Dutch Town architects and planners designed these new towns as places for public consumption and for marketing the new urban revolution of China. The new towns projects in Shanghai like elsewhere, were proposed as the optimal solution to what are considered a series of fundamentals issues in the context of current urban planning approach in China: foster city branding in order to promote the image of a modern and prosperous country and attract foreign investments; introduce and diffuse a more international and modern (Western) urban life-style, rich in amenities as well as in urban services to promote social activities and thereby consumption of an expanding middle class, which ask for a luxury design and attractive, confortable and visual appealing urban scenes.

In the effort to support further urbanization and escape from the chocking air of heavily polluted industrial cities, China has funded the construction of new susburban districts and eco-cities and green towns, oftern resulting in desolated built areas of ghost towns. Eco-city Tiajing, a model of sustainable city ispired by the T.O.D. system and the integration of carefully planned and well landscaped and organized urban disctricts inspired by Singapore model of urbanization, and the plan for a new high density and vertical Forest City, a linear system of high rise blocks containing hanging gardens of trees and plants conceived by Stefano Boeri for Shijiazhuang, well represent the trend of adopting external green-sustainable planning concepts as well as the consultancy of foreign professionals hired to propose innovative design and technical solutions.

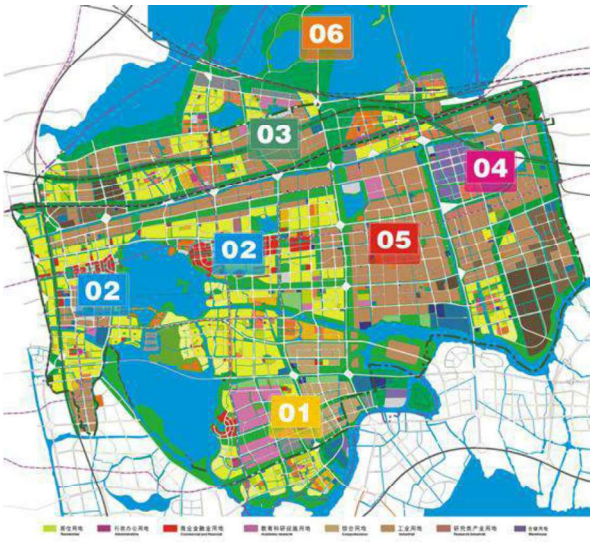

Figure 6 - Suzhou SIP Masterplan (Suzhou Planning Bureau)

The district of Suzhou Singapore Industrial Park (SSIP, now named simply SIP-Suzhou), set up in Suzhou, Jiangsu Province in 1994 as a joint venture between Suzhou Metropolitan government and Singapore government, was proposed as a prototype of a modern industrial park conceived on the most advanced

planning strategies and up-to-date urban design concepts, becoming a true model for other Chinese cities, in order to provide Suzhou with first class industrial infrastructures, clusters of heavily landscaped self-secluded residential complexes (mostly gated communities inspired by the concepts of Clearance Perry's Neighbourhood Unit) and high-standard services, while promoting and "branding" the image of the city at a domestic and international level. The entire park is a huge grid of roads and public parks constellated by foreign high-tech companies, industrial facilities integrated in a system of public services, research institutes, residential zones and green university campuses, inspired by a car-oriented urban development. As part of a good sample of planning experience, Singapore community planning patterns, the organization and design of neighbourhood centers, and public housing design methods were also introduced into SIP via regular visits by local management training teams to Singapore. Especially the model of Singaporean neighbourhood center, as a pivotal core of the local district social life and planned as a system of mixed used spaces filled with essential services to support a small population and with a very easy linkage to public transportation routes and metro stations, and the model of gated communities designed as dense blocks of high rise residential towers enbedded in well mantained semi-public gardens and green spots, and integrated with communal spaces and collective facilities (a model also extremely popular in Hong Kong), have proved to be of particular interest and successfully implemented in the context of the fast growing Chinese urbanization, more and more inundated with copycat architectures and public space design projects mimicking Western or other exotic styles.

It appears that in contemporary China the urban morphology of the cities is more and more defined by the organization of newly built large urban blocks as secluded enclaves and gated communities of high rise towers (dis)-connected by broad avenues and streets, given that for several decades the only form of urbanization for Chinese cities was trough the development of socialist working units (danwei) which combined factories, residences and other services, based on former Russian self-contained residential superblocks models (microdistricts or microrayon), which were transplanted to China since the early 1950s (Lu, 2006), and largely inspired by precedent 1920s concepts such as the German' Siedlungen and Vienna's Hofe, as well as the American concepts of Neighborhood Unit and Clarence Stain's Radburn's model of urban block (1929).

