



THE CULTIVATION OF URBAN VILLAGES

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The cultivation of urban villages

Integration of informal development in the formal planning proces of Shenzhen, China

MSc thesis

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Keywords:

Urban villages, informal development, spatial integration, social inclusion, floating population, informal networks, path dependency, Shenzhen, Guangming district

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Keywords. Urban villages, informal development, spatial integration, social inclusion, floating population, informal networks, path dependency, Shenzhen, Guangming district

Because of a failure to recognize the stepping-stone role of the villages for the migrants, the informally organized urban villages are not integrated into the urban structure of the municipal plan.

To address this question the first section aims to develop a framework in order to understand and describe informal development in Shenzhen.

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Informal development is not a singular development but can be understood from multiple perspectives that each emphasizes a particular aspect of informality. The four dimensions of informal development – poverty, legal, cultural, dualistic– view the relation between formal and informal differently, which means that the intended integration between formal and informal is regarded differently.

By applying these perspectives to the main stakeholders – landlords, government, developers, migrants– their respective interests in the village become clear. The role of the informally developed village within the city is constantly changing. The changing economic profile of the village triggers spatial transformations of the village. The changing physical conditions of the village demand different organisational structures within the village. Together, the transformation of the economic profile, the morphological structure and the organizational form, enable the slow socio-economic transformation of the rural

migrants into more skilled and more adaptable urbanites.

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The changing roles of the village are most easily monitored in the growth that the village exhibits. Particular kinds of growth are linked to particular socio-economic profile. So, by looking at physical aspects of informal development, it is possible to determine in which stage of development the village is. This knowledge can then be used to formulate a successful integration approach.

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The informal development in Shenzhen can be viewed from different theoretical perspectives. Each perspective reveals different elements to be of importance to the inclusion of migrants and integration of the village.

The informal network is historically grown under the impact of the landscape, Chinese perception of the build environment and informal growth. Through the informal growth process, an ‘interior’ space was created between different neighborhoods that act as the main urban space of the village.

When the empirical data from the spatial research is applied to the theoretical framework, the villages in Guangming can be categorized in five different developmental stages. The spatial distribution of the different village types follows a logic that can be explained using the informative framework. The five village types form the basis for the regional development proposal.

The ability of the informal network to include migrants differs. The integrative quality of the village can be described in terms of its embeddedness in the regional structure and the quality of the interior space. The quality of this space can be described in terms of the surrounding fabric, the edge and the functions.

The current interaction between informal and formal process creates an undesirable path towards decline of informal opportunities in the villages. Departing from the notion of slow transition, my proposal proposes the careful adaption and modification of existing artefacts and structures, rather than imposing new structures.

The current development model is dominated by a poverty perspective on informal development, which leads to a neglect of the role these informally grown villages have in the socio-economic upgrading of the migrant population in Shenzhen. My own research strongly builds on the dualistic perspective, through which it becomes clear that the informally grown villages have a pivotal role in the upgrading process. Through this perspective it becomes possible to link the spatial development of the village to the socio-economic opportunities that these invoke.

When put into the context of other approaches to informal development, the main recommendation of this research is for a more village-specific interventions strategy that relates to the particular development stage of the informal settlement.



PART 1 INTRODUCTION

PART 2 THEORETICAL FRAMEWORK

PART 3 VILLAGE DEVELOPMENT

PART 4 DEVELOPMENT PROPOSAL

PART 5 CONCLUSION

#1

CONTEXT AND PROBLEMFIELD



Introduction

This research deals with the spatial integration of informal development in the Shenzhen region of China. The introduction is a culmination of an elaborate explorative study that was necessary to understand the context of China and Shenzhen. This study led to the conclusion that there seemed to be a gap between the formal planning by the government and the informally organized villages in and around Shenzhen. Enormous demographic increase and a dispersed urban form forces planners to look at the peri-urban areas around the city for further urban development. However, these areas are already home to hundreds of thousands of people and have a functioning urban system. Current practice largely ignores the informally developed villages as essential components of the urban system. These informally developed villages, commonly known as urban villages, are the focus of this research. Although the absorption of villages into the larger city happens throughout the world, the urban villages are unique to China, because of various political and economic reasons. This chapter will explain how these urban villages came about, what makes them essential in the city of Shenzhen and how the current development system fails to incorporate the urban villages and their inhabitants in the planning process.

Urban development in the Pearl River Delta

The year 1978 represents a turning point in Chinese history because the communist regime that promoted rural communes was replaced with a Chinese-style capitalist rule that promoted the growth of cities. The coastal cities of China were central in the economic growth of China of the last forty years. Cities like Beijing, Shanghai, Suzhou, Guangzhou and Shenzhen experienced enormous demographic, economic and urban growth. Urbanization and massive rural to urban migration is regarded as an inevitable process of any developing nation(Chan, 2004, p. 4). The coastal cities were opened up to investment from abroad and migrants were allowed to move to these cities to work in the factories. In none of the coastal cities of China an effective public housing scheme was developed, which meant that the migrants had to organize their housing informally. This process of growth of informal settlements at the edge of the city is not uncommon for rapidly urbanizing regions. The emergence of slums is the reality for most cities that undergo fast urbanization. China's informal development represents a different case because the slums of China did not develop through a process of illegal squatting of land, but through the informal development of existing villages. These villages are commonly known as urban villages, referring to their location within the urban fabric of the city. The term urban village is somewhat misleading, because the urban villages in most instances have lost their rural character almost completely and have transformed into high density urban environments. The general opinion about these urban villages is very negative. Like other slums around the world, the urban villages of China are associated with high rates of crime, social problems, issues of integration, bad building quality and fire hazard. Like the name urban village is misleading for the urban character of the villages, so is the slum-like appearance of the urban villages misleading for its role in the economy of Chinese cities.

The role of informal development is a topic that has received little attention in the discipline of urban planning. Essentially, the urban villages are

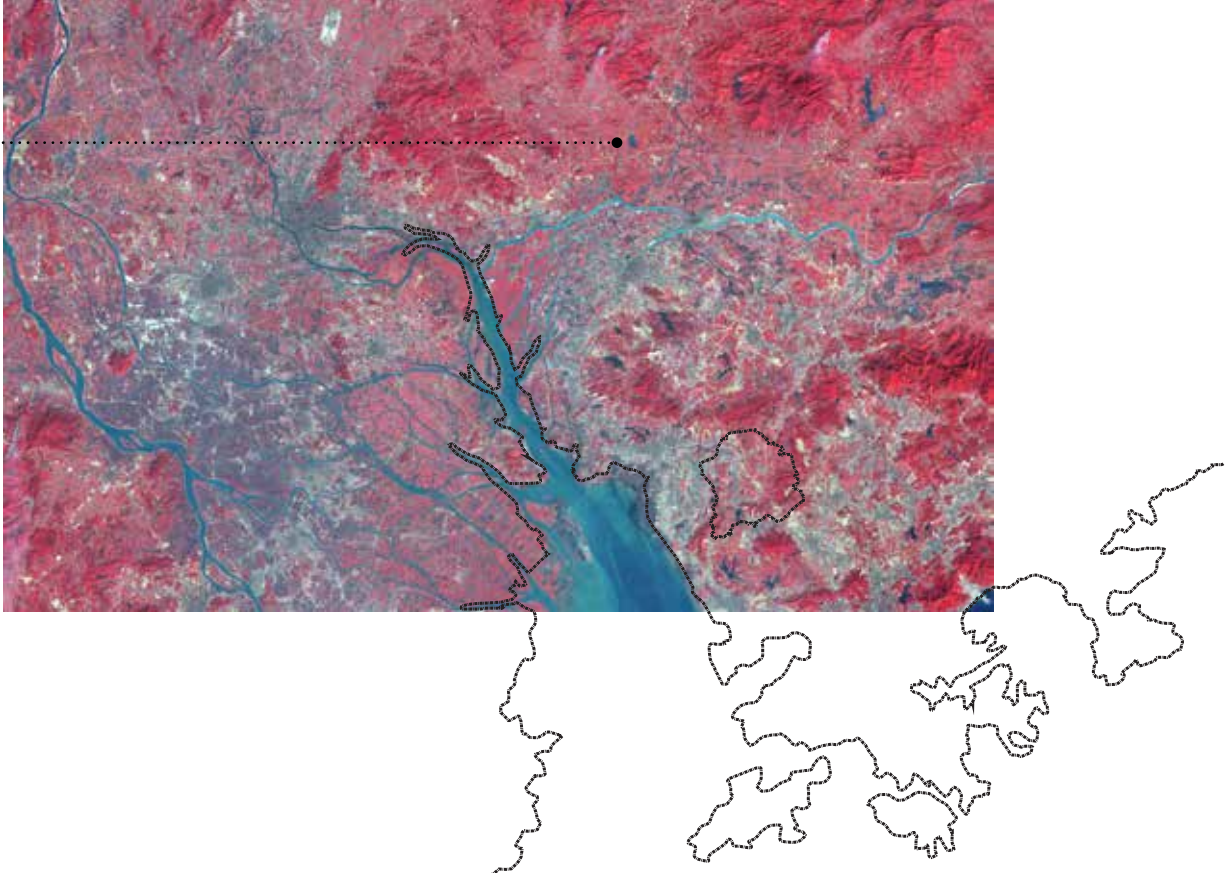
incubators for the formation of social networks and economic life and the villages allow its inhabitants to enter a process of slow socio-economic upgrading. The socio-economic opportunities in the urban village emerge from a specific set of spatial, legal and cultural conditions that distinguish the urban village from other parts of the city. The focus of this thesis lies on the revealing of the characteristics and structure of these conditions that allow the process of slow socio-economic upgrading for the migrant population. The urban villages should not be regarded as isolated neighborhoods where the urban poor live, but rather as a crucial part of transitional system in which rural people become urban citizens. The urban villages do not only provide affordable housing to the migrants coming to the city, but the villages also gives the opportunity to find employment, start a business, follows an education and gain access to social networks. What we are talking about here is not a local short term event, but a long term change of Chinese society. In the absence of precise academic theories, popular literature can help us to understand the complex processes and the role of informal development in

this process. *How the city moved to mister Sun* is a piece of popular literature that describes literally how the city gradually grows towards the house where mister Sun lives. This process of urbanization The book touches upon many subjects, which shows the complexity of the process. The Desakota model helps us to understand this complexity.

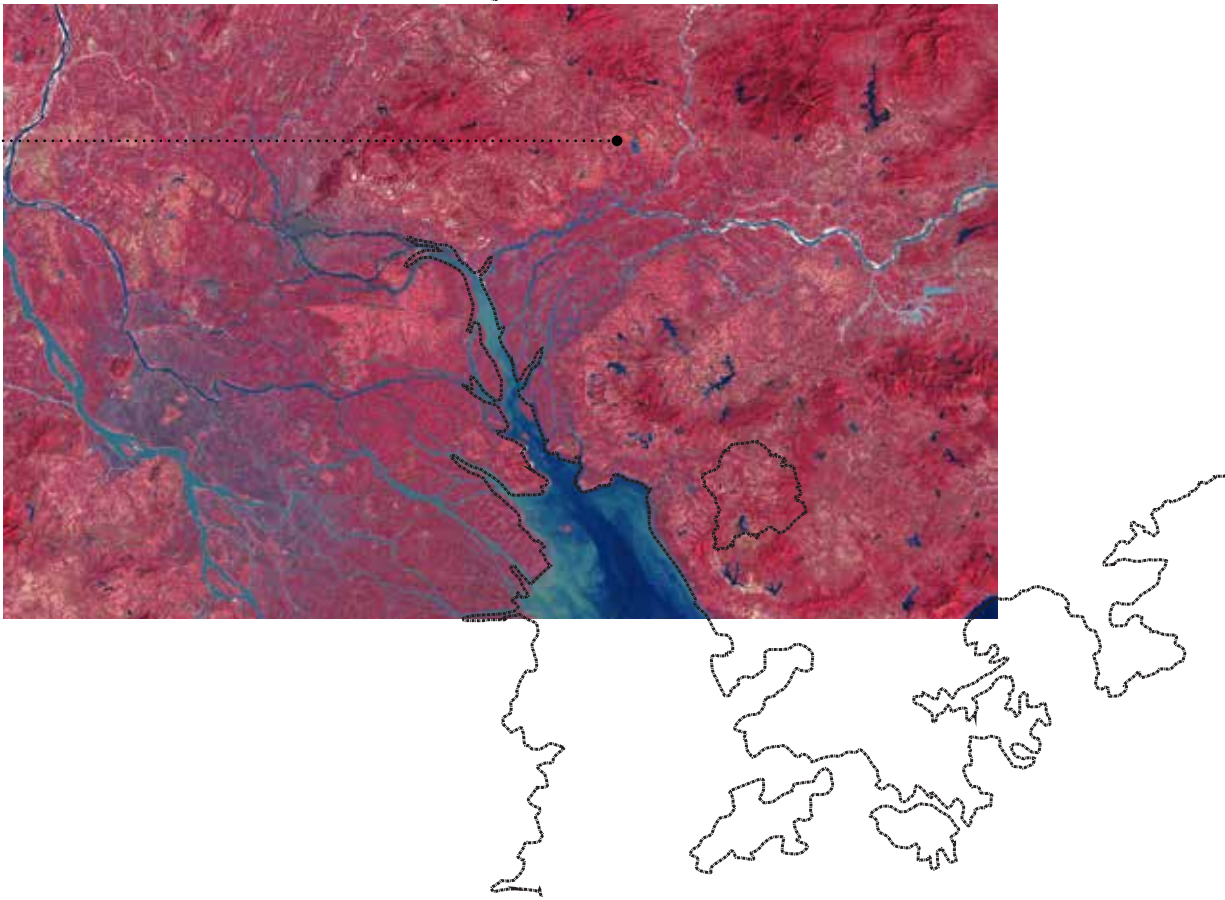
It is tempting to draw parallels between urbanization of Chinese cities today and urbanization of Western cities during the industrial revolution. The parallel assumes that if similar processes occur between the cities of the industrial revolution and today's urbanizing cities, solutions to the problem of slums should also be similar. The Desakota model is a model for urban development in South-east Asian cities that puts an emphasis on the duality between rural and urban in the urbanisation process. Desakota literally means "village-townprocess" which refers to urbanization of villages around cities, rather than the expansion of cities.(McGee 1989, 1991). According to McGee and Ginsburg rural people do not have move to cities, but the rural land around them urbanizes so they become part of the city. According to McGee the Desakota has six main features. First is a dense population engaged in smallholder cultivation, commonly of wet rice. Second is an increase in non-agricultural activities. Third is a well-developed infrastructure of roads and canals. Fourth is a reservoir of cheap labour. Fifth is a highly integrated 'transactive' environments in terms of movements of people and commodities; and last a state perception as being 'invisible' or 'grey' zones (McGee, 1991, p. 15-18). McGee states that the classic Western model of urbanization is inadequate in Asia for three reasons. Firstly is the assumption that the classic divide between rural and urban activities will persist as urbanization continues. Secondly is the assumption that in the transitional process of rural to urban, people will concentrate in large cities. Thirdly is the assumption that urbanization in Asia will follow the same path as in Western experience (McGee,1991a, pp. 4-5). The biggest difference is that Western cities are characterized by residential dispersion from central cities, while Asian cities has mainly industrial dispersion(Lin, 2001, p. 386). This difference is expressed in a different morphological structure. While in American urban regions high density cities are alternated with big open spaces, Asian urban regions have a much higher density that is more equally distributed between big centers. The massive urbanization of the coastal cities of China has not been the extension of formal urban areas, but rather been created by informal development of rural areas. In addition, the demographic rise in population has not come from a rise in birth rates of urban citizens, but rather from huge flow of migration from the interior of China to the Coastal cities. In this urbanization of the countryside "peasants of the region 'leave the soil but not the village' (*litu bulixiang*) and 'enter the factory but not the city" (Lin, 2001, p. 400).

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Sattelite picture of the Pearl River Delta taken in 1979. The urbanization of the cities is largely confined to their historical boundaries.



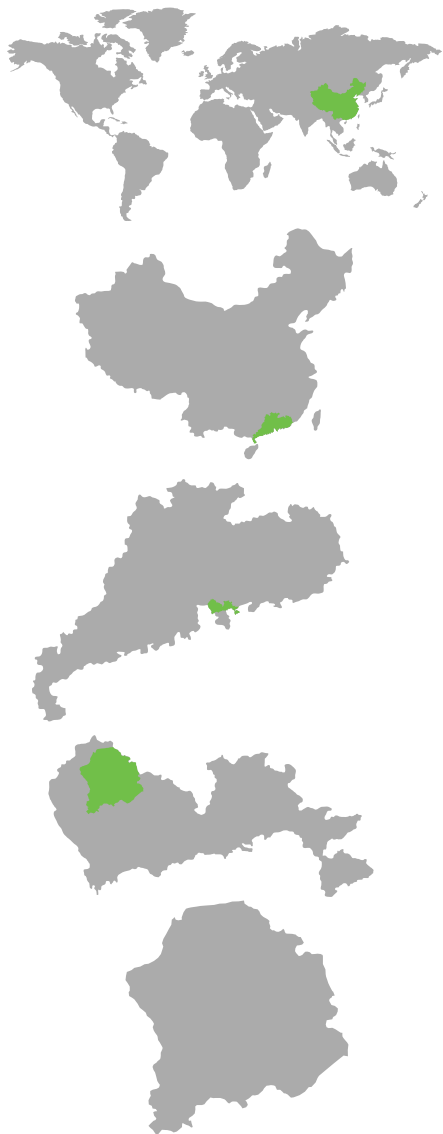
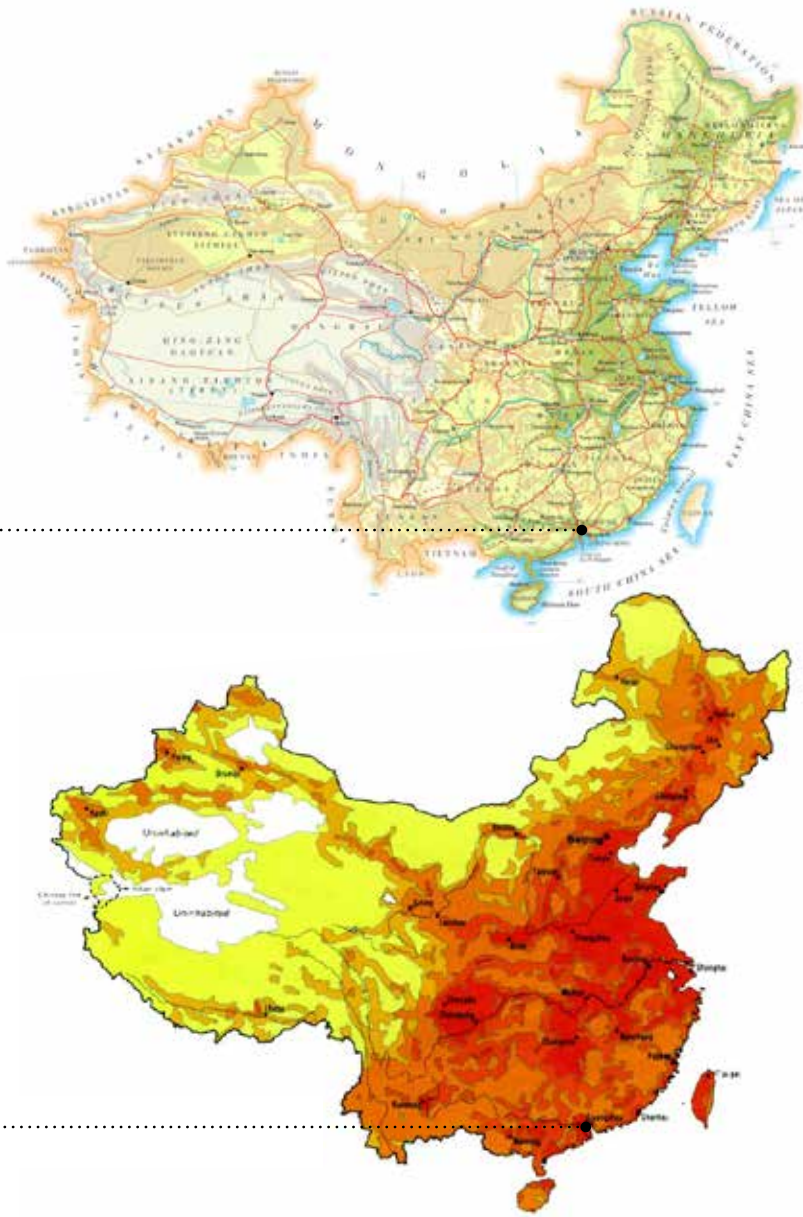
Sattelite picture of the the Pearl River Delta taken 24 years later, in 2003. From the pictur, it is clear that the region underwent massive urbanization.



