

POLITECNICO DI TORINO
SECOND SCHOOL OF ARCHITECTURE
Master of Science in Architecture
Honors theses

The Hong Kong-Shenzhen Megalopolis | The Lok Ma Chau Loop development

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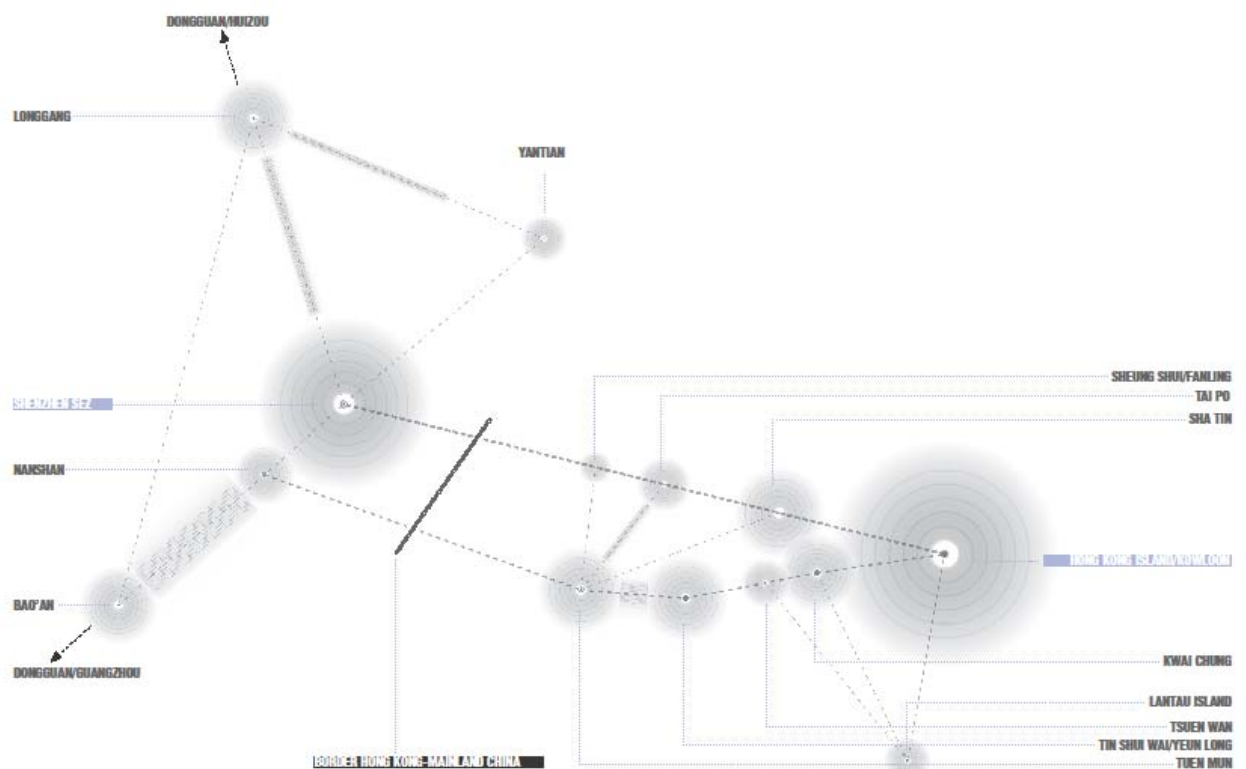
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Regarding the spatial structure of the Hong Kong-Shenzhen Megalopolis, we can observe the presence of two major poles (the metropolitan cores of Hong Kong and Shenzhen), and a series of clusters and corridors that develop along two main infrastructure arteries that link the cities, and then proceed to Guangzhou and Dongguan.

The infrastructure network is composed of an expressway and two railway lines; the first railway line links the metropolitan core of Hong Kong to LoHu and Lok Ma Chau Border Control Points in Shenzhen and the second links HK Island to Tuen Mun/Tin Shui Wai; the expressway links Hong Kong to Shekou (Shenzhen Bay) through the Western Corridor, crossing Tuen Mun/Yuen long.

One particular feature of this Megalopolis is the relatively small scale of its structure; normally, the distances between poles exceed the 100 km barrier, but in this case the distance is of nearly 40 km. The distance though between the extreme points of the structure is 90 km.

However, the singular aspect of the structure regards the population of the Megalopolis, that exceeds 20.000.000 inhabitants (including floating population). It is therefore a unique global case in which the compact dimensions of a Megalopolis, are in stark contrast to its high number of inhabitants (thus high average densities) and its international financial gravitas.



The site is located to the northeast of the Mai Po Nature Reserve and is surrounded by fishponds with high ecological value. The Lok Ma Chau Station of Lok Ma Chau Spur Line and the Lok Ma Chau Boundary Control Point (BCP) are located to its southwest. Opposite to the Loop to the north across the Shenzhen River is Huanggang BCP and Futian Commercial District in SZ.

Before the training of Shenzhen River (1999-2004), the Loop was largely used as agricultural land. As a result of the training of Shenzhen River, which serves as the administrative boundary between Hong Kong and Shenzhen, an area of about 84 ha, which previously lay to the north of the river course, became situated to the south of the re-aligned river course and now falls within the boundary of the Hong Kong Special Administrative Region - but technically owned by China. During the river training work, the Loop was used as a dumping ground for the sediments extracted from the old riverbed, some of which were contaminated.



In the “Hong Kong 2030: Planning Vision and Strategy Study” (HK 2030 Study), a preliminary assessment of the development potential of the Frontier Closed Area was undertaken and the Lok Ma Chau Loop (the Loop) was identified as an area having potential for special uses pertinent to its boundary location. To fully exploit the strategic location of the Loop, the HK 2030 Study had also examined the possibility of allowing easy access arrangement for Mainlanders to the Loop. A linkage to the MTR Lok Ma Chau Station and widening of Lok Ma Chau Road were proposed and realized in order to facilitate movement of goods and services and to cope with additional traffic.

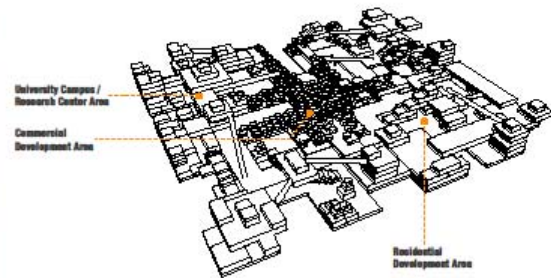
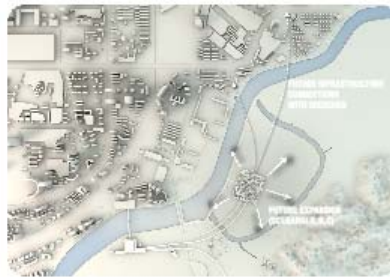
SCENARIO A / B / C
TIME WINDOW T1

TOTAL
PLATFORM AREA
84.000 m²

BUILDING
CONSTRUCTION
AREA
80.000 m²

NUMBER OF PEOPLE
2500

DENSITY
0.03 people / m²



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