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City, Tradition and Contemporary China

From Wang Shu's Works to Review his Critical Practice with the City

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Abstract

From small-scale design of Venice Biennale Tiles Garden exhibition to large scale works such as Ningbo History Museum and Xiangshan Campus, Wang Shu responds to the astonishing pace and scale of urbanization and offers his perspective to remake the city in a more socially-related and sustainable way by using cultural resources, respecting traditional heritage and addressing local conditions, in opposition to the overwhelming commodification and commercialization of cities in China. Through his works, Wang Shu demonstrates his urban intervention and critical practice with the city, providing a vision of an alternative way to develop the city.

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1. Introduction

Wang Shu (b. 1963) is a prominent Chinese architect attracting international attention. Receiving Schelling Architecture Prize in November 2010, he is considered as “the most humanistic and literary architect”¹ in contemporary China. Referring to the rich legacy of Chinese tradition, he advocates the use of local resources, continuity of craftsmanship and dialogue between architecture and surrounding landscape. The name of Wang Shu's office, Amateur Architecture Studio, reflects his challenge to conventional approach of professional architecture and his critical attitude to experimental architecture. By learning from amateurs, architects should not merely focus on pure architectural pursuit, separating

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architecture from the praxis of life; instead, they should be similar to carpenters of learning from living reality. As the Head of Architecture School and a professor of China Academy of Art in Hangzhou, Wang Shu encourages his students to rethink fundamental issues of architecture, not to be restricted by their professional knowledge, but based on their basic understanding of daily life. He emphasizes the reflective attitude of asking specific questions to current conditions. Facing globalization, mass destruction of city fabric and large-scale speedy urban development in China, Wang Shu demonstrates his persistent concern about urban problems in China. Commenting the current situation in China as “collapsing cities”,² he brings urban dimension to his architectural works and considers that urban issues are more important than those of architecture. In the following, Wang Shu’s recent significant works: Tiles Garden, Venice (2006), Xiangshan Campus of China Academy of Art, Hangzhou (2004, 2007) and Ningbo History Museum, Ningbo (2008) will be reviewed to examine his critical practice with the city.

2. Walking over the City - Tiles Garden

As the Chinese Pavilion for the 10th Venice Architecture Biennale, Tiles Garden was constructed on top of an archaeological ruin that exists below the Virgin Garden in Venice. More than 60,000 old Chinese roof tiles were used; half of them were laid flat on a bamboo base, while another half were gently sloped at a diagonal line. The whole garden was partly bisected by a promenading bamboo ramp inviting visitors to walk over the roof tiles. Roof tiles are commonly used in Chinese vernacular architecture, so walking on the bamboo ramp symbolizes walking over the city, facilitating people to have a contemplative reflection about the impact of urbanization to traditional city fabric. Rather than exhibiting images and models of contemporary Chinese architecture in the Biennale, Wang Shu prefers to construct Tiles Garden on-site by his team in two weeks time to demonstrate the actual construction process and working approach of a Chinese architect within the site condition and time constraint. It is also a significant architectural experiment of using recycled construction material to explore the cultural meaning of material.



Fig. 1: (a) Tiles Garden (2006); (b) Xiangshan Campus Phase 1; (c) Xiangshan Campus Phase 2

3. Thinking between Nature and City - Xiangshan Campus

In 2000, when China Academy of Art was selecting a site in Hangzhou for new expansion, instead of following the normal approach of locating the new campus within popular government zoned higher education districts, the Academy’s professors, artists and architects all agreed to choose the site in accordance with Chinese tradition, concerning about the importance of natural landscape to the campus environment than the existence of infrastructure of the site. Finally, they decided to locate their new campus near a small 500-metre high mountain called Xiangshan. Xiangshan Campus, according to Wang Shu, is not designed in isolation, but is based on his thinking between nature and city. He considers that the original Chinese tradition of building cities in compatible with natural landscape has been lost, so he

would like to design the campus as a new model for cities.