Historical sketch

The Pearl River delta region (PRD) is a lowland area in the south of China. The Pearl River is one of three big rivers in China and the fertility of the land has made the Pearl River Delta an attractive place to settle. The Pearl River Delta has a sub-tropical climate, which means that the main agricultural output is rice and fruit.

The historical heart of China lies between the modern cities Beijing and Shanghai. This region is still the most densely populated area of China. The name for the Chinese kingdom that was located around the Pearl River Delta before the unification of China was called Lingnan, which means south of the mountains. Nowadays the Pearl River Delta is one of the densest populated regions of China and home to over 60.000.000 people. The growth of the region partly has to do with the European presence here. For over 400 years Europeans have influenced the Pearl River Delta. The British had a treaty port Hong Kong, while the Portuguese had their own maritime base at Macau. And after the Opium wars China had to open its harbours for trade, of which Canton (Guangzhou) was one of the most important.



Special Economic Zone Shenzhen

The city of Shenzhen represents perhaps the most extreme case of how informal development has shaped a Chinese city. Dubbed as the global factory, the Shenzhen SEZ has developed into one of the most important industrial centres of the world. Established in 1978, Shenzhen is a state-initiated Newtown in Southern China that is currently home to more than 12 million people. Up until 40 years ago Shenzhen was nothing more than a rural backwater. Located about 40 kilometers from the centre of Hong Kong, the landscape was characterized by steep mountains and paddy drainage canals. The name Shenzhen literally means deep drains (Zacharias & Tang, 2010, p. 216). Attracted by the job opportunities in the new industries, Shenzhen has been one of the cities receiving large amount of migrants over the last 30 years. The municipal government of Shenzhen was unable to meet the demand for housing for these migrants and informal development in communally owned villages in and around Shenzhen appeared as a solution to this housing problem. According to Wang urban development in Shenzhen is characterized by a dual-track development between regional-based informal process of the urban villages and city-based state-led development of well planned new urban areas(Wang, Wang, & Wu, 2009, p. 970) (Lin, 2001, p. 401). The villages house almost 50% of the population of Shenzhen but only occupy 10% of the land. The villages have two kinds of inhabitants. The original villagers are the landlords of the land and buildings. Most of the inhabitants are Chinese migrants coming from the interior of China. This group is better known as the floating population because of the lack of social security and access to public services in the city, thus leaving them floating between city and countryside. Despite the friction between formal and informal development Shenzhen can be considered as a huge economic success.

The economic success of the Shenzhen SEZ has to do with a number of different factors. Of course the liberal laws on trade and investment make Shenzhen an attractive place to invest. Shenzhen's location as a neighbor to Hong Kong makes Shenzhen a relatively easy place to invest. The relation between the two cities is often described as 'front dock, back factory'. But the connection to Hong Kong is not the only factor for its success. The official view of the planning department of Shenzhen has recognizes three main challenges for Shenzhen: "Shenzhen's status on the world stage; Shenzhen's relationship with its regional partners; and efforts at internal restructuring" (Zacharias & Tang, 2010, p. 243). In another document they specify these issues further in four (more technical) challenges. These are the lack of land resource, the shortage of water for urban use, overcrowding in already developed urban areas and environmental challenges (Zacharias & Tang, 2010). I would like to highlight two of these challenges, namely lack of land and overcrowding, especially because they reinforce each other. They deal on the one hand with the overcrowded urban villages of the center and on the other hand with the land intensive industrial compounds. The municipal government currently looks at peri-urban areas at the edge of the city for further expansion.

The Guangming Newtown

The study case of this project is the Guangming newtown, located on the northern edge of the Shenzhen SEZ boundary. Currently a peri-urban area, it is projected to undergo rapid changes in the near future. Important developments that will accelerate the development of the area are new highways, a new high-speed train connection and new metroline connections. However, the development is the area is not straight forward, because the area is already inhabited and already has a functional urban system.

The new masterplan for the Pearl River Delta indicates that Guangming newtown is to become a new centrality in the region. In the 2030 strategic plan for Shenzhen that was launched in 2004, Shenzhen attempts to adopt the polycentric urban development model that was put forward by Peter Hall (Zacharias & Tang, 2010, p. 219). The employment of the polycentric model in Shenzhen means that different parts of the city will specialize in economic clusters. One of these new sub-centers is the Guangming new district that will focus on high-technology with an emphasis on green technology and ecology. The municipal government states that Guangming new town is 'a pilot project for scientific urban development by 21st century standards and post-modern concepts' ("Green City, Guangming (Bright) Path," 2012). In order to achieve this goal the government uses a five point approach which consists of green planning, green traffic, green infrastructure, green buildings and green industries. Without going in-depth in all the 'green' proposals, this chapter will provide a review of the actual strategies that are being used.

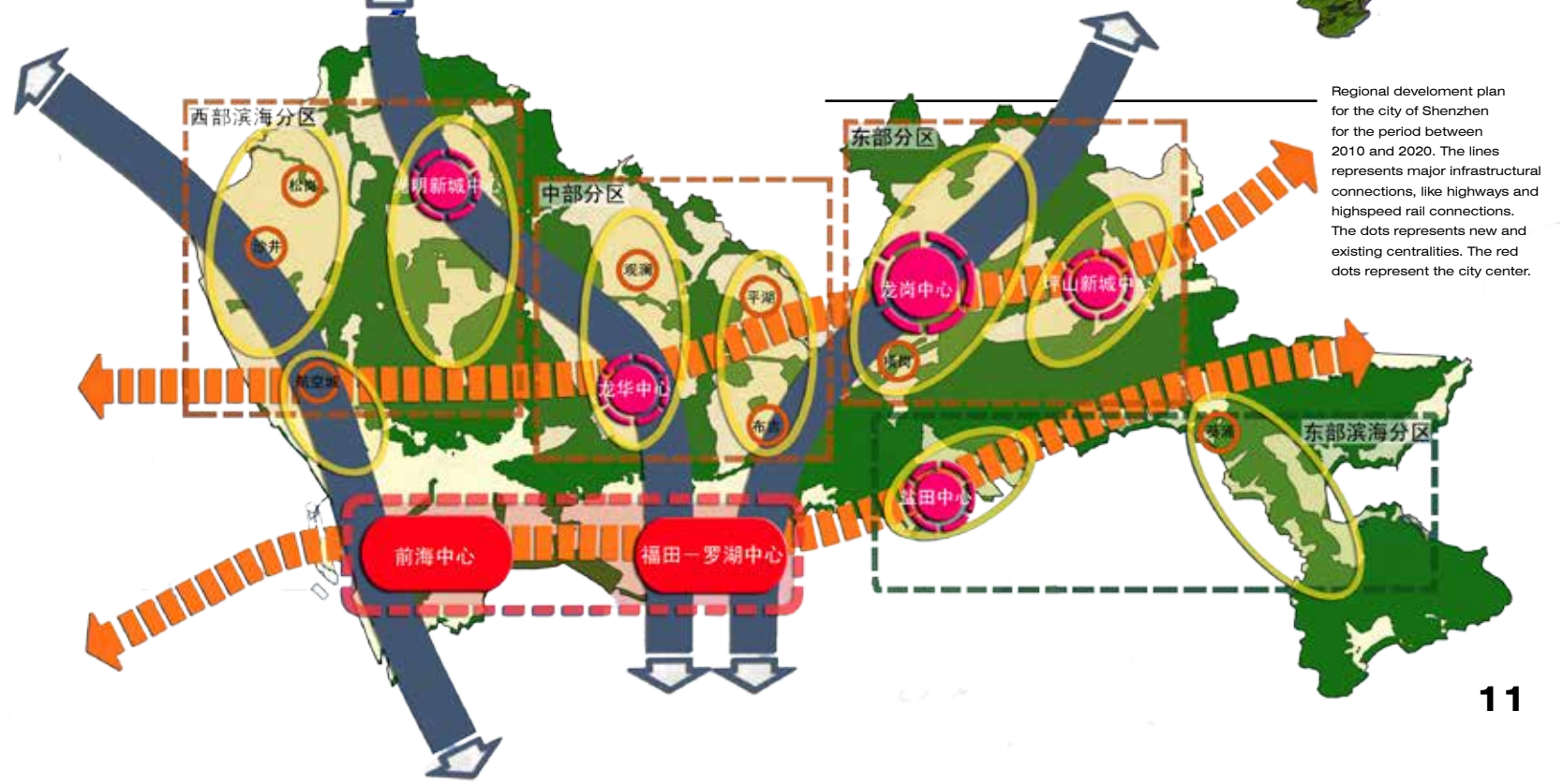
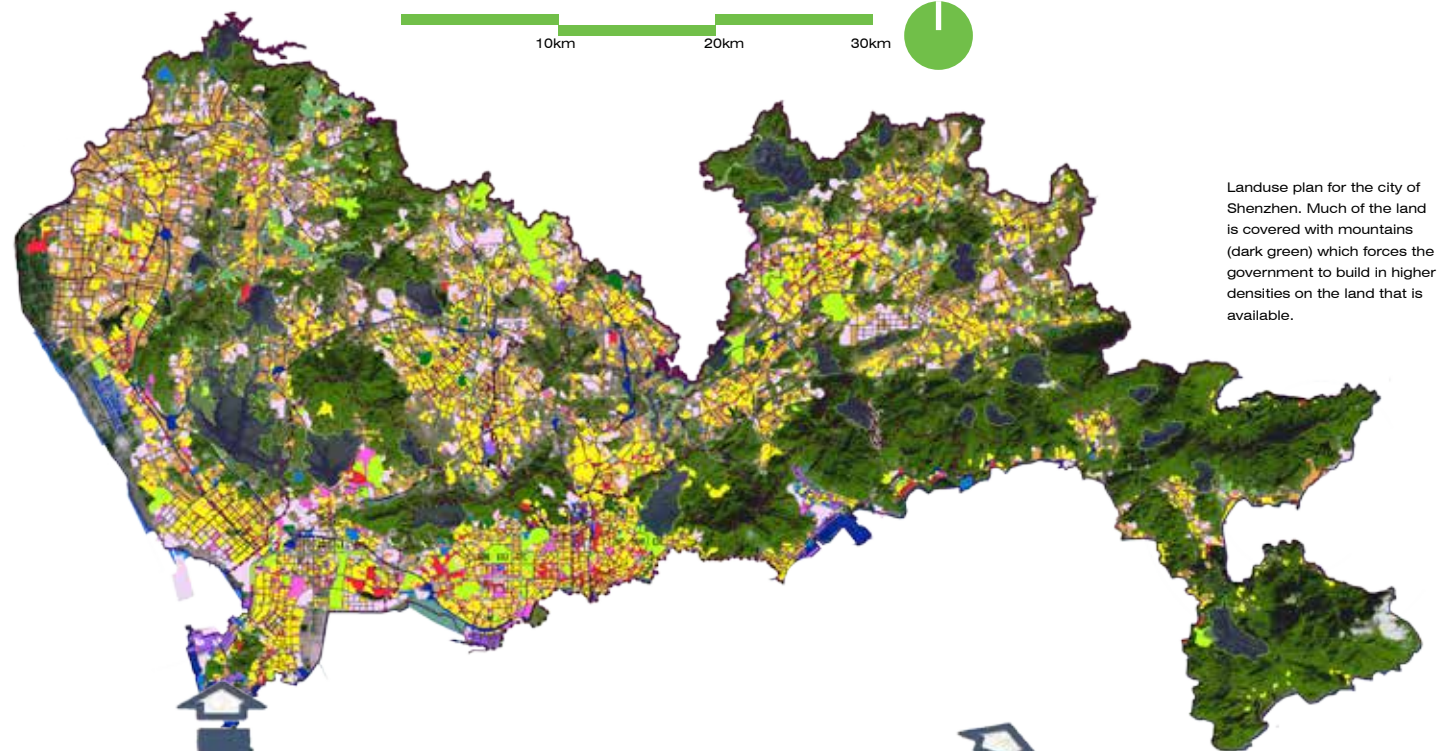
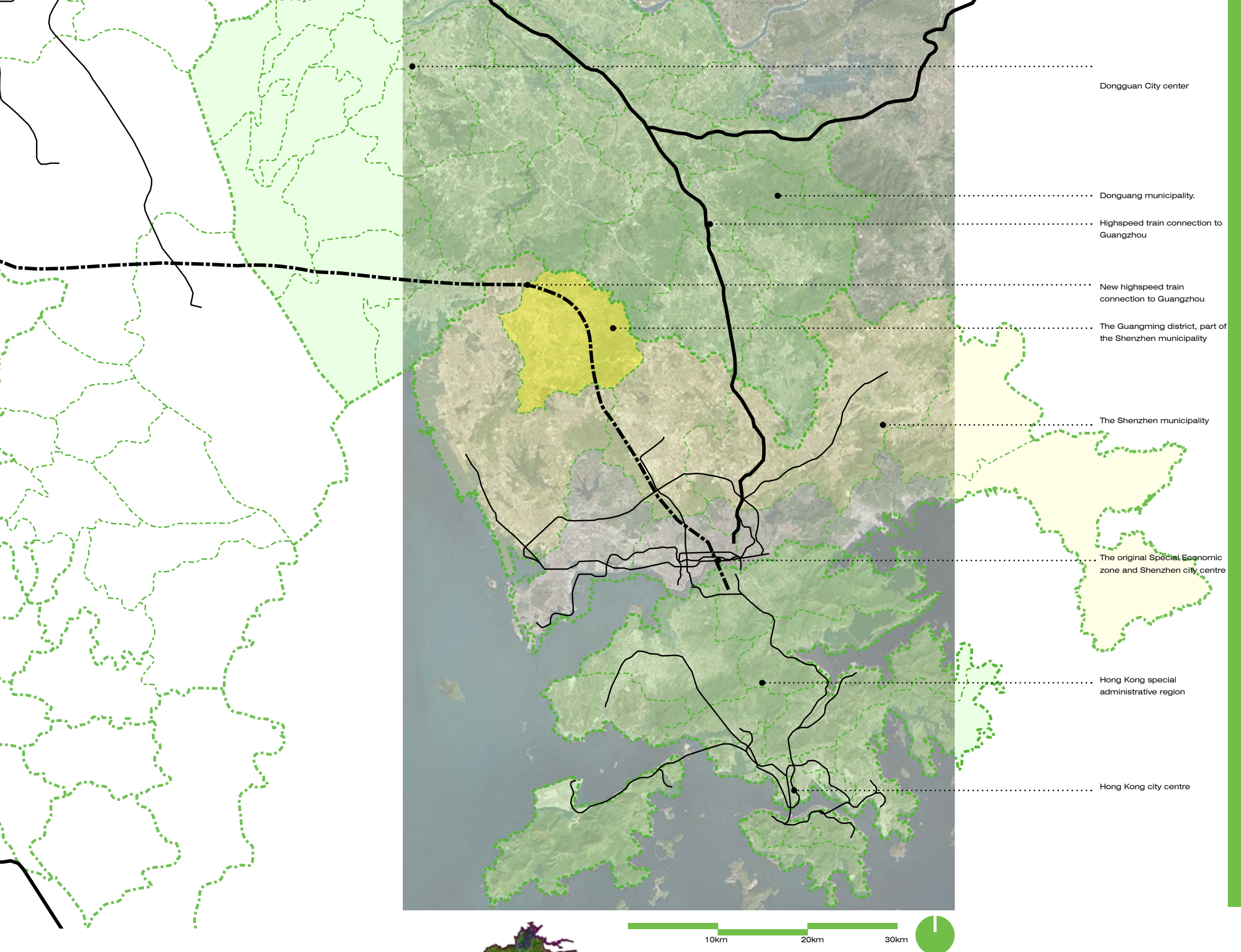
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Societal relevance

The societal relevance of this project lies mainly in the attention for the floating population in Shenzhen. Under enormous economic growth and massive urbanization, the migrant population is now one of the largest social groups in China. The migrants in China are a very vulnerable group of the population, because of multiple reasons. Firstly, the nature of being a migrant is that you are new to the city. This means that the migrants have little knowledge of the city and the dangers and possibilities it might bring. Secondly, the residential permit system of China denies the migrants access to public facilities and welfare. This means that the migrants are completely dependent on their income and the informally arranged facilities they themselves provide. Thirdly, most migrants have little or no education, which means they have little opportunity to gain jobs in the service and knowledge sector. The migrants are dependent on the availability of low-skilled labour and informal job opportunities. My project sheds light on the integration of this migrant group and is therefore very relevant as a task for urban planning.

Academic relevance

The academic relevance of this project mainly lies in the attention for the economic function of the spatial structure of the urban villages. Urban villages have gotten more attention from the academic world in recent years. Most research is focused on the social and spatial conditions and less on the economic role of the villages. My thesis might add information to the body of knowledge, because the economic role of the villages is central in my thesis. Much research is addressing the differences between the Chinese urban villages and the urban situation in the west. This thesis looks at the urban villages much more from a perspective of informality and literature on the global south. The incorporation of informal development mechanisms into formal urban planning, in order to create more slow process economic opportunity in urban villages in Shenzhen is a new approach. Informality is a topic that has gotten increasingly more attention from the academic world. Most literature on informal development is based on research in Africa and South-America. In East Asia the informal development has taken a distinctly different form that in other parts of the world. Although opinion about informal development has gotten more nuanced, it has not become an integrated part of urban planning.