5 CONCLUSIONS

Among the several models proposed in the recent past to structure the growth of the city, 3 are for sure the most influential in the 20th century, namely the schemes prosed by Ebenezer Howard (dispersion), Le Corbusier (concentration) and Frank Lloyd Wright (extension)(Choay, 1965; Fishmann, 1977). Of these it seems is Le Corbusier' image for a city of towers in the park organized around a clear separation of mobility routes, with a preference for car transportation, that most than others has completely (re)shaped the current city development in East Asia, focussed on the needs of economic growth to foster a rapid transformation.

The models of urbanization and modernization of China and South Korea since the late 20th century show these countries followed a very clear pattern which was first evident in the case of Japan. Similar is for instance the prominence granted by the central governments which were driven by a strong ideological component based on the notion of importing models and schemes from more developed countries essentially from the West in order to promote and accellerate the modernization of the society and the culture, with inevitable consequences on the transformation of the pre-existent urban environment. The traditional elements of the natural landscape, and of the local urban milieu and the surviving relics of the old cities are, especially at the beginning of the urbanization, mostly removed or drastically replaced by the new urban and suburban developments.

Some peculiar cultural differences are evident in the form of urban life-style and the view of the city and urban landscape among Chinese, Koreans and Japanese. The process of fast urbanization in China during the last decades has disclosed several problems and contradictions which are typical of a country and a society that strives to modernize its economy, urban environment and cultural features rapidly: mobility and car-oriented urban development versus the preservation of the fragile pattern of the traditional city; industrial development versus the need to protect the eco-systems and natural environments; the social harmony endangered by the extremisms put forward by a rampant capitalistic model of economic growth, are among the most impellent issues to the fixed. Korea and Japan.

High densities, congestion, verticality, emphasis on circulation mainly intended as car mobility, and distance from the aesthetic and urban local traditions for sake of the myth of the Western culture which brought a rapid pseudo economic progress, are the key notes of current urbanization in East Asia, and still these appear to drive the view of the city in the near future, though new issues such as ageing society, crisis of wild globalization, ecological problems related to the unstoppable deterioration of natural environment and the inevitable transformation of the current economic model for the years to come may progressively dictate a new urban agenda and new concrete and truly innovative solutions in East Asia and all over the world.

BIBLIOGRAPHIC REFERENCES

Gregotti, Vittorio. (2009), L'Ultimo Hutong, Skira, Milano.

Rowe, G. Peter and Kuan, S. (2002), Architectural Encounters with Essence and Form in Modern China, MIT Press, Cambridge.

Urban, Florian. (2012) Tower and Slab. Histories of Global Mass Housing, Routledge, London & New York.

Ellin, Nan. (1996), Post-modern Urbanism, Blackwell Publishers, Cambridge & Oxford.

Lu, Duanfang. (2006), Remaking Chinese Urban Form. Modernity, Scarcity and Space, 1949-2005 Routledge, London & New York.

Wu, Fulong. (2007) China's Emerging Cities: The Making of New Urbanism, Routledge, London & New York.

Friedman, John. (2005) China's Urban Transition, The University of Minnesota Press, Minneapolis.

Gelezeau, Velerie. (2003) Seoul, Ville Geante, Cites Radieuses, CNRS, Paris.

Ha, Seong-Kyu. (1999) Urban Growth and Housing Development: A Critical Overview, Korea Journal, 39(3), 63-95.

Koolhaas, Rem and Obrist, Hans U. (2011), Project Japan. Metabolism Talks. Taschen, Cologne.

ID 1476 | RESEARCH ON THE RELATIONSHIP BETWEEN SPACE OF PLACES AND SPACE OF FLOWS - EMPIRICAL ANALYSIS BASED ON GLOBAL SCALE AND LOCAL SCALE

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1 INTRODUCTION

In the process of reform and opening to the outside world and economic globalization, China has taken the initiative to integrate into the world economic system and has become the world's second largest economy. At the same time, the establishment of information and communication networks has greatly accelerated the process of global integration, and promoted the flow of information, knowledge and capital flows among cities all over the world. " Space of flow is constantly manifesting and becoming an important force to promote the world economic structure and the evolution of the urban system. From the original growth pole model to the central hierarchy, and now to the urban network, the development and evolution of the urban system has entered a new era. Since 2000, the research of urban network abroad can be divided into two major directions: enterprise organization and infrastructure. Among them, the former research is more mainstream, this is because the essence of urban network is the economic relationship between cities, and enterprise actors is the starting point of economic relations. In recent years, Chinese scholars have also conducted a series of urban network research based on the space of flow (Tang Zilai, Zhao Miao Xi, 2010; Zhu, Wang de chazon, 2014), and achieved certain results.