Phase I of Xiangshan Campus (2002-2004) locates on the north side of the mountain. Most of the buildings are in the form of courtyard blocks in which the courtyards are enclosed by both architecture and natural surroundings. Although the buildings seem to be loosely dispersed in the campus, their alignment and positions follow sensitively the undulating profile of the mountain. Apart from having openings facing the mountain in different angles, the scale and proportion of the buildings are compatible with the mountain to establish a co-existing relationship with the natural landscape. As clearly shown in the composition of traditional Chinese landscape paintings, houses only occupy a small part within the natural landscape, so Wang Shu aims to design his architecture not as dominant objects, but as a harmonious part of the overall setting. To him, “humanistic atmosphere of a place is more important than architecture”.³ Humanistic atmosphere is created not only by interaction with nature and proportion of the built environment, but also by careful use of materials. In Phase 1, sloping roofs of grey tiles in contrast to white stucco walls, rich-toned timber shutters facing the courtyards and the shadow created by projecting sun-shading brise-soleil all contribute to the rich traditional characteristics of the place. Compared to courtyard arrangement in Phase 1, Phase 2, locating on the south side of the mountain, emphasizes spatial movement. Design approaches of borrowing views, framing views and changing views from traditional Chinese garden design are applied, facilitating users to enjoy the beautiful scenery and experience the delightful variety. Provisions of ramps, corridors, steps at multi-levels and bridges between different buildings allow dynamic connectivity and spatial exploration.

In stark contrast to conventional campus design with efficient planning, clear demarcation and hierarchical organization, the irregular master planning of Xiangshan Campus stresses the inter-relationship between buildings, close linkage with nature as well as rich regional character of a place. Some lands between teaching blocks and the mountain are allocated as agricultural fields to refer to the previous pastoral scene of the site. Original farmers are allowed to return to the farmland within the campus to grow crops without chemical fertilizer free of paying any rent. In order to protect the natural setting of the site, the original brook around the mountain has been preserved, being a water feature in the campus and at the same time providing water for irrigation and cultivation of the agricultural fields.

During the design of Xiangshan Campus, Wang Shu and his team conducted a five-year research (2001-2006) in Cicheng, a small town near Ningbo. Due to the proximity to the sea, people living in Cicheng suffer from typhoons which often cause their houses to collapse. Therefore, local residents adopt a recycling construction method of using available broken roof tiles and bricks for reconstructing their vernacular houses within a short period of time after typhoons. Such traditional tile/ brick mixed building technique impresses Wang Shu, so further to the use of recycled roof tiles in Phase 1, he extensively applies this tile/ brick mixed building technique in Phase 2. More than seven million pieces of old discarded roof tiles and bricks have been salvaged from demolition sites all over Zhejiang province for Xiangshan Campus. On the facades, the random pattern of bricks of different sizes, colours and shapes not only revitalizes traditional craftsmanship, but also exemplifies Chinese vernacular sustainable construction approach, in opposition to the massive demolition and consumption phenomenon in Chinese cities.

Apart from the building forms and recycled materials of Xiangshan Campus, Wang Shu also expresses his concern about vernacular culture through details. The catches and latches are made by local ironsmiths rather than being selected from commercial catalogues of mass-produced industrial products. Wang Shu aims to increase the participation of craftsmen in the construction process in order to maintain folk building techniques and allow the continuity of local tradition. By establishing a co-existence relationship with nature, adopting tile/ brick recycling building tradition and revitalizing local craftsmanship, Wang Shu does not merely design for a campus, he is also trying to reconstruct a vernacular life-world amid collapsing cities in China.



Fig. 2: (a) Use of curvilinear roofs; (b) Ningbo History Museum and its surrounding; (c) Courtyard with bamboo

4. Evoking Memories of Tradition and City - Ningbo History Museum

Ningbo History Museum is located in a new development district of Ningbo. Old villages previously here have been razed for the expansion of urbanization to this area, so Wang Shu comments that this is a “no memory area”.⁴ To him, Ningbo was a very beautiful harbour, but now everything has been demolished. He even criticizes the new development approach as a “bad urban model” of using “standard urban planning”, providing “wide roads and big squares” and restricting “low building density”,⁵ ignoring the historical context of the city and the reality of vast population in China. Under the new master plan, buildings are required to be 100 metres apart and maximum height is limited to 24 metres; therefore, the challenge is how to design an isolated architecture for the museum in this flat area.

As a winner of an international architectural competition for Ningbo History Museum in 2003, Wang Shu fully understands that it is impossible to renew the original rural vitality of the site. Referring to the traditional interest in natural forms as clearly exemplified in Chinese landscape paintings, he considers that mountain, being a representative natural form, is a way for Chinese people to find their lost and hidden culture, especially for city dwellers who are estranged from nature. His museum design is in the form of a mountain or a monolith, in which the stone-hewn form can express both the force of nature and chiseled artistic creation, delivering a cityscape between artificial and natural. Wang Shu’s museum design also captures three characteristics of traditional villages in Ningbo: water, courtyard and tile/ brick mixed construction. The provision of water channels around the museum, together with reed-covered banks and cobblestone edges, symbolizes the historical development of Ningbo from a small water village to a busy port, while the courtyard with bamboo creates a humanistic atmosphere for the museum.