Emperor Puyi 1906-1967 Last emperor of China



Sun Yat-sen 1866-1925 People's republic of China



Mao Zedong 1893-1976 Great leap forward



Deng Xiaoping 1904-1997 Market economy experiments



Hu Jintao 1942-now Technocratic competence



Problem definition and aim of the project

The development process takes a central role in the problem definition of this thesis. The section on urban development in the Pearl river delta briefly describes the role of informal in the urbanisation of Shenzhen. The section on Shenzhen shows how the villages turned from solution to problem for the local government. The main point of this thesis however, is that the urban village rather than a solution or a problem offers an opportunity for migrants to be integrated into the city. The emphasis of this thesis is not on urban quality per se, but on the quality that it offers to migrants to be integrated into the city. As introduced before Shenzhen is a newtown that was created in times of great economic growth in 1978. This economic growth of Shenzhen went in parallel with massive urbanisation. The municipal government was unable to meet the demand for housing for these migrants. Informal development in communally owned villages in and around Shenzhen appeared as a solution to this housing problem. The native farmers saw the increasing flow of migrants as an opportunity to earn some additional income. Over time the villages not only offered housing for rent, but also began to develop commercial streets, public facilities and factories. In the larger system of the city, the villages performed as a temporary point of arrival for rural migrants to be integrated into the city. Over time Shenzhen urbanized even further and many villages became completely embedded in the city. The municipal government refrained from coming up with a permanent solution for the housing demand and the villages that were originally seen as exceptions were now housing the majority of the population. As the city took over most of the commercial and industrial functions, the villages began to specialize in housing, resulting in shoulder to shoulder towers up to 15 stories high. Without structural interference from the government, the density of people increased and so did the rates of crime and pollution. The villages that were once a clever solution for high demand for housing, now were scars in the city fabric. Although the informal reaction of the villagers does not create an attractive urban environment, it still performs the role of intermediate between the rural and the urban for many migrants. The village offers many informal possibilities for migrants to enter into a slow process of economic upgrading. The informal village however cannot provide everything for the migrants. Because the original villagers try to optimize the return on their investment and space in the village is limited, bigger places of employment, large public facilities and public space are generally not available in the village. The village also does not offer the opportunity for the migrants to invest in their own environment because of their illegal status in the city.

The problem statement therefore is that because of an failure to recognize the transitory role of the villages for the migrants, the informally organized urban villages are not integrated into the urban structure of the municipal plans. In the current development process places for informality disappear and this leads to a decrease of opportunity of slow economic upgrading for the migrant population of Shenzhen. The volatile consumption of space that characterised the current development process prevents the villagers and migrants from long-term social commitment and financial investment in the villages. The aim of the project is to formulate a spatial language for understanding informal development that will allow me to integrate the informal urban villages in a spatial development plan for the Guangming district in such a way that development of the villages is directed away from its current trajectory towards a more inclusive model that creates opportunities for slow socio-economic upgrading. In the project I focus on informal settlements that are under high pressure of urban development, and are thus vulnerable for loss of economic opportunity for migrants. In order of similarity, these situations might be other urban villages in Shenzhen, other urban villages in China, informal areas in other parts of the worlds or even formal areas that are struggling with growth.

Main research question: What spatial conditions create opportunities for slow process socio-economic upgrading in the Shenzhen region and how can interventions in the development process of these villages, both formal and informal, contribute to a more inclusive city?

Sub research question 1: What is informal development and how do different perspectives on informality influence the relation between formal and informal in urban planning in Shenzhen?

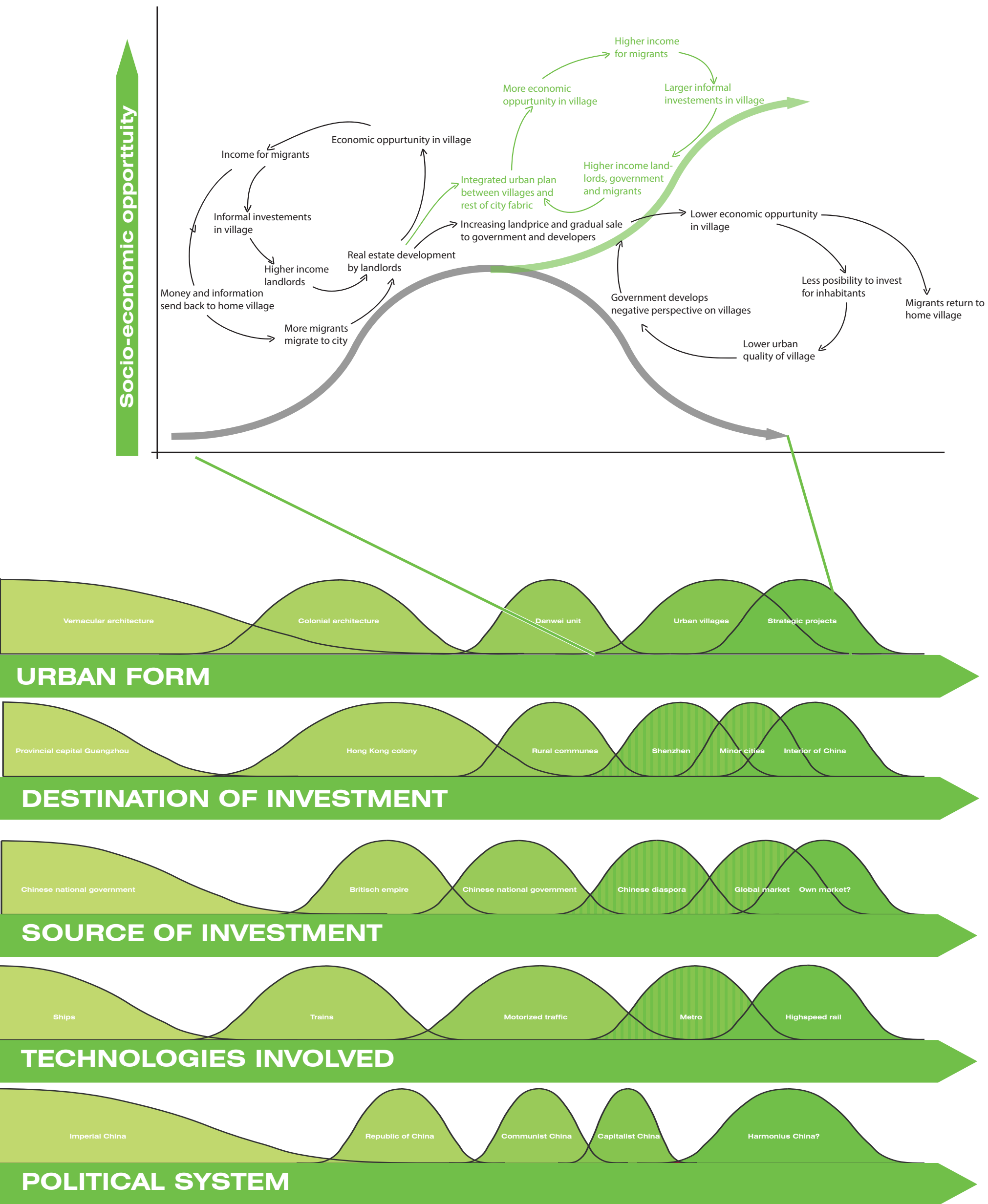
Sub research question 2: What is the role of informal development in the city and what factors influence informal development in the Chinese migrant cities?

Sub research question 3: What different stages can be identified in the informal development process and how do these stages preform in terms of opportunities for slow socio-economic upgrading?

Sub research question 4: What is the existing approach towards informal development and how does this influence the opportunities for slow socio-economic upgrading?

Dynamic waves

The history of China and the role of the Pearl River delta is a complex one that would require volumes to be described properly. For this project I have made myself aware of the some of the major historical events, to put the current dynamics into context. I have translated my understanding into a sequence of five waves that relate to politics, economics, regional dominance and transport. The idea of dynamic waves to represent Chinese history helps us to understand the current issues in the Shenzhen. Shenzhen does not operate under a single system of governance, production, transportation, etc. but is characterized by overlapping systems. Some systems are centuries old, while others have just established themselves very recently. These dynamics of these different systems create stress on the Chinese society, but as we shall see, also opportunities.



1800	1850	1911	1949	1978	2003	2020
The first wave refers to the period of Chinese history in which China was still an empire. When China was still an empire, most transport was done over water, following the major rivers of the Chinese mainland. The central government had a large role in the governance of the territory. Guangzhou was the capital of Guangdong province and received much attention from Beijing at that time. The city was still characterized by traditional Chinese houses and lacked any significant western influence.	The second wave sets in when western influence in China greatly increased. During the nineteenth century the British empire grew in power and strengthened their base in Hong Kong. Investment poured into Hong Kong and also the colonial part of Guangzhou (Canton). Specific areas where westerners traded expressed themselves in a colonial type of architecture. Transportation on the mainland was shifting to trains. At the end of this wave the Imperial government lost power and the first republic of China was founded.		The third wave is marked by the events of Second World War. After China drove the Japanese forces out, China emerged as a communist country. Mao Zedong was the leader of the Chinese party and under influence of the USSR changed the country dramatically. Funds from the USSR were directed to rural communes by the Chinese central government. In cities new type of work units (Danwei) were being realized.	The fourth wave corresponds to the great opening up of China. In 1978 Deng Xiaoping came to power and opened up the country for foreign investment in special economic zones, of which Shenzhen was one of the most important. The Chinese diaspora invested heavily in the new Special Economic Zones. This process was accelerated by the rise of motorized traffic. Under the rapid process of urbanization many rural villages became embedded in the city.	The fifth wave refers to the most recent period in Chinese history. After the initial boom of coastal China, attention of the Chinese government shifted away to the interior. New technologies of the high speed train and the metro fuel this. More and more investment comes from the global market, and Chinese cities are in developing more and more strategic projects for city marketing.	

#2

METHODOLOGY



Introduction

The methodology of this research is setup around the distinction between formal and informal practices. In order to tackle the problem of the lack of integration knowledge about both the formal and informal practices is necessary. The formal planning practice is quite well understood, but it is the informal practice that requires most research. Because research on informal practices is not a strong developed discipline I did not used any preconceived model or method for studying informal development in Shenzhen, but rather used an explorative approach to formulate my own approach. In my methodology I combined five principle methods; literature study, fieldwork, stakeholder analysis, spatial analysis and typological studies.

Literature study

The thematic of informal development in China involves many different aspects to be taken into consideration like Chinese culture, government policies, local traditions, knowledge of landscape, economics, dynamics of migration, etc. Neglecting any of these aspects completely would seriously limit the scope of this research and the conclusions that are formulated. Unfortunately, none of these aspects can be taken into account fully, on the basis of too little time and too little knowledge on my behalf. Therefore, I used literature to inform me. The literature that I used can be divided into academic literature, government work and popular literature.

Fieldwork

The fieldwork in Shenzhen has taken three weeks and can be divided in three main parts. Firstly, the fieldwork includes an general understanding of Shenzhen. Exploring the different areas of the city helps to create a sense of place and a sense of scale. By looking not only at the project site, but also at other districts of the city, I will be better able to put the project into context. Secondly, the fieldwork includes an on-site observation of the specific conditions on the site. In these observations I will need to alternate between a very specific look at some aspects of the area and a more general look at the area to find aspects that my theoretical framework was not prepared for. Especially in China, where it is difficult to obtain information through the internet, an accurate observation of the site is very important. The tools which I will use to do this observation are photos and small drawings. In the small drawings I can capture some spatial relation like the proportions of the street, or the layout of building block. Because my research is focussed on the development process of informal development, I would like to visit a village in each stage of the development. Thirdly, the fieldwork will include on-site interviews with the local people and other stakeholders. Since I have multiple research questions I will need to structure my interviews. It would be possible to do a survey with fixed questions, but this method is not suitable for my research because the stakeholders vary too much. For example, from local landlords I am interested in the personal motivation for sell of their land, while from the tenants I want to know why they chose a specific town or district. In addition, there are too many questions to ask every interviewees all questions, because interviewees have only limited time and attention available. I decided that I will structure these interviews according to site and theme. In each site I will address a different theme that fits well with the location. Examples of these themes are safety, physical environment, financial aspects, historical development, so on.

Stakeholder analysis

The stakeholder analysis is an important part of the project because it sheds light on the actual decisions and considerations that the different

stakeholders make. In order to make a feasible project it is important to be aware of these dynamics. The stakeholder analysis combines information from literature with interviews from the fieldwork. My project will focus on four main stakeholders, namely the local government, the developers, the landlords and the migrant population. In order to support his analysis, it will also involve interviews with the stakeholders. These interviews will not form the main body of the analysis, but rather act as supportive narrative to illustrate the story and to confirm some of the theoretical assumptions.

Spatial analysis

Satellite pictures provided me with the main tool to preform spatial analysis. Informal systems are more difficult to find and map than formal systems, for simple lack of data. Finding informal systems therefor, requires different techniques. Satellite pictures can reveal a great deal about the informal network. When knowing what to look for, particular parts of the informal system can be identified from satellite picture. This method is only useful when supported by observations on the system from on-site fieldwork. In the particular case of Guangming the bright purple and red roofs of market stalls reveal the presence of a larger market building in the vicinity. Another example is the very precise shape of the courtyards of an ancestral hall. Once the shape of the halls is established from the ground, the halls are easy to find on a satellite map. Finally, perhaps the easiest one are the dirt tracks that run across newly asphalted roads or uncultivated area. These ‘elephant paths’ are an indicator of movement through an area. The historical network of roads might be preserved in today’s roads. Not all historical maps are useful for this purpose. The most precise are maps on ownership and those used for warfare.

The information from the spatial analysis is the input for the spatial analysis. In this research the analysis focusses on finding patterns between informal development and socio-economic upgrading potential. For this purpose the research will compare natural structures, structure of the built form, commercial patterns, industrial development and informal development. The relations between these elements will allow me to formulate typologies. A typology of different forms or stages of informal development enables designers and planners to make decisions that suit the specific location. The relation between spatial elements, socio-economic upgrading and the village development typologies, form the basis for my design proposal.

Readers guide

In the scheme, the methodological relation between the different chapters is indicated. As becomes clear in the scheme, most of the attention is given to the informal development. The introduction covers both the informal and formal practices, to come to a problem statement. The purpose of the first literature review is to develop a multi layered lens for the observation of informal development in China. This lens is already useful in the stakeholder analysis. The purpose of the stakeholder analysis is to establish a clear overview on the different roles of the informal development for the different stakeholders. The purpose of the literature review on models for informal development is to formulate a system way of ordering the changes roles of the village. In the next chapter I synthesize the theoretical framework in a description of informal development of Shenzhen. The purpose of this description is to isolate the spatial elements that are important for the socio-economic upgrading of the migrant population is Shenzhen. The conclusions of this chapter are the direct input for the next chapter, in which the spatial relationship between these elements is researched. In the next chapter I use the spatial analysis to formulate a typology of villages. The typology is helpful tool to organize the villages. Having studied the spatial elements in Guangming, the next chapter captures the quality of this informally created system of spaces. These qualities can be subdivided in characteristics of the regional fabric and characterises of the interior village space. In the development proposal, the village typologies and the spatial qualities are combined to form a regional development proposal.

END OF CHAPTER

Key literature

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WANG, Y. P., WANG, Y. & WU, J. 2009. Urbanization and informal development in China: urban villages in Shenzhen. International Journal of Urban and Regional Research, 33, 957-973.

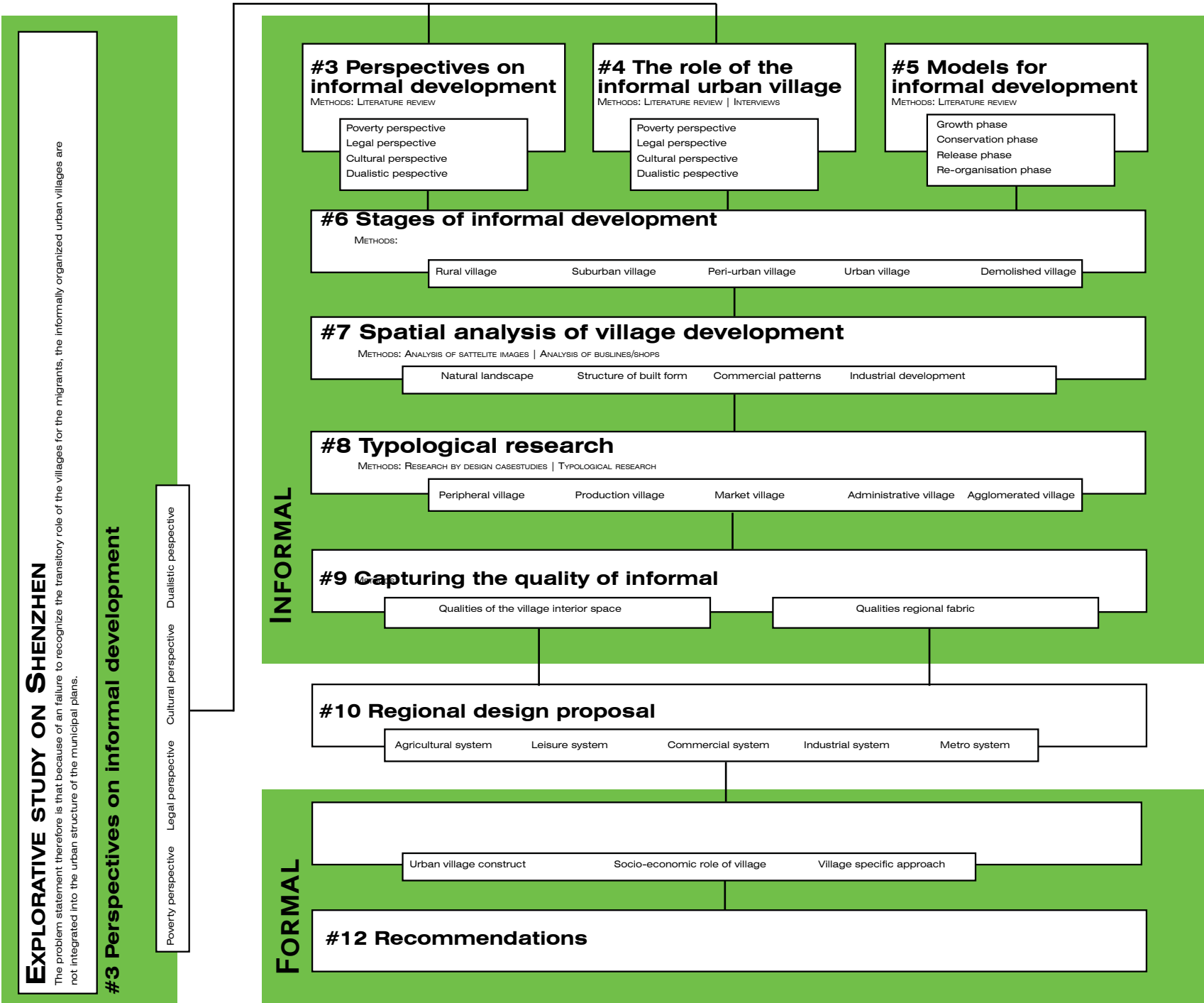
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Main research question

What spatial conditions create opportunities for slow process socio-economic upgrading in the Shenzhen region and how can interventions in the development process of these villages, both formal and informal, contribute to a more inclusive city?





PART 1 INTRODUCTION

PART 2 THEORETICAL FRAMEWORK

PART 3 VILLAGE DEVELOPMENT

PART 4 DEVELOPMENT PROPOSAL

PART 5 CONCLUSION

#3

PERSPECTIVES ON INFORMALITY



Introduction

The purpose of this literature review is to develop a multi layered lens for the observation of informal development in China. Informal urbanisation is not a singular development, but can be interpreted from different perspectives. This multilayered understanding of urbanization is well described in Friedman's book China's urban transition, in which he uses five dimensions,-administrative, economic, physical, sociocultural and political- to describe urbanization in China (Friedmann, 2005). Friedman deals with urbanization in general. This paper focusses on informal development in China specifically and uses concepts from research on informal development to describe informality in China. It is important to understand these different interpretations, because they shape the decisions that stakeholders make when intervening in informal settlements. The multilayered approach on informal development offers a framework to evaluate the influence on urban planning in informal development in the case of Shenzhen. In the first section the concept of informality will be shortly introduced referring to its origins and some commonly used institutional definitions. In the sections that follow, four perspectives on informal development will be shortly defined and then used to describe informality in Shenzhen. The paper will conclude with a conceptual overview of the relationship between formal and informal from the four different perspectives.

The concept of informality

The term informal sector was first used by Lewis in 1955, who used it to describe employment in the developing world(Lewis, 1955). Informal employment is that part of the economy that is not accounted for in national accounts. After its conception, informality has been applied not only to economics, but also to housing, culture and has become embedded into legal frameworks. Roy uses this broader perspective to define urban informality "an organizing logic, a system of norms that governs the process of urban informality itself (2005, p. 148). Although conceptualizations of the informal sector vary widely, they all share a common source in their emphasis on economic dualism, one economy derived from capitalist forms of production, other on a peasant system (Moser, 1978, p. 1052). Watson frames the discussion on informality as a 'conflict of rationalities' between the will to govern by the government and the will to survive by the local inhabitants(2009). UN Habitat also stresses the difference between formal and informal in the description of informality stating that the 'informal construction sector is primary characterized by self-help, and thus lack planning and design (Ramachandran, 2006). In reality, the formal and informal economy are not socially and spatially strictly segregated, but overlap, interact with each other. Because informality itself is not a singular development, the relation informality has with formality is also one that can be interpreted in multiple ways.

A poverty perspective

The poverty perspective assumes that informality is synonymous with the urban poor, the squatter settlements they inhabit and the labour intensive work they perform for their income (Moser, 1978, pp. 1051-1052). Whether this relation between poverty and informality is rightful remains under debate, as in many countries the share of taxes from informal businesses is much higher than from formal businesses(Mead & Morrisson, 1996, p. 1612). Wang argues that the emphasis on the negative aspects of unplanned development tend to ignore the interests of the local people living and working in these areas(2009, p. 958). This argument is further amplified by Moser who states that the usage of this perspective had led to much confusion among planners, since the relationship between income, housing and employment is not as straight forward as this perspective might suggest. The associative characteristics of the poverty perspective on informal development has a close relationship with Western ideas on urban planning. In the eyes of western planners, a good city is shaped by notions of aesthetics, efficiency and modernisation and this does not seem to be reflected

in the image of informal development(Watson, 2009, p. 2261). Davis draws a clear parallel between the problems of nineteenth century urbanisation of Europa and the ideas on twenty-first century urbanisation of China. The dramatic images of Europe's overcrowded and polluted cities is a picture that the Chinese government wants to prevent in her own cities. Sociologist of the Chicago school dismissed the communities of the urban poor in America as 'bastions of rural parochialism and traditionalism' and believed that these people could be integrated into the society by modernising them(Bayat, 1997, p. 60). In this view the social condition of slum dwellers is directly linked with spatial condition of the slum.

The influence on urban planning of this perspective is very strong, because this perspective has strongly resonates with the Chinese government. In official documents by the Shenzhen municipal government urban villages are related with overcrowding, cluttered and deteriorated material landscape, unhealthy living environment, security problems and social disorder (Liu, He, Wu, & Webster, 2010, p. 136). The informal character of urban villages does not correspondent with the global character that the government of Shenzhen would like to attract foreign investments. In the fierce regional competition for foreign investment from the global market, Shenzhen has initiated a development emphasis towards high-tech industry and a 'city beautification movement' (Ng & Tang, 2004, p. 188; Yu & Padua, 2007). Development in Shenzhen is driven by a notion of modernization and the creation of 'proper' communities living and working in proper urban environments(Watson, 2009, p. 2268). A campaign called 'clean, smooth, quiet' launched by the government of Shenzhen sounds strikingly familiar to the modern mandate of Corbusier: "space and light and order". The Western approach to slums that was promoted by the Chicago school seems to be adopted by the local government of Shenzhen.

In short, the poverty perspective on informal development is mainly an associative perspective, in which a lack of knowledge leads to generalisations about informal development. The perspective tends to overemphasize the negative aspects of informal development, while neglecting its role for the local users. The poverty perspective assumes that negative aspects that are related to informality will decrease if formal intervention increases and that informality is something to be taken away completely. The poverty perspective on informal development is dominant in the practice of urban planning by the municipal government of Shenzhen.

A legal perspective

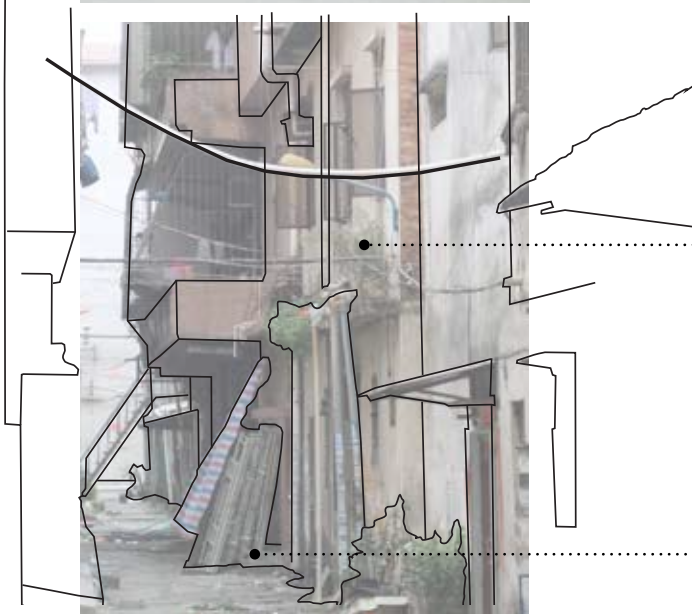
The legal perspective assumes that informality is a response to the formal state laws and regulations. Informal development does not comply with these rules and is thus seen as a response to the rigidity of the official policies (Moser, 1978, p. 205). From this perspective, urban informality is not an choice for the people, but rather unavoidable alternative to the formal constraints by the government (Bayat, 1997, p. 60). This perspective is different from the poverty perspective in the sense that it does not qualify informal development as something necessarily negative, but rather as something that is simply not allowed within the current legal system. This is especially relevant in countries where 'notions of legal and illegal constantly shift depending on which groups are exerting power at the time'(Watson, 2009, p. 2264). Although the legal perspective has no negative connotation, it is strongly influenced by other perspectives on informal development. Because of its apparent objectiveness this perspective is popular with international organisations like the United Nations.

The influence on urban planning from this perspective is very dependent on other perspectives, since legality any development can be illegal, depending on the local legal system. The unavoidable alternative for the floating population translates to the illegal squatting of land, the illegal use of public land or the illegal constructing of buildings. Fulong Wu draws a direct parallel between property right ambiguity and informality in the Chinese context. He states that informality is caused by four sources embedded into the Chinese legal

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A scene that could have been taken in many of the villages. The commercial activity in a street is all informally organized. The goods and parasols poor out over the streets. The buildings provide a chaotic backdrop to the scene. Smell of food and waste are everywhere.

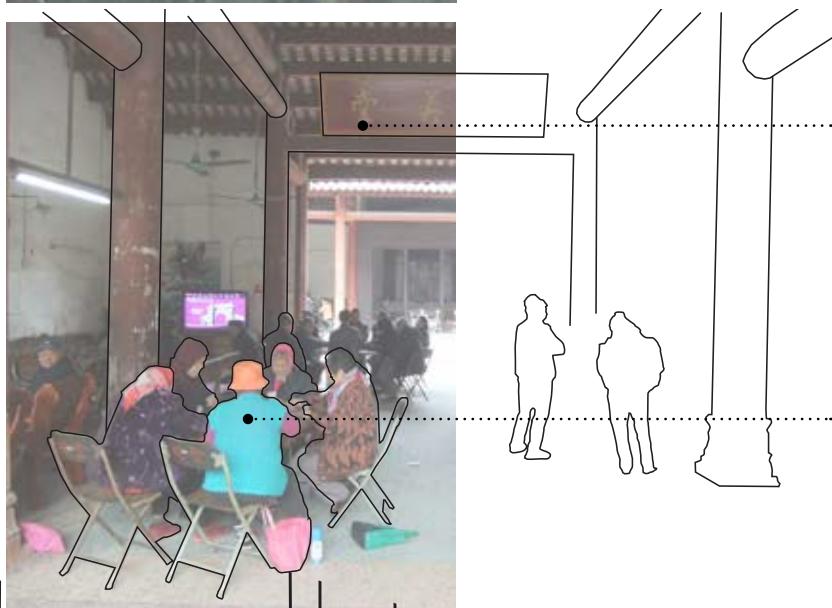


The smaller streets in the villages often are badly maintained. Individual buildings all have their own appearance. There is no coherence in the facades.



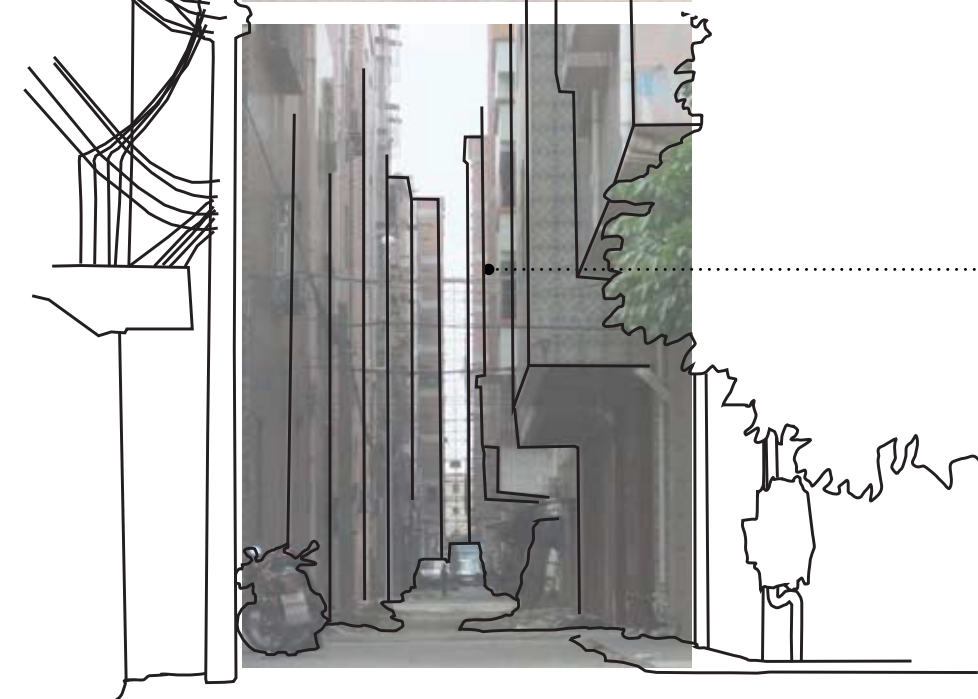
The streets have, almost without exception, concrete paving instead of dirt. The pavement is usually filled with trash and litter. It seems like no one takes responsibility to look after the public space.

The informal village represents a chaotic contrast to the formal buildings that align the streets. The buildings in the village are often not built according to the building regulations, which means the construction is not safe and there is fire hazard.



The historical building has cultural value to the local people. Some of the historic buildings, like this ancestrall hall can be 500 years old.

Elderly people gather in a public building to play cards and drink thee. The retirement age in China is one of the lowest in the world, which means that the elderly represent a large and very active group of Chinese society. The concept of a retirement home does not exist in China and elderly people are often taken care of by their children.



A typical section of the handshake buildings in the urban village. Because the buildings are so close to each other, there is little light penetrating to the groundfloor.

system: dualistic and fragmented landownership(1), lax land management and development control(2), lack of service provision(3) and marginal and ambiguous status of village governance(4)(2012, pp. 5,6). Because there is little profit margin in social housing it is unattractive to real estate developers to invest in low-rent housing (Liu et al., 2010, p. 137). The regulations that were put into place by the Shenzhen government in order to constrain development had little or opposite effects, and the government was unable to effectively manage the rules it laid out (Wang et al., 2009, p. 962). Song argues that the policies were ineffective for three main reasons (Song & Zenou, 2012, p. 497). The first reason is the underestimation of the demand for housing by migrants. This is supported by data released by the Shenzhen government that structurally underestimates the expected flow of migrants towards Shenzhen. Secondly, the Shenzhen government was also ineffective at the supply side. The municipal government had a lack of resources to relocate either the villagers or the migrants to social housing areas. A recent survey on social housing in Shenzhen shows that the residences that were realised housed mostly people of the middle-class and not the original inhabitants of the villages(Chan, 2004). Thirdly, the villagers resisted to redevelopment because it would dramatically lower their rental income.

To conclude, the second perspective assumes that informality is a response to state laws and regulations and emphasises the reactionary nature of informality. The Shenzhen government was unable or unwilling to supply in the housing demand for the migrants. Informal development acted as a reaction to the failure of the state. Although this perspective on informality moves away from a negative to an illegal point of view, it still states informality as something to be taken away completely or to be adopted to fit in the legal framework. A stronger, more comprehensive planning system will decrease informality, while a weaker planning system will lead to informality to fill in the gaps of formal planning.

A cultural perspective

The cultural perspective assumes that informality is a part of the culture and tradition of an area. Bayat states that many informal communities rely on their own local norms and rules to manage daily activities, like resolving disputes and establishing contracts (1997, p. 59). Like the legal perspective, this perspective also departs from the idea that informality supplies something that the formal state cannot deliver. The difference lies in the sense that the cultural perspective regards informality as something natural that cannot be captured by formal laws. Although local traditions and culture can be adopted by the formal institutions, like state ideologies and organized religion, the local practice of culture will always remain informal.

The influence on urban planning of this perspective might be underestimated, since the cultural perspective puts an emphasis on the local use of a place, rather than the physical elements that represent it. Like most informal settlements, the informal development in Shenzhen mainly house migrants, who have come from the countryside to the city. This is not only a physical transition, but also a cultural one. The migrants can no longer rely on their rural social networks, or perform the customs and rituals that they did in their home village. The informal developments of urban villages create an environment where villagers and migrants can gradually shift from an rural village to an urban community (Liu et al., 2010, p. 136). The social and cultural structure in these urban villages is engraved in the rural village-style organization and traditions that have managed these communities for hundreds of years. These structures operate independently, without intervention or regulation from the state (Liu et al., 2010, p. 138). Based on the ideas of the Chicago school, the idea prevailed that cultures of migrant minorities would assimilate into society. This idea has been rejected by most scholars now and replaced with the idea that the city actually draws its identity from the multiple cultures that inhabit the city (Watson, 2009, p. 2264). With this view the arrival of rural migrants and their informal practice of culture, dramatically changes the way the formal city is perceived.

In short, the third perspective assumes that informality is something natural to all people and communities. To be clear, informality is something valuable to each community. Together, the cultures of the different migrant groups shape the culture of the city. This migrant groups shape the culture of the city. This perspective puts an emphasis on local traditions and customs that are assumed to be a constant factor in the daily lives of people, not dependant on formal

planning. Many scholars now regard the informal communities in the urban villages as essential units of social organisation for the daily life of the migrants.

A dualistic perspective

The dualistic perspective assumes that informality is a natural counterpart to formality and that both worlds are in co-existence. Saunders argues that informal settlements are places of transformation, turning rural arrivals into urbanites(2011, p. 11). This idea about informality is supported by Dovey, who emphasises the need to rethink informality simply as a reaction to legal frameworks, but as an equal component of an integrated system(2010, p. 4). This perspectives does not depart from the notion that either formal or informal planning has failed, but rather that they should work in balance. The specific qualities of informality in this regard are that informality is spontaneous, sporadic, temporary and self-helped process (Zhang, 2009, p. 205). This perspective of informality is shared by Roy, who states “informal economy is the people’s spontaneous and creative response to the state’s incapacity to satisfy the basic needs of the impoverished masses” (2005, p. 148).

The influence on urban planning from this perspective has had a relatively weak role so far. The dualistic perspective is especially relevant in the case of Shenzhen, because of different ownership condition between urban and rural land in China (Liu et al., 2010, p. 138). The self-management of the rural villages, meant that these village could react must sooner and more flexible to the changing conditions of the city. Informal development in Shenzhen preceded the development of the formal city. Many parts of the city that the government intended to urbanise, where already fully developed urban areas with shops, facilities and infrastructure. According to Ya Ping Wang Shenzhen can be understood as a dual-track urbanization between informal rural villages and formal urban districts, which should both be considered to come to an integrated and diversified modern city. Ping Wang further argues that the urban villages in Shenzhen are an important step in the process of urbanization: “it signifies the great creativity of the rural population in their adaptation to modern life.”(2009, p. 970) When intervening in these informal developments, the value of these villages, their informality and their role for the formal city should be taken under closer consideration. Saunders emphasized that “the larger logic of the city is in escapable: new people create new economies, and those economies develop best when those people, no matter how poor, are able to stage their arrival in an organic, self-generated, bottom-up fashion.”(2011, p. 63)

To conclude, the fourth perspective assumes that informality is a natural counterpart to formality. This perspective puts an emphasis on the dualistic features of informality in relationship to formality. Informality is regarded as unavoidable and an essential step in the process or urbanisation. Informal and formal both have qualities that should support each other. This support or integration between the two systems is essentials for a good functioning city.

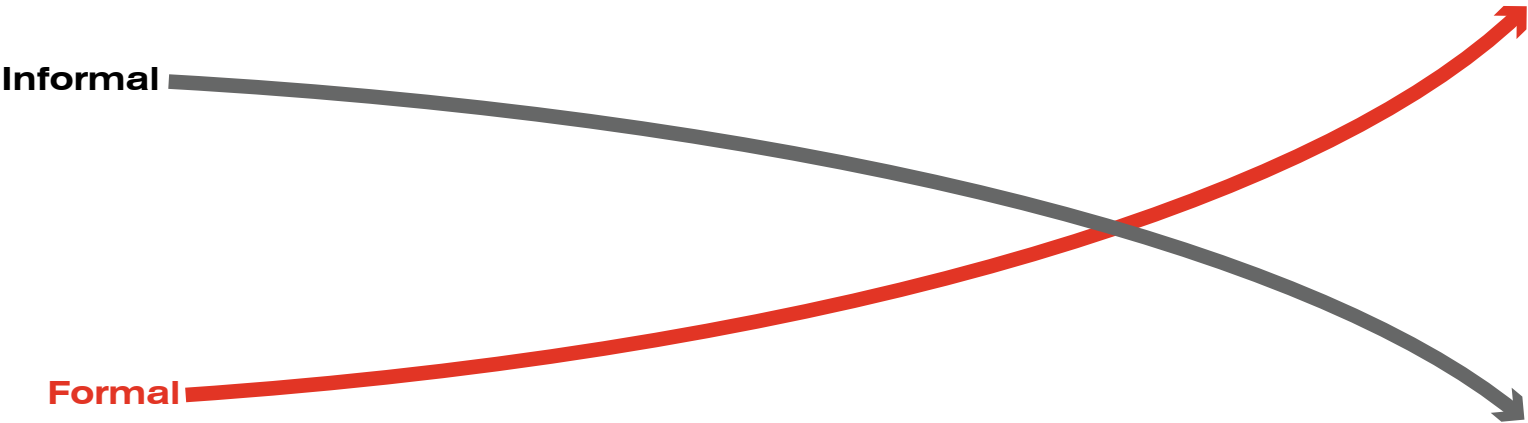
Conclusion

This chapter aims to answer the question what informal development is and how different understandings on informal development influence urban planning. Informal development is not a singular development but can be understood from multiple perspectives that each emphasize a particular aspect of informality. The deployment of a perspective is dependant of the actor. The different perspectives and their influence on urban planning can be reduced to a scheme that shows the different relationships between formal planning and informality. The poverty perspective influences the relation between formal and informal in urban planning in a negative way, polarizing the relation between formal and informal development. The influence of the legal perspective on urban planning is very rigid, as development can be either formal or informal, leaving no room for interpretation. The cultural perspective detaches the link between formal an informal in urban planning, seeing them as distinctly separate. The influence of the dualistic perspective on the relation between formal and informal in urban planning is more integrative, assessing that the two development modes are positively connected. The different perspectives on informal development have a direct relationship with decisions made by the involved stakeholders. The next chapter will describe more precisely what decisions the different stakeholders make in the process of informal development.

END OF CHAPTER

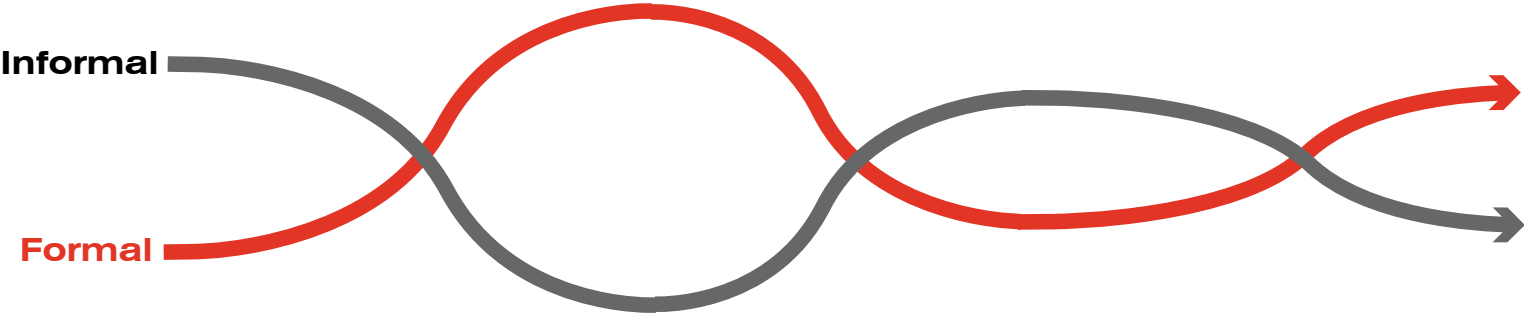
Relation formal-informal

Informal development is not a singular development but can be understood from multiple perspectives that each emphasizes a particular aspect of informality. The four dimensions of informal development – poverty, legal, cultural, dualistic– view the relation between formal and informal differently, which means that the intended integration between formal and informal is regarded differently.



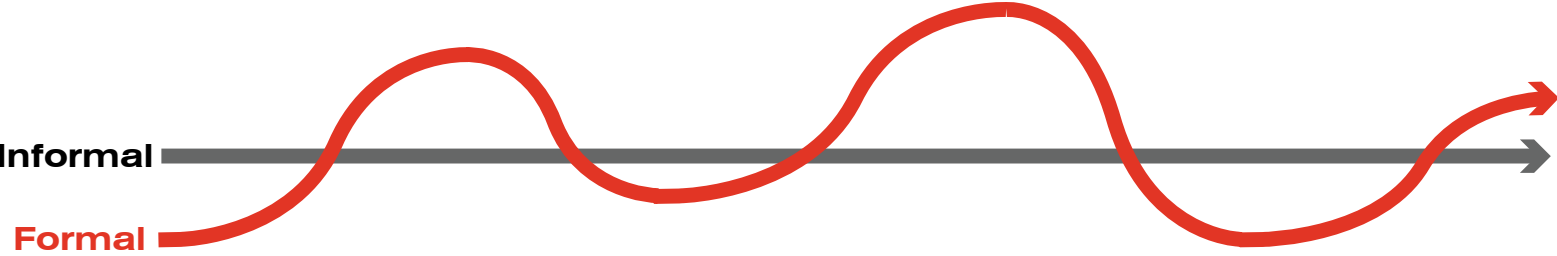
POVERTY
PERSPECTIVE

“Informality is something bad, that can be resolved trough an increase of formal planning”



LEGAL
PERSPECTIVE

“Informality is a reaction to the failures in the formal planning”



CULTURAL
PERSPECTIVE

“Informality is a natural part of daily live, seperated from the formal planning process”



DUALISTIC
PERSPECTIVE

“Informality always acts in co-existence with formality and precedes formal planning”

#4

DRIVERS OF INFORMAL DEVELOPMENT



Introduction

The process of informal development is governed through the mediation between the main stakeholders that are involved. These stakeholders – the municipal government, the landlords, the floating population and the real estate developers – base their decisions on a particular perspective on informal development. An understanding of the decisions in the process will enable a more precise assessment of the role of the informally developed village in the city of Shenzhen. The purpose of this stakeholder analysis is to establish an informative framework on the role of informal development in China's migrant cities. This chapter will start with a small elaboration of some of the conditions that set the stage for informal development in Shenzhen. Each stakeholder will be shortly introduced to come to an understanding of their interests in the informal development.

Conditions for development

Rural communities are the main governing principle of the informally developed villages. All land in China is either owned by the state or by rural communes who are allowed to use the land for their own need in housing, agriculture and supporting industries. In the time of Mao these rural communes became the basis of the communist socio-economic system. The villages were transformed in work-units, controlling both production and consumption of the village. According to Hao the legal right of the villagers to develop their own housing lies at the core of economic function they perform. Because the land of the villages lies outside the official government's control, the government cannot fully enforce urban planning regulations in these villages. Especially because the government has no control over the physical development, they also cannot control the flow of migrants that come to live in these villages. The hukou system discussed earlier prevents access for the migrants to urban facilities, thereby completely cutting them off from any formal connection to the city (P. Hao, Sliuzas, & Geertman, 2011, p. 215). Residence in China is managed by the residence permit system known as the Hukou system. The official policy of the central Chinese government till 1978 was to prevent migration from the countryside to the city. Every citizen has a residents permit in the village or city that they were born in. This permit or hukou, gives access to public facilities and welfare only in the place of birth (Lin, 2001, p. 389). The national Chinese government feared that without the restrictive system in place the national food supply would be threatened and big Chinese cities would face the same problems as Western cities. As China opened up in 1978 and demand for labour in the big coastal cities grew, the hukou system was relaxed in the 1990's, allowing migrants to obtain a temporary urban residence permit. Rural China is generally very poor and when these people move to the city, they do not have the money to afford a residence in the private real-estate market. The profit margins for social housing are low to none and are therefore not attractive for private real estate developers. The topic of village governance and hukou forms an important context for this research, but for the purpose of limiting the complexity of the informal development of villages, this research assumes that the governing system of the villages and the hukou system will remain unchanged. I would like to refer here to the recommendations at the end of this research for some further elaboration on this topic.

Since 1978 economic growth combined with demographic growth has been enormous in China. These two types of growth happen in parallel, without being able to tell which one causes the other. This stable condition of enormous growth is illustrated by the relatively steady number of GDP growth in China and increase in migrant population over the last years. The rising economic and demographic growth excerpts a huge pressure on the housing demand. The physical growth of villages is fueled by the demographic and economic growth. Shenzhen is faced with a constant supply of new migrant workers from outside the pearl river delta region. Although the migration remains enormous, in recent years the net migration of workers towards the region has decreased. This decrease is the result of two trends. The first trend is the increasing living expenses in the city, which make it difficult for migrants to earn enough money to save and send back to their families. The second trend is the improving conditions of cities in the interior of China. Many migrants decide to move back to their home province to be closer to their family. Land prices are directly affected by the huge demographic and economic pressure on the land. The demand for land results in massive physical growth of the cities. The growth of the city drives up land prices both in the city and on the edge of the city. In turn, the land prices are closely related to

the most important planning tool the Shenzhen municipal government has, the planning of infrastructure. For industrial functions outside the Special Economic Zone (SEZ) access to the Shenzhen-Guangzhou superhighway is very important. For commercial functions inside the SEZ access to the metro network is very important. My project assumes that the urban growth and rise in land prices (in greater or lesser degree) will continue to define the urbanization of the Pearl River Delta in the future.

Regulatory patchwork

A range of regulations has been developed by the local government to control the informal development of villages in Shenzhen. The Shenzhen Special Economic Zone (SEZ) government itself was established in 1978 after a formal decision of the Chinese central government. The Shenzhen SEZ expected the housing development in the villages and put in regulations that linked maximum floor space to families. In a reaction to these regulations the extended families in Shenzhen started subdividing, so more floor space could be developed (Wang et al., 2009, p. 960). When the Shenzhen government adopted new regulations in 1986 that linked floor space to the number of villagers, large numbers of villagers feared the further tightening of regulations, and quickened the construction of more illegal housing. That reaction should be seen in the light of changes in regulations by the central government that in 1985 allowed migrants to register as temporary workers in big cities. The maoist logic of the hukou system, linking peasants to the land, was no longer viable in the highly urbanized SEZ area. Villagers in urbanized villages got an urban hukou, giving them formal access to civic functions. In 1993 the Shenzhen government relinked floor space to households again, with meant that the household would do anything to maximize the floor space on their land. The height and density of buildings in urban villages increased dramatically (Wang et al., 2009, p. 962). When in 2001 the SEZ government realized that their regulations had the opposite effect a policy of penalties for illegal housing was issued. Because the penalties per building were much lower than the rent that the villager could ask from the migrants, another wave of illegal housing was initiated.

Formal interventions from the government in or around the villages also influence the informal development. A broad overview of the different types of interventions that the government uses will be given in chapter 8. Formal interventions can increase the accessibility of the village, or increase the flow of people through the area. Employment that rises as a consequence of the formal interventions, can also impact the village. The formal interventions that the government uses are mainly directed at the industrial growth and high-end uses. Broad city boulevards and the metro system connect the different amenities to the gated middle-class high-rise blocks. These amenities, like school, universities and hospitals, are inaccessible to the migrant population because of the restriction from the hukou system. Other amenities like shopping malls are accessible, but largely unaffordable to the migrants. For a multitude of reasons, many of the high-end functions are gated and their entrances follow the logic of the car-orientated city boulevards, thus becoming disconnected from the slow traffic system. Because the inhabitants of the village have no legal position in the city, the formal interventions are not accessible to the floating population. A major consequence of this policy is the huge lack in social housing.

Closed compounds

Industrial compounds make up a large part of the urban fabric. The urban fabric of these compounds is characterized by closed industrial facilities and the amenities that support the industry. Large traffic arteries connect the industries with the air- and seaports that allow for the import and export of goods. The industrial compounds themselves are completely self-sufficient in their day to day functioning. These factories are very dependent on cheap low skilled labor and therefore supply their workers a place to stay within the own compound. Workers are being supplied with a dorm room, a cafeteria, and leisure facilities all within the compound. Although the workers are being paid little salary, it is many times higher than they could earn back in their home village. In recent years salaries have been rising, especially in Shenzhen, but this is not necessarily a good thing. Many factories move out towards regions where labour costs are still low. The way these factories work is somehow similar to the Chinese danwei system, in which production units were responsible for both the production and consumption of an urban district. It is interesting to make a parallel with the large industrial compounds that in a way compete with the urban villages for industrial

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Changing regulations

1950 Landreform creates a difference between urban and rural land. Urban land was nationalized and rural land was divided between the local villagers, until collective ownership was established.

1978 Establishment of Special Economic Zone. *Development of single- or two-storey buildings*

1982 The maximum residential land area for each household was stipulated at 150 m2, and the house footprint for each household should be no more than 80 m2. *Subdivision of extended families, so more courtyards would be allowed.*

1986 A limit was set for the height of private houses: No houses should be built over three storeys. The average construction floor space should be under 40 square metres per person. The 80 square metres of land permitted for building inside the courtyard should be the projected area of the largest part of the building on the ground. *Strict laws accelerated development.*

1987 National land reform. Makes urban land use a commodity that can be traded on the market.

1993 The standard size of a new yard was reduced from 150–100 square metres per household. The permitted housing construction floor space was also capped. Each household was allowed to build up to 480 square metres of construction floor space (irrespective of the size of the household). *Buildings were developed in higher densities/building height.*

1993 When the two suburban districts were created out of the Bao'an county and became formally part of Shenzhen, the municipal government began to standardize land allocation for villages. Apart from land for family housing, each village was also allowed to maintain some land for collective purposes.

1995 To regain control over the housing development, all approval for any new buildings was halted. *This freeze led to the development of unauthorized housing on a unprecedented scale.*

2001 Penalty system for illegal housing in order to legalize unauthorized buildings. *Because penalties were low in comparison with rent, another wave of illegal housing happened.*

2005 All original villagers get an urban hukou



Schedules keep track of the daily production. If the targets for that day are not met, overtime is mandatory

Factory girls behind the assembly line. Most girls are just teenagers and have received only primary school education. The factory employees work, eat and sleep on the factory compound. Like other teenagers elsewhere the shopping mall is the most important place for leisure.



Typical scene from factory area. Long, strait roads are ment for acces by trucks. The factory buildings are placed behind each other in simple rows without any regard of the demands of the factory workers



New residential highrise buildings are being constructed. The infrastructure is geared towards motorized traffic along wide arteries.



The village is under heavy construction. All buildings comply with the height limit of 12 floors. Older buildings that were constructed under different planning regulations have a different height.

output. The large factories operate though a very inclusive model, in which the migrant eats, sleeps and works all in the same compound. In the urban village, the migrant also eat, sleeps and works in the same village, but instead of staying in a single compound, the functions in the village are divided between the core and peripheral areas of the village.

Optimizing returns

The main source of income for the villagers used to be agriculture, in the form of rice paddies, fish- and duck ponds, tree plantations and the cultivation of vegetables. As discussed above, the origin of the urban villages lies in the supply of affordable housing to the migrants. Agricultural land was converted to urban use, thereby giving up their existence as farmers and becoming landlords. Over time, many of the villages have diversified their program in order maximize the returns from investment. The main form of income diversification is the development of industrial use. The small scale factories supply many of the goods that are needed for the migrants themselves (such as bedframes, motorbike repair, etc), but also directly produce goods for export. The other form of income diversification is the development of commercial program. The commercial program can vary between small shops at the groundfloor of other residential buildings in the village, to bigger shopping malls. The final possibility of income diversification is the development of public program such as schools, medical facilities and parks.

The informal program is very dependent on the market demand and neighboring developments of the formal city. If demand for housing is relatively low, the villagers are directed towards the development of factories. If demand for housing increases, land-extensive program such as industry and agriculture, will be redeveloped into other program. If the formal city takes over more of the public and commercial functions, the villagers will decide to focus more on housing. By far, the most profitable real estate to develop are high income residential apartments. The government is aware of the high returns in this sector and thus restricts the development of the buildings in their land-use plan. Because these buildings attract wealthier people with an urban hukou, the government is more able to control this development that other forms of real estate that relates more to the migrants.

The cultural attachment of the original villagers to their village is also a factor in the development of the village. It is expected that financial motives for development are in some way balanced out by social motives. By these social motives I refer to the longing for community, attractive public space. In the consideration by villagers to develop their land these social motives play little or no role. This has multiple reasons. The first reason is that often the villagers have already moved out of the village and have lost spatial and emotional connection with the village. The second reason concerns the transferal of village land to developers. The compensation on land for the villagers is so high that many of them will become instant millionaires and are able to buy apartments in the city centre. The third reason is that because the land condition is so volatile and there is no slow-process of improvement of the local public space, the public space in the villages in generally of very poor conditions, simply providing the essential functions.

Migrants motivation

The motivation of the floating population to live and work in the village is multidimensional. As stated before the migrants are forced to live in the urban villages because the government and developers do not provide housing or other facilities for the migrants. There is still some margin for the migrants to choose from. They can stay with a family member, find a job in a compound factory or find a place in the village. Cheap housing is the main motivation for migrants to come to the urban village. The rent in the urban villages is relatively low. It is very easy for migrants to find a room to stay or to find a space to open a shop. Although the ownership position of the villagers is strong, the development rights are easily transferable. This means that future of property rights is insecure and causes the villagers to avoid long-term investments in their village (P. Hao et al., 2011, p. 216). The spending pattern of migrants is very different from any normal citizen in the city. In the case of China, migrants transfer as much as half their income back to their home village. In general, the rent and essential living costs are subtracted from their income and everything that is send back. This means also the migrants spend little or no money in their own living environment. I would argue that this is one of most important reasons why the villages look like poor slums; it is because their inhabitants choose to spend their money somewhere else.

The floating population is not a uniform group, but consists of different kinds of migrants. It is possible to divide the migrant group along two main axes, by their home province and by their length of their stay in the city. The main groups of migrants to arrive in Shenzhen are from Guangdong province itself,

and further from Hubei, Hunan, Yunnan and Sichuan province. From a western perspective it is important to realize that the vast country of China is probably better to compare with the continent of Europe than with a single state in the European continent. Like Europeans feel attached to their home country, Chinese

feel attached to their home province. In addition, each province has its own regional language. For example, in Guangdong province, the local farmers speak Mandarin, the language of the state and also Cantonese, the language of their home region. The parallel is not completely valid, but it helps to illustrate the regional difference between the migrants. When migrants meet each other in the city, one of the first questions they will ask each other is what province they are from. Like migrants in other countries, migrants sharing a common home province group together in specific neighborhoods.

The social network inside the village is a very important mechanism through which migrants can obtain information about job opportunities and availability of cheap housing, but also leisure and cultural activities. The length of stay in the city differs for each migrant and it represents their different levels of integration in the city. Migrants that are new to the city have little skills and a very small network. As migrants stay in the city longer, their skills sets will evolve and their networks will be larger. This is of course not a natural process, but a process that is shaped by the conditions in the city. In some situations the city might work against the migrants and prevent them from developing skills and networks, while in other situations the city might be very receptive to migrants, helping them with education, job searching and finding affordable residence. In general, migrants that have been in the city longer have higher wages, which also means they can afford to life in more expensive parts of the city.

The arrival city is a term coined by Douglas Saunders. In a large number of study cases he describes the interplay between the migrant communities in the city, the migrants and their rural home village. The move to the city is not a single event, but happens in stages. People, information and money are sent back and forward between the city and the rural village. He emphasizes the transitional role of parts of the city where migrants live. Here, the city changes, but also the people go through a transition. The success of an arrival city, and thereby the individual success of its inhabitants, depends on many different factors. The affordable housing in the village is already mentioned as in important factor for the success of the migrants. Another, perhaps equally important factor is the availability of low skill jobs in and around the village. Because of the process of rural industrialization, as mentioned in the introduction, industrial employment is easy to find in the vicinity of the village. The village is also an easy place to start a business. The enormous density of the village is an opportunity for many migrants to earn an income from the living expenses of other migrants. Not only are their businesses in the buildings of the villages, but also street hawkers selling goods in the street. Another very important factor is indeed the local network of people that will help the migrant in finding housing, jobs, etc.

Final sale of land

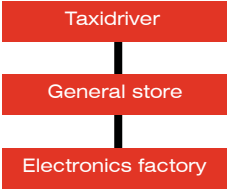
The final sale of land is result of a negotiation between the villagers and the local government about the amount of compensation to be paid. When the land is sold, the villagers lose their monthly rental income from the residential areas on the land and the revenue from the local industries on the land. This negotiation is obviously strongly determined by the land price, which is in turn strongly influenced by infrastructure. The Chinese law is very strict about the amount of compensation to be paid to the villagers. Compensations vary according to land use and floor space, in which agricultural land is the cheapest and residential use the most expensive. The amount of possible future compensation is an important reason why agricultural land is transformed to other uses and why residential buildings get quick additions when sale of the land draws closer. Compensation varies between one million and 10 million yuan per family, making them instant millionaires. Many of them move to the centre of Shenzhen or even to Hong Kong.

Nailhouses are one of the possible effects of the negotiation process. A nail house is a building that remains standing in a construction area because the owners of the house were not satisfied with the amount of compensation and therefore refused to leave. Stories of these people often make it to the international press, especially when in the faced with demolition, the owners decide to commit suicide. It is important to understand that these nail houses are exceptions, and that most of the villagers sell their land to the government at some point.

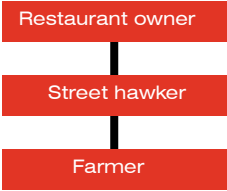
No provisions for migrants are made when the land is sold and the buildings demolished. The villagers often get the possibility to move into one of the new apartment buildings if they wish to stay in the area. The villagers often choose to live in these new apartment buildings, because it means that they can maintain their social network with their fellow villagers. The issue of money is less important here, because the villagers are very wealthy at this point. No provisions are made for the migrants, of whom it is expected to move to another village or go back to their hometown. The developments that replace the village have no room for the informal activities of the migrants

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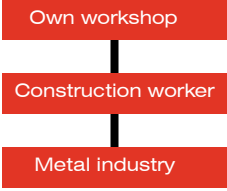
Transition of migrants



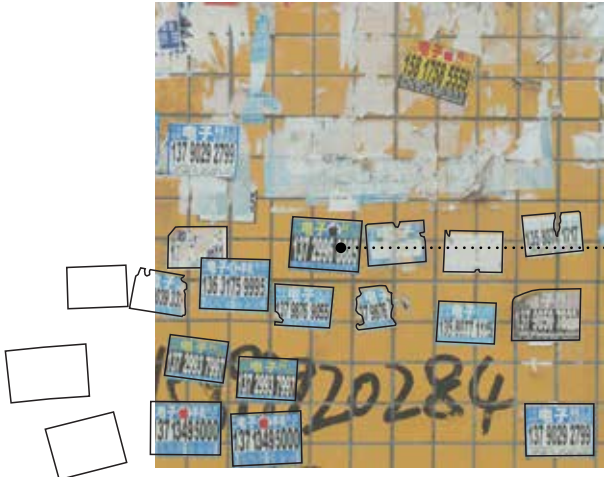
The fieldwork in Guangming revealed many cases of people in transition. One example is of a migrant arriving in Guangming little over a decade ago. He started working in a factory for the first years of his arrival. When he had saved enough money, he was able to open a small groceryshop in one of the urban villages. Business was good and he was able to hire some employees. After another period of saving, he was able to buy his own car and work as an illegal taxi driver.



Another example of the upgrading process is of a farmer from Guangdong province. He moved to Shenzhen and continued working as a farmer. With little investment he was able to open his own foodstand, selling the locally produced food. After a few years you might have enough money saved to start your own business in on the villages.



Most of the migrants begin with working in one of the factories. The work in the factories is numbing and most people seek other employment opportunities. Small businesses are eager to hire people with usefull skills that they have learned in the factory or elsewhere. From a place is the village the migrant can build up his network and eventually start up his own workshop.



Without official registration the business in the villages operate through more informal means. Walls along the busiest parts of the village are filled with telephone numbers. Calling these numbers will get you access to the varies activities in the village. These activities include renting appartments, prostitution, construction and plumbing businesses.



Social networking is a very important part of the socio-economic upgrading process of migrants. Inside the colde core, space can easily be encriched for events like this dinner.



Encroachment of the street can also fulfill purely economic means, like in the case of these streethawkers. The people sell oranges that have been produced locally. Startring up such a busieness requires little investement and thus provides an easy entree for new migrants.



The small units of the urban village are perfectly suitable for businesses like this metal workshop. Migrants take their skills, that they have learned in a factory, and use them to open their own business. Opening such a business requires savings and is thus only possible for migrants that have setteled in the area for a longer period.



Businesses do not limit themselves to the industrial sector. Each village has plenty of other business that are supportive of the other activties. Examples of other business are barbershops, general stores, second-hand telephone business, clothing stores, etc.

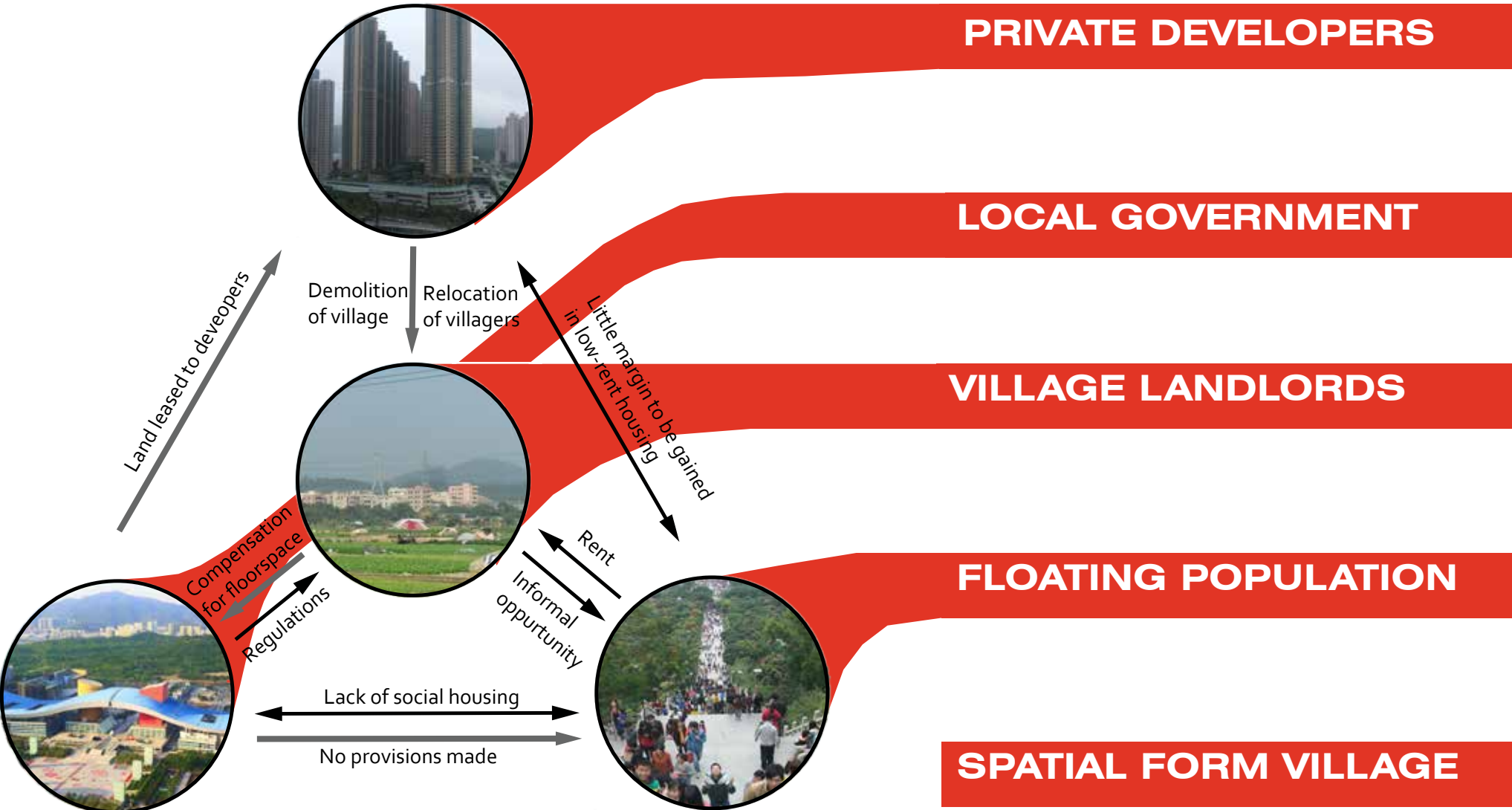
Conclusion

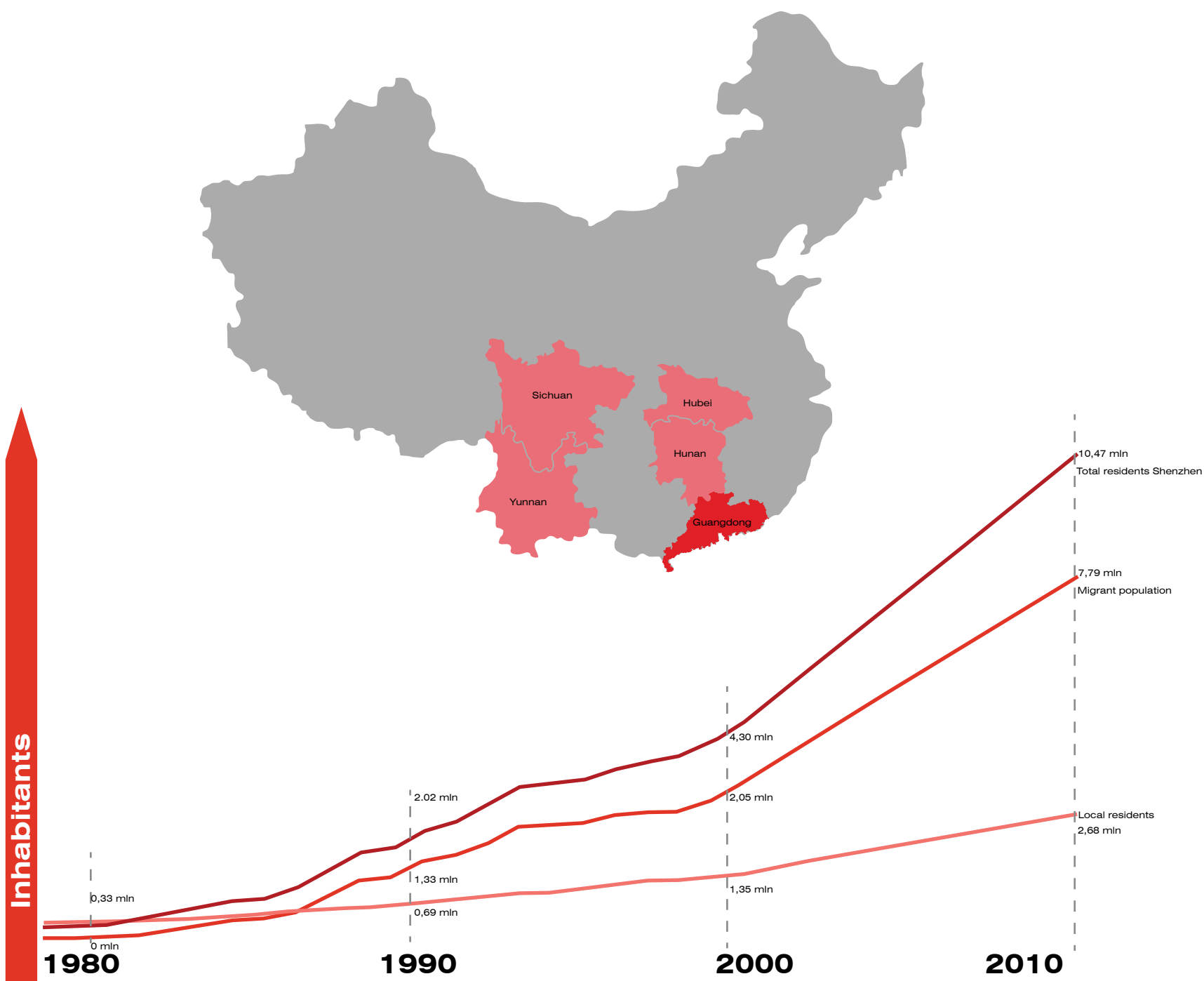
The development of the village cannot be understood only as the physical transition from village to urban district, but also has to be understood as the institutional change of the an agricultural village to an urban district and the social change of farmers to urbanites. The process of informal development in Shenzhen is strongly influenced by historical conditions of land ownership and economic growth. The arrival of migrants to the city creates a variety of demands for a successful integration into the city. The informal development process is the dual transformation of rural land to city and of farmers to urbanites. Change in the physical shape of the urban landscape and change is the societal, economic and cultural features of the people should support each other. The floating population is the main user of the village and therefore the informal development of the villages is geared towards many of the needs of the migrants. The landlords try to optimize their returns, based on the demands of the migrants. Removal of the village and its informal functions greatly reduces the integrative capabilities of the city. The informal city of the urban village plays a central role in the current economic system because it mediates between the industrial character and the high-end character of the city of Shenzhen. The physical development and the socio-economic profile of the village are linked. The next chapter will go will investigate the role between physical form and socio-economic profile further, in order to establish a framework for the assessment of informal development.

END OF CHAPTER

Changing role of village

The role of the village for the different stakeholders changes. The changing economic profile of the village triggers spatial transformations of the village. The changing physical conditions of the village demand different organisational structures within the village. Together, the transformation of the economic profile, the morphological structure and the organizational form, enable the slow socio-economic transformation of the rural migrants into more skilled and more adaptable urbanites.





Legally, the village transforms from a legal development to a more and more illegal development.

Migrants work in factories

Villages lie on peripheral land uninteresting for development

Villages lie on expensive land, interesting for development

High-end development for large financial profit

Financially, the village transforms from a peripheral area to a central location suitable for commercial real estate development

Government has little role in the governance of villages

Villages are nice solution to housing problem

Villages represent scars in the city fabric

When bought up, the government can finally have a say in the development

Institutionally, the village committee transforms from a rural production unit to a committee of entrepreneurs and landlords

Farmers on their own land

Manager of housing, factories and agriculture

Landlords or residential core of village

Rich middle class from selling the land of their village

Economically, the village transforms from agricultural production towards industrial production and finally service economy

Migrants arrive in city and find initial job in large factories

Migrants use new skills and network to find a job in the village

Migrants use savings to open up business in village

Urbanites

Spatially, the urban village transforms from a village to an urban neighborhood

Village

The development of the spatial form of the village is the central topic of part 3 of this research

Urban neighborhood

#5

MODELS FOR INFORMAL DEVELOPMENT



Introduction

The purpose of this literature review is to develop a normative framework for the assessment of informal development in Shenzhen. This chapter will use three theories on development, arguing that the interplay of the different stakeholders has a certain path dependency. The three theories that will be introduced all have a different scope. From specific to general, the three scopes discussed in this chapter are villages in Shenzhen, informal development and resilience. These three theories on development offer a normative framework for the evaluation of informal developments in Shenzhen.

Village development

Pu Hao states that “the evolution of urban villages is a result of the natural and logical response of the indigenous village population and the rural migrants in facing rapid economic development and social transition”. Villages that were once completely rural, become encroached by the city, and finally become the central places of cities. Pu Hao sheds more light on the development process of these villages. He defines three different stages in the development process of urban villages (P. Hao, Sliuzas, & Geertman, 2011; P. U. Hao, Geertman, Hooimeijer, & Sliuzas, 2012). The first type is expansion, in which the abundant agricultural land is developed as housing areas. The second type is densification. After the farmland is fully occupied, new houses are constructed within the village on open spaces that are left. The third type is intensification. After all available land is used, both on the rural and urban land, floors are added to the existing buildings, thereby increasing the density.

Over time, the three different stages of development shift. In the early stages of development expansion of village is the most common form of growth. After that densification becomes the dominant form of growth. Finally, intensification is the main form of growth in the village. This sequence of development does not happen randomly across the territory, but manifests itself clearly in a direction from the centre towards the periphery. So, when the villages in city centre are growing through intensification, the villages in the periphery might still grow through densification or expansion. The relative location of the informal development near to centralities, greatly influences the socio-economic profile of the village. The land is more expensive, which drives up density, but also more desirable for people working in the nearby centralities.