Although tile/ brick mixed construction has been used in Xiangshan Campus in Hangzhou, this is the first time of applying this traditional technique in its place of origin. At first, local government officials did not like this idea as they preferred a modern building to represent the city; however, when the museum is completed, it has been well-received by the general public. The emphasis of craftsmanship in traditional mixed building technique and bamboo-textured wall construction arouses active participation of workers. They are proud of their works and are now being invited to apply similar techniques to other construction projects as well. This is a combination of folk craftsmanship and modern construction technology in contemporary architecture, avoiding the loss of traditional techniques and facilitating the continuity of local building culture.

Besides, the old discarded tiles and bricks on the facades as historical fragments enable visitors to touch. The exterior of the museum explicitly expresses traces of time to cope with the internal exhibitions relating to the history of Ningbo, evoking a lively remembrance of the past. Regarding the form of the museum, the rectangular base of the building transforms into five separate architectural units on top of a viewing platform, each has its own distinctive form. Through their intimate relationship and the proportional space in-between, Wang Shu brings urban dimension to his architecture, resembling

traditional streetscape. The viewing platform on the roof provides a panoramic view of Ningbo city and numerous construction works in the city nowadays. Viewing the cityscape in close proximity to historical fragments of the building facades can stimulate visitors to have a reflection about massive demolition of city fabric and future development of the city.

5. Conclusion

From small-scale design of Venice Biennale Tiles Garden exhibition to large scale works such as Ningbo History Museum and Xiangshan Campus, Wang Shu responds to the astonishing pace and scale of urbanization and offers his perspective to remake the city in a more socially-related and sustainable way by using cultural resources, respecting traditional heritage and addressing local conditions, in opposition to the overwhelming commodification and commercialization of cities in China.

Based on the discussion above, Wang Shu clearly expresses his concerns about social context, inter-relationship between built environment and nature, reconstruction of life-world, integration of folk craftsmanship into modern building technology, as well as aesthetic values of Chinese literati in traditional gardens and landscape paintings. Apart from that, he also influences others: through his teaching in China Academy of Arts, he delivers his crucial messages to his students, to the next generation of architects in China; through his interaction with local workers, he arouses their active participation in craftsmanship to maintain the continuity of local building tradition; through his collaboration with clients and relevant government officials, he successfully changes their views from initial opposition to the use of tile/ brick mixed construction in Ningbo History Museum to their subsequent explicit request of using such technique for Tengtou Pavilion. Wang Shu not only shows a sense of commitment and social responsibility in his works, he also demonstrates his urban intervention and critical practice with the city, providing a vision of an alternative way to develop the city.

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Sources of Illustrations

Fig. 1(a): <http://nd.oeeee.com/cama/200811/W020081127587138544821.JPG>

Figs. 1(b), 1(c), 2(a), 2(c): © Hing-wah Chau

Fig. 2(b): <http://www.archdaily.com/14623/ningbo-historic-museum-wang-shu-architect/>

References

- [1]. Yu B, editor. *Domus + 78: Chinese Architects & Designers*. Beijing: Zhongguo Jianzhu Gongye Chubanshe; 2006, p. 298.
- [2]. Wang S. 'Thinking by Hands' An Experiment on the Reconstruction of Living Places in Collapsing Traditional Cities. In: The Hong Kong Institute of Architects, editor. *Refabricating City: Hong Kong & Shenzhen Bi-city Biennale of Urbanism/ Architecture*, Hong Kong: The Hong Kong Institute of Architects; 2007, p. 45.
- [3]. Wang S, Xu J. *Tiles Garden: A dialogue between city, between an architect and an artist (China Pavilion – 10th International Architecture Exhibition, La Biennale di Venezia, 2006)*. Hangzhou: China Academy of Art; 2006, p. 16.

- [4]. McGetrick B. Ningbo Historic Museum. *Domus*; **922** (Feb 2009): 74. McGetrick B. Ningbo Historic Meuseum. *Domus China*; **032** (May 2009): 74.
- [5]. Muyenck B. Local Hero. *Mark* **19** (Apr-May 2009): 74-75.