Informal development

Kim Dovey has done extensive research on the morphology of informal settlements. Dovey defines three kind of informal growth (Dovey & King, 2011, p. 13). The first type of growth is *settling*, which is constructing housing on unclaimed land so without any legal transaction. The second type of growth is *inserting*, which means constructing in leftover fragments of urban space. The third type of informal growth is *attaching*, which means that housing is constructed onto formal urban structures. These three kinds of informal growth can be arranged in order of expensiveness. Settling is the easiest way to claim a living space. Inserting deals with an existing urban fabric, but because buildings are constructed onto free land, this kind of informal growth is still relatively cheap. The most difficult kind of informal growth is attaching. The owners of the building must agree on the expansion and the structural integrity of the existing building needs to be taken into account. Because of the increasing difficulty in informal growth, a more difficult kind of growth will only take place if all other cheaper opportunities have been used.

The informal growth that describes a general pattern can be related to

the specific condition of Shenzhen. In the three development stages of the urban village as discussed above, each stage represents at different type of informal development. The first *expansion* phase correlates with the growth pattern of *settling*. The houses are simply constructed on unclaimed rural land. It can be argued whether this development is truly informal because the rural land is in communal ownership. The second *densification* phase correlates with the growth pattern of *insertion*. The houses are constructed into fragments of public space. Again, it can be argued whether the development is informal since the village land belongs to the villagers. The third *intensification* phase correlates with the growth pattern of *attaching*. The houses are constructed on top of existing houses as story after story is added to the building.

The three types of growth that are described both for informality in general and villages in Shenzhen specifically, are related to a larger system of growth, conservation, release and re-organization. According to Dovey resilience theory as part of a complex adaptive system offers a framework to understand the informal development process (Dovey, 2010, p. 7). In resilience theory systems go through phases of growth, conservation, release and re-organization (Pendall, Foster, & Cowell, 2010, p. 76). In the next section the development theory of resilience will be introduced as a normative model to evaluate informal developments.

Urban development

The concept of resilience has undergone a slow integration into urban planning over the last years. Resilience started out as a concept used in ecological studies, where it described the qualities of a system to absorb external disturbances (Tuna Tasan Kok, 2012, p. 10). Social sciences began using the term in order to describe not only nature, but the ability to withstand impact without being permanently deformed for any self-organizing system. Resilience is used to describe the “relationship between capacity, diversity and stability in humans societies” (Tuna Tasan Kok, 2012, p. 12). Hudson defines a resilient system as “an adaptive system that adjusts and responds in ways that do damage or jeopardize effective functioning, remaining on an existing developmental trajectory or making the transition to a new one”.

According to resilience theory there are four phases in the development of urban areas. The initial (re)-organization phase is a turbulent and creative period in which a new mode of production is made available. This opportunity may arise through new technology, shifts in government policy or other emerging possibilities. In the growth phase that follows, the urban area takes the opportunity to exploit this new mode of production. As returns on investment increase, the growth gets accelerated. The conservation phase signifies a moment where gains of the new mode of production are balanced by the risk of new structural changes. In the phase the urban area strengthened and maintains its existing structure. During release phase external forces push the system over a threshold that leads to the collapse of the system. This release is often caused by a trigger event such as elections, economic crisis or natural disaster.

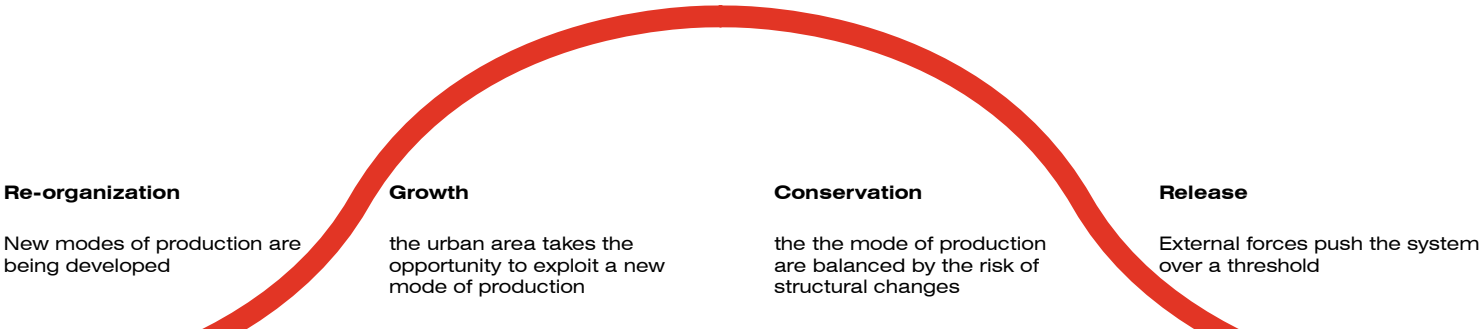
Conclusion

This chapter aims to understand the relation between physical form and socio-economic profile of informal development. From the analysis done on different development models it has become clear that there is a certain optimum when talking about economic opportunity. My project is about sustaining this economic opportunity as an essential part of the cities functioning and changing the existing path dependency of villages that leads towards less economic opportunity and eventually demolition. In the next chapter of this research I will use this framework to describe and assess the informal development in Shenzhen.

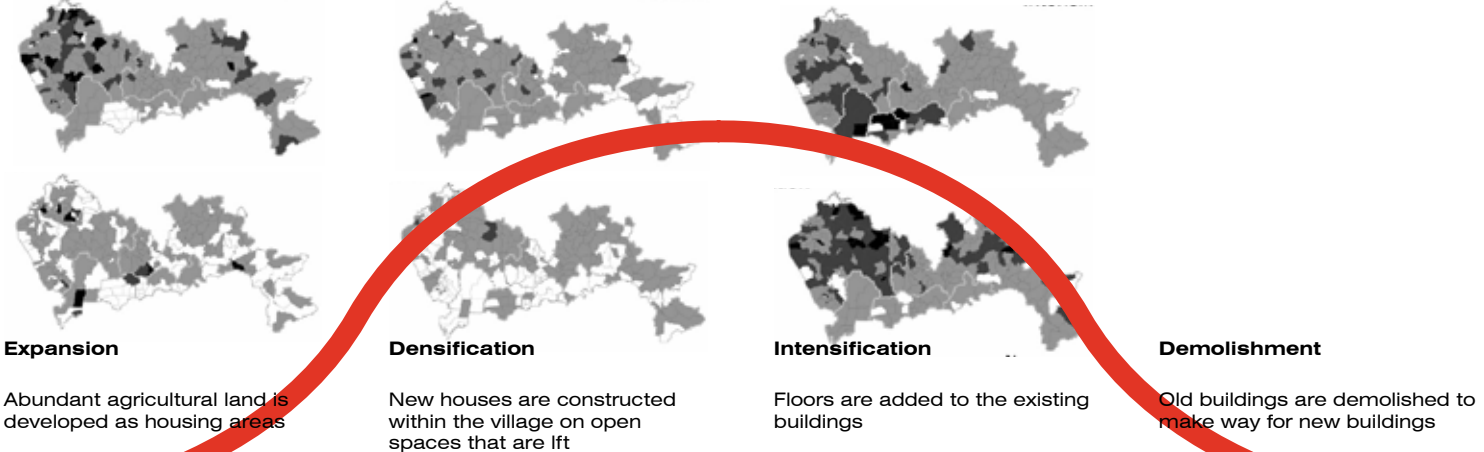
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Modelling development

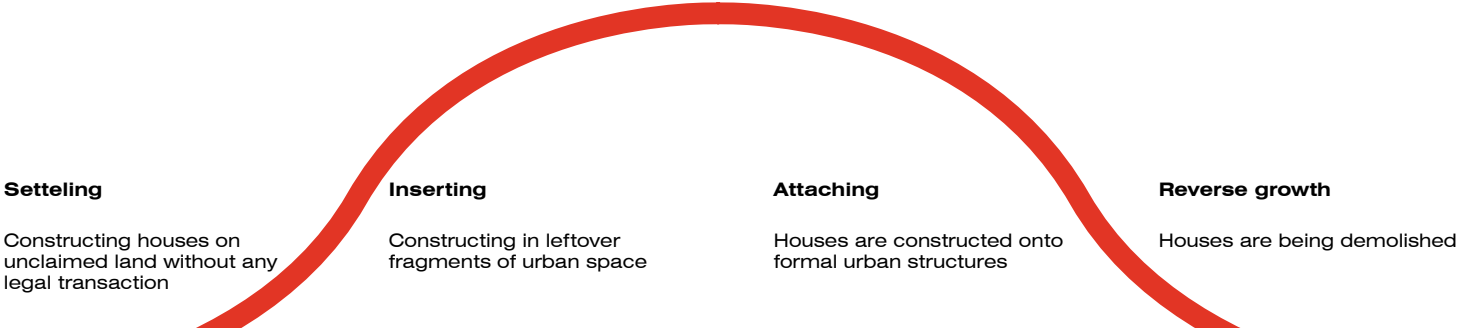
The three theories on development can be plotted in a single scheme, so that the relation between the different models becomes clear.



Resilience
Pendall, Foster and Cowell



Development patterns
Hao



Types of informal growth
Dovey



PART 1 INTRODUCTION

PART 2 THEORETICAL FRAMEWORK

PART 3 VILLAGE DEVELOPMENT

PART 4 DEVELOPMENT PROPOSAL

PART 5 CONCLUSION

#6

DEVELOPMENT STAGES OF THE VILLAGE



Introduction

The focus of this research lies on the spatial elements that are involved in the socio-economic upgrading of the migrant population in Shenzhen. The theoretical framework has established three key theoretical concepts for understanding informal development in Shenzhen; informality is not a singular development, but can be interpreted from multiple perspectives (1); the role of informal development changes over time and for different stakeholders (2); informal development will go through a fixed number of stages (3). In this chapter these three concepts will be synthesized in order to isolate the spatial elements that have an effect on the inclusion of the floating population in Shenzhen. The specific conditions of each stage can be reflected using the four perspectives on informal development. Ya Ping Wang defines three kinds of urban villages based on their location in the city (Wang et al., 2009, p. 960). The first type is the village at the core of the city, where all the farmland is consumed by urbanization. The second type lies in the suburban area, where there is still some farmland available. The third type is the village on the outskirts of town, where the village still has a large amount of farm land. In order to present a full picture of the development this chapter will also include the rural village and the demolished village as stages in the development process. These stages are not distinctly separate, but should be seen as a continuing spectrum.

Rural village

The poverty perspective perceives the rural village as the poorest of settlements. In communist times the rural village was idealized as an honest way of making a living and the collective rural village was promoted as the most important production unit. The collective rural village never became what the communist leader imagined it to be. In today's world, the rural villages represent the poorest places of China, even worse than the overcrowded informal settlements of the big cities. The villages lack basic utilities such as sewage and electricity. Moreover, because it is too expensive the inhabitants of the villages have no access to education, healthcare, etc. The poor conditions force people to move away from the village to the big cities.

The legal perspective perceives the rural village as a place of agricultural production, where urban development is not allowed. The Chinese legal system makes a distinction between rural villages and cities. By order of the hukou system, people are bound to their places of birth for access to public facilities. Although his system was implemented to control migration, it has not been able to prevent massive migration towards the large cities. The people that are left behind in the village are children and the elderly, who become completely dependent of remittances from their family. Because the land is collectively owned, it is not possible for a family to sell its land. This means that a family that decides to move to the city, has to depend on their own savings and cannot take money from the sale of the land to start a new life in the city. Furthermore, the impossibility to sell the land prevents people staying in the village from expanding their farm to an economically profitable size. The small peasant farms are too small to allow for full mechanization of the agriculture.

The cultural perspective perceives the rural village as a place where the traditional Chinese culture is best preserved. The traditional Chinese village was self-organized by clan organizations, in which the kinship relation is the most important factor in determining economic, religious and political activities (Fei, 1985). While all land is in collective ownership, exploitation of rural land and construction and maintenance of the house are managed by the family. The most important building of the village is the ancestral hall. The ancestral hall or temple is a place for ancestor worship. For a western audience, the ancestral hall is easiest compared with the church. Historically ancestral halls were closely linked with the confusion faith, and provided a place to pay respect to your ancestors.

The dualistic perspective perceives the rural village as a place that is part of a migration system between the countryside and the city. For most people, the rural village is the starting point for the migration to cities. The village is self-sufficient in its food production that comes from non-mechanized agriculture or the cultivation of fishponds. However, for all other consumption the village is completely dependent on other sources. Many villages are very dependent of remittances from the city to send the children to school or take care of the elderly. Without these remittances, many people would not be able to live there.

Peri-urban village

The poverty perspective perceives the peri-urban village as a poor urban community. The peri-urban village lies on the very periphery on the cities influence. Poverty levels are only slightly better here than in the rural village. As part of the municipal policy, basic paved roads and sewage are installed. Other facilities, such as schools and healthcare facilities are not provided by the

government and are left to the villagers.

The legal perspective perceives the peri-urban village as a village *in the city*. The biggest difference between the rural village and the peri-urban village is that the peri-urban village lies within the municipal boundaries of the city. This means that the village comes under the supervision and policy of the Shenzhen government. Building regulations must be followed more closely.

The cultural perspective perceives the peri-urban village as an urban community of migrants. As the village urbanizes it attracts migrants. This migrant group is not uniform, but consists of different regional groups. The most common regional groups of migrants in Shenzhen are migrants from Guangdong, Hubei, Hunan, Yunnan and Sichuan province. Each region speaks its own dialect, adding further to the challenge of integration. The municipality provides all villages with urban facilities, such as a basketball court, urban gymnastics and a police post. These facilities do not always react to the local demand of the migrants, who are unsure what to do with the urban facilities. The identity as a villager is important for these people, since the village is the basis of their legal right to the land and the income it generates. The villagers are organized in a joint stock company that manages all aspects of the village.

The dualistic perspective perceives the peri-urban village as an first arrival point for migrants. The original inhabitants stop being farmers and leave this job to the new migrants. Because demand for housing is high and enforcement of regulations is low the village expands. Former farmlands or fishing ponds are made suitable for construction, and individual families are able to build a house there. Still, there is much farmland left. This farmland is a place where newly arriving migrants can use their agricultural skills to earn a small income for the initial months of their arrival. Because the village falls under the jurisdiction of the municipality, a simple bus connection greatly increases the connectivity of the village to the rest of the city. The villagers provide school and healthcare centers for the migrants, who are charged a relatively high amount of money for this service. With many of the migrants being either still children themselves or young parents, the school provides a daily rhythm, in addition to the essential skills such as reading and writing that are being taught there.

Sub-urban village

The poverty perspective perceives the sub-urban village as an increasingly problematic slum area. As the village grows it attracts more poor migrants. Because space in the village is limited, the density of people increases enormously. The increased density leads to increased social problems and crime rates. Parts of the village are bought by the government and replaced with middle class housing and shopping malls.

The legal perspective perceives the sub-urban village as a settlement with a high number of illegal activities. Because the land in the village is limited, villagers seek out loopholes in the legislation to increase the amount of floor space. Due to overcrowding and criminality, government officials have trouble imposing the urban planning regulations. Many buildings exceed the maximum building height of 12 floors, and illegal buildings are constructed at vacant spaces in the village. Because most of the people renting a room in the village are migrants without registration, it is difficult for the government to gain an overview on the population.

The cultural perspective perceives the sub-urban village as a culturally mixed environment. As the villages urbanize further the cultural identity of the migrants becomes fuzzy. The sub-urban village will house established migrants that have been living here for a longer time and have already adapted to the city, but also new migrants that have arrived in the city only recently. The most important cultural space of the village is no longer the ancestral hall, because this hall only has significant meaning to the original population, but the market hall. This is the place where people come for the daily groceries, and also the place where people meet, gossip, argue and generally get in touch with the place they live.

The dualistic perspective perceives the sub-urban village as a business opportunity for migrants. Because of the increasing returns on increasing floorspace, urban villages are characterized by extreme density. Both the density of the built environment as the population density are beyond any comparison in western countries. The buildings in the village provide an easy place for established migrants to open up a shop or a workshop. The migrants can use the skills that they have learned in a big factory or at home, in a new business. The possibilities to open a shop vary from small carts in the public space, to a place in a market hall, to a room in the residential quarters of the village.

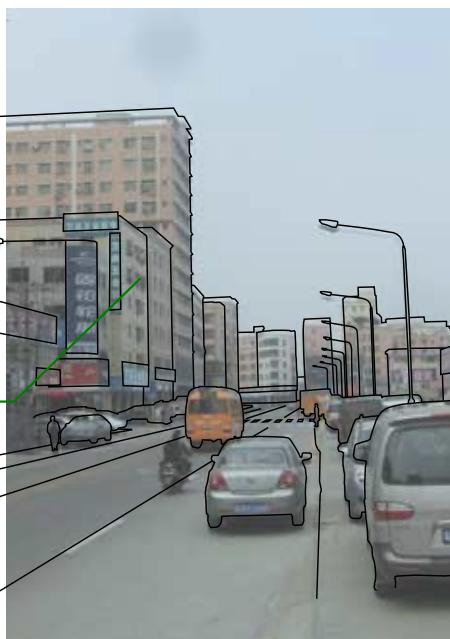
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Poverty

Public lighting installed
Cluttered advertisements on all buildings
Many cars on the street

Residential use at upper floors
A zebra crossing is necessary for pedestrians to cross the 4 lane street

Legal



Cultural

There is no space for social activities

Small scale industrial use along street

Large commercial advertisements dominate the streetscape

Only a few pedestrians walk along the street

Dualistic

Poverty

The buildings look dirty and badly maintained
The street is paved
The people are poor

Buildings do not exceed maximum building height
Open electrical wiring swirls through the street

Legal



Cultural

The trees add a natural element to the street

A table and small stools offer a place to sit and drink tea for the renter of the shop

Only one advertisement looks over the street
The street is very quiet. Only one car is to be found in the street

Dualistic

Poverty

On the interface between two village expansions, the visual appearance is very chaotic.
Unsafe situation with motorcycles passing through the street

Low rise buildings allow for much light to enter the street
Brightly colored sun blinds and parasols protect the products from rain and sun

Legal



Cultural

Some shops specialize in regional foods

Motorcycles and three-wheeled bicycles bring people in and out of the street and supply the shops with goods

Fresh vegetables are sold on the street. These goods are produced locally in the area

Ground floor shops offer food and daily household items

Dualistic

Poverty

Public lighting installed
A large amount of parking space for cars

All buildings are 4 stories high
No streethawkers or illegal motorcycle taxi's

Legal



Cultural

Two rows of trees align the street

The ground floor is full of shops

Dualistic

American urban villages

Many urban plans that are made for the former location of the urban village are made either by Western planners or based on Western ideals of urban planning. This choice for Western design is somewhat misplaced when put in perspective. The urban village is not a concept unique to China or Asia in general. Him Chung draws a parallel between the urban villages of China and the urban villages in the United States and the United Kingdom. As a reaction to the modernistic planning from after the second world war, the urban village concept was introduced as means to achieve more human scale, mixed-use and well-designed places in Anglo-Saxon cities (Chung, 2010, p. 422). In the urban village concept much attention for pedestrians and public transport. The Anglo-Saxon urban village concept seeks to reinvent some of the ideals that Jacobs described in her book Life and Death of great American cities. According to Chung the biggest difference between Anglo-Saxon urban villages and Chinese urban villages is the driver behind the development. In the United Kingdom planners act from social and sustainability ideals, while in China villagers act from an economic point of view (Chung, 2010, p. 427).

Village in the city

The poverty perspective perceives the village in the city as an overcrowded and crime-ridden slum. The village in the city is completely surrounded by the formal city. All land is converted into high density residential buildings, which means there is no public space available in the village. Buildings are up to 14 floors high, often without elevators. There is little social control in the village, which make the villages unsafe places, especially at night. Control on activities in the buildings is very weak, which means that criminal activity rises.

The legal perspective perceives the village in the city as an illegal scar in the city. Because the pressure on land is so high, all land is financially optimized. Almost without exception the buildings violate urban planning regulations. Some businesses on the edge of the village are legally registered and pay tax, but most of the businesses still operate illegally. Most of the original village owned land has been sold by the government and transformed into formal residential and commercial areas.

The cultural perspective perceives the village in the city as a proper urban district. In this stage there are almost no new migrants living in the village. All the inhabitants of the village have already lived in the city for a longer time. This means that they have had time to develop social networks and skills to perform jobs in the central areas of the city. The old core, with its historical and cultural value comes under great pressure from development, since all other land is already fully occupied. Since most of the original villagers moved out, there is no one in the village left with a direct ancestral link to the old buildings.

The dualistic perspective perceives the village in the city as a specialized district of the city. Under huge pressure for development the villages specialize in residential use, losing all of its industrial and agricultural functions. The commercial functions tend to specialize in certain types of goods, although the sale of fresh food remains a constant in most commercial streets. In some cases the market hall can gain a unique position in the city when it specializes in one particular sector like clothing or electronics. In this case, people from all over the city will come to the market. The rent in these parts is up to 20 times higher than at the edge of the city. The villagers in the urban village earn about 60% of their income from renting out apartments and an additional 30% from collectively owned businesses (P. Hao et al., 2011, p. 220). All agricultural and industrial land is either sold to developers or maximized for rental profit. Only 10% of the inhabitants actually still work in the village. Many of the villages have a central place in the city at this point of development, which means they are must more accessible by public transport. This accessibility helps for example to promote a specialized market, but it also greatly increases the possibilities of migrants living in the village to look for job opportunities outside the village.

Demolished village

The poverty perspective perceives the demolished village as a great achievement, since all the poverty of the area is gone. The badly constructed buildings and slum-like conditions are wiped away with the bulldozer. The new residential areas, office towers and commercial district represent the global ambitions of Shenzhen.

The legal perspective perceives the demolition of the village as a legal action that replaces illegal buildings with legal ones. No provisions are arranged for the migrants, which will have to move to other parts of the city.

The cultural perspective perceives the demolished village as a loss of local culture and traditions. The old core with its historical buildings is forever lost. Museums and governmental buildings are meant to replace the desire for places of culture. The government office is a place of administration and power. The government office, also called street office, is an important building for the local politicians. Usually preceded by a big square, the street office shows the power to the people.

The dualistic perspective perceives the demolition of the village as a critical failure, because of the loss of the integrative function of the village. The cheap accommodation and easy opportunity open a business are lost. The demolition of the village creates not only problems for the inhabitants, but also for the families that they support in their home village.

Conclusion

The three theoretical concepts enable me to synthesize the informal development in Shenzhen into five successive stages– the rural, suburban, peri-urban, urban and demolished village. Seen from the poverty perspective, the village tends to get worse because indicators like crime and social problems also rise. On the contrary, seen from the dualistic perspective, the village goes through a period of improvement, before the quality of informal development decreases again. Functional diversity in the village shows an upward motion in the initial stages of urbanization. As the village becomes fully embedded in the city the functional diversity declines again, till there is only residential use with shops on the ground floor. Culturally speaking, the village loses its meaning over time, since historical relations are lost. In, general, the opportunities for informal activities tends to get better when then rural villages develops towards the suburban and peri-urban village, but these opportunities decrease again when the village develops further towards urban and demolished village. Each perspective reveals different elements to be of importance to the development of the village, which are summarized on the next page. These presence or size of elements can help with the determination of the specific development stage of the village. Now that the most crucial spatial elements in the socio-economic upgrading process have been isolated, the next chapter will investigate more closely the relation between the different spatial elements in the villages of Guangming.

Isolating spatial elements

From poverty perspective it is important to have access to basic facilities such as sewage, electricity and paved roads. Unsafe situations in the village can limit positive informal activities. They also prevent the middle class from settling in or near the informal neighborhoods or coming there for shopping or other activities. The government promotes the implementation of urban facilities to provide every citizen with the same level of facilities. The new residential developments that the government allows to replace the village, has little remembrance of the poor neighborhoods that stood there before. From the legal perspective it is important to have security of tenure. If people are secure of their residence they will be more willing to invest in the place where they life. Building regulations that are flexible and allow people to add to their houses. Many regulations make construction and maintenance expensive and undermines the potential of startups to occur. Depending on the location of the village the urban regulations are more rigidly followed. From the cultural perspective it is important for a person to be part of a community. The person can share experiences about life in the city. They discuss what good options are and which things to avoid. The migrants support each other in leisure activities, allowing for a break from the working life. The ancestral hall plays an important role for the original inhabitants. From the dualistic perspective it is important to have enough possibilities for the migrants to rent a residence or open a shop. Job opportunities must be diverse to allow for people with different skillsets to earn an income. Agriculture provides a place for new migrants to get a temporary job. The market hall is an important catalyst for the development of commercial functions.

Spatial element used in typological research

Spatial element used in spatial analysis

Spatial element not present in Guangming

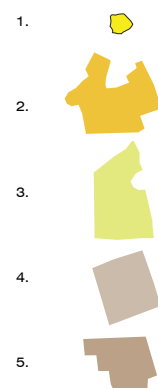
POVERTY
PERSPECTIVE

LEGAL
PERSPECTIVE

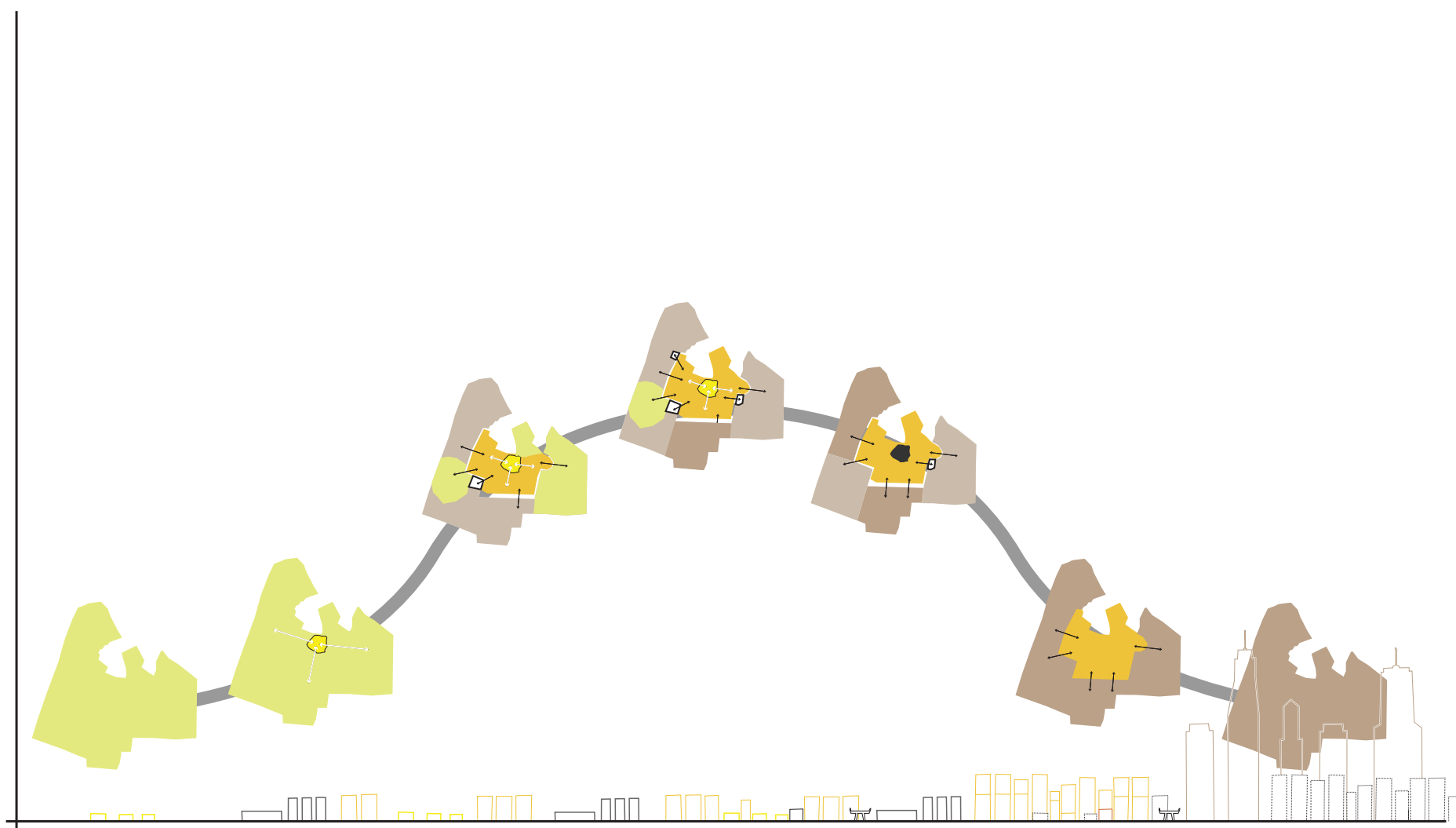
CULTURAL
PERSPECTIVE

DUALISTIC
PERSPECTIVE

1. Old core
2. New village expansions
3. Agriculture
4. Village owned industry
5. Private industry



ECONOMIC OPPORTUNITY



Rural village

Poor rural community that lies under the authority of the national government

No basic utilities like electricity, sewage

Legal farming community

Strong local Chinese culture

Ancestral hall (see page 43, 53, 87)

Starting point for migration. Remittances are sent back to rural village

Horticultural land (see page 41, 53, 85)

River system (see page 41)

Sub-urban village

Poor urban community that requires a good government to take care of the village

Implementation of basic utilities

Village inside municipal boundaries, gives obligations to government to provide basic services

Location in subdistrict (see page 53)

Bus connection (see page 47)

New migrants connect to recognisable local culture of village

Initial development of industrial and commercial activity

Residential expansions (see page 43, 53)

Shops (see page 47)

Peri-urban village

Village is in the way of suitable land for new development of peripheral area

Privately owned industry (see page 49)

Metro system

Much illegal construction in the village

Migrants are dominant group and bring rituals and language from own province

Cultural square and or urban facilities (see page 45, 53, 87)

Strongly developed local economy that offers many employment opportunities

Market hall (see page 45, 53, 87)

Schools (see page 47)

Urban village

High density urban environment that is crime ridden

Regional highway system (see page 49)

Almost no illegal village expansion, but much illegal activity (i.e. crime)

Illegal businesses hidden in dense village environment

Migrants have been living in city for over a decade and are changing to urban culture

Parcs (see page)

Residential core caters to migrants working in the formal city

High end shopping malls and golf courses reflect global culture

Demolished village

All signs of poverty are gone

Gated residential compounds (see page 53)

Completely legal area again

Room for a global culture

Old historical buildings become touristic sites

No room for the floating population

#7

SPATIAL ANALYSIS OF GUANGMING



Introduction

The purpose of the analysis in the chapter is to describe the relation between the natural landscape, informal growth, vernacular architecture and commercial activity. An understanding of this relation will answer the question why certain spatial elements appear in particular parts of the villages. The informal network is historically grown under the impact of the landscape, Chinese perception of the build environment and informal growth. The ability of the informal network to include migrants differs, because of the quality to allow for informal activity. In the first section of this chapter the district of Guangming will be shortly introduced. The natural landscape offers a starting point for the analysis of the spatial elements. The next section addresses the structure of the built form. In a series of maps the three layers of analysis -landscape, built form and commercial activity- are combined to show the development of the local network in Guangming. As a conclusion of this analysis I will use a map to show the area of Guangming from the migrants perspective.

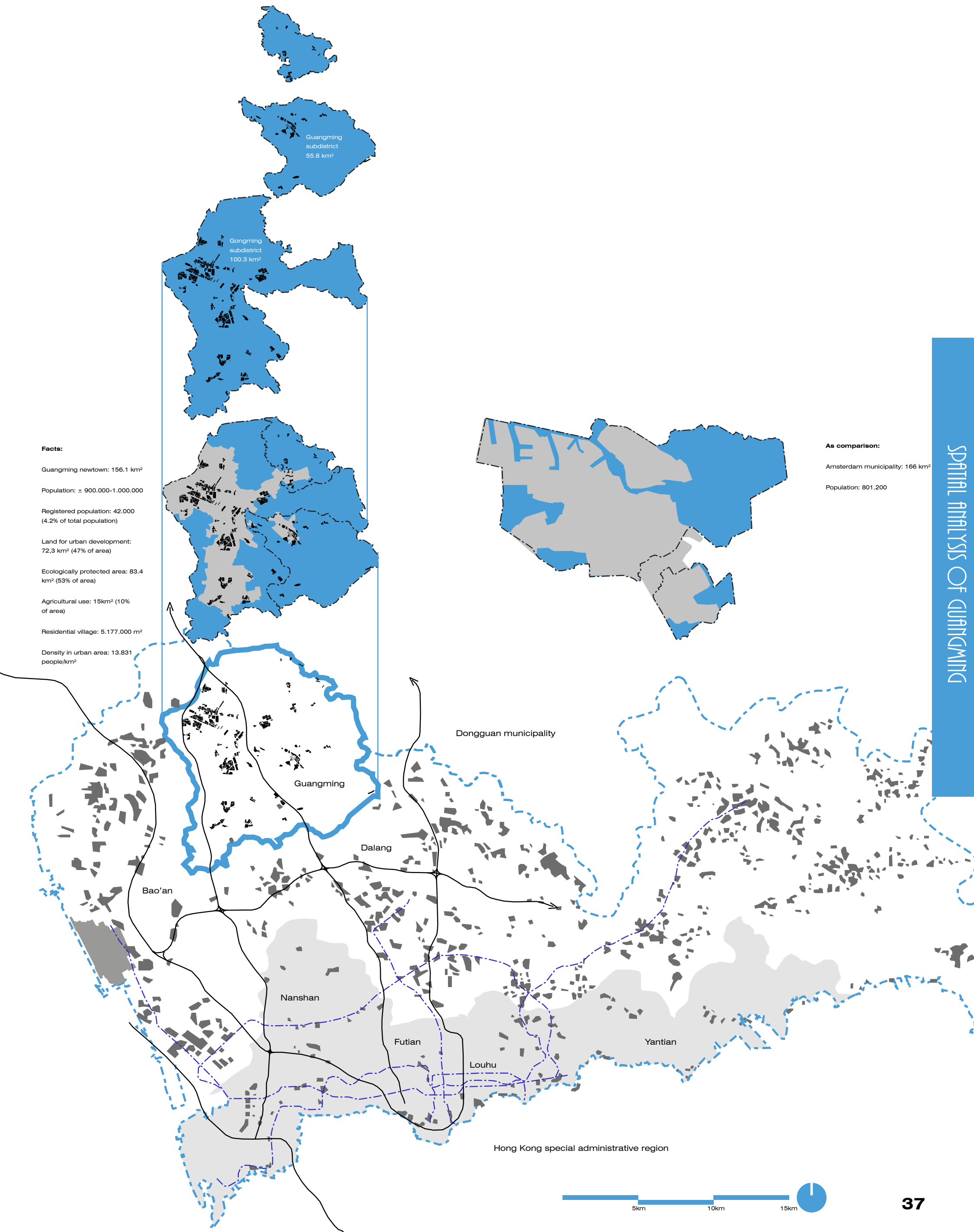
Position in Shenzhen

Before going into an analysis of the Guangming area the first section will sketch a broad image of the area of Guangming. The Guangming district lies at the edge of the Shenzhen municipality, in between the major cities of Shenzhen city proper and Dongguan cityproper. Both cities can be reached by car in about 50 minutes. Other important features of the region are the close proximity of the Pearl River , its harbours and the Bao'an International Aiport. Guangming used to be part of the Bao'an district, but since 2005 it is a separate district within the municipality of Shenzhen. In order to manage the new expansion properly and to allocate funds more effectively, it is common practice to establish a new district within the municipal boundaries. In the case of Shenzhen, the original Special economic zone had four districts. As the city grew two larger districts were added at the periphery of the city, in territory that used to be part of the Dongguan municipality. As urban growth continued the new peripheral districts were further subdivided to give birth to Guangming, Dalang and Pingshan districts. The Guangming district can be further subdivided into the subdistricts of Gongming (64%) and Guangming (36%). The territory that now occupies the Guangming district used to be a completely agricultural area, which was famous for its lychee, pigeons, milk and sweet corn. This image is largely the product of the Guangming statefarm that is organized in the Guangming subdistrict. Guangming is also known for its 'migrant community' of fugitives from the

Maoist regime returning to China. The square surface of Guangming is 156 km² (for comparison, the Amsterdam municipality has a land surface area of 166 km²), which already houses close to a million people (the municipality of Amsterdam has close to 800.000 inhabitants). The population is approximately 95% migrant, that all live inside the urban villages.

To attract investors to the area, the urban plan for Guangming district has been branded as a green ecocity. Although the strategy of branding is not at all site-specific, the basic foundation of branding is that it should make an urban area stand out from other areas. The brand for Guangming newtown is that of an ecological town: "The new town is aimed for low-carbon ecological city, a modern and green new city, based on technological innovation, guided by scientific urban planning, led by the development of infrastructure and utilities"("Green City, Guangming (Bright) Path," 2012). The apparent definition of ecology and sustainability seems to be one that is strongly related to technology and high-end functions. In practice this definition results in very technical solutions such as rainwater recycling techniques, solar panels, green buildings and hybrid buses. The plans do not mention anything on urban agriculture, community involvement, local education or the polluted urban villages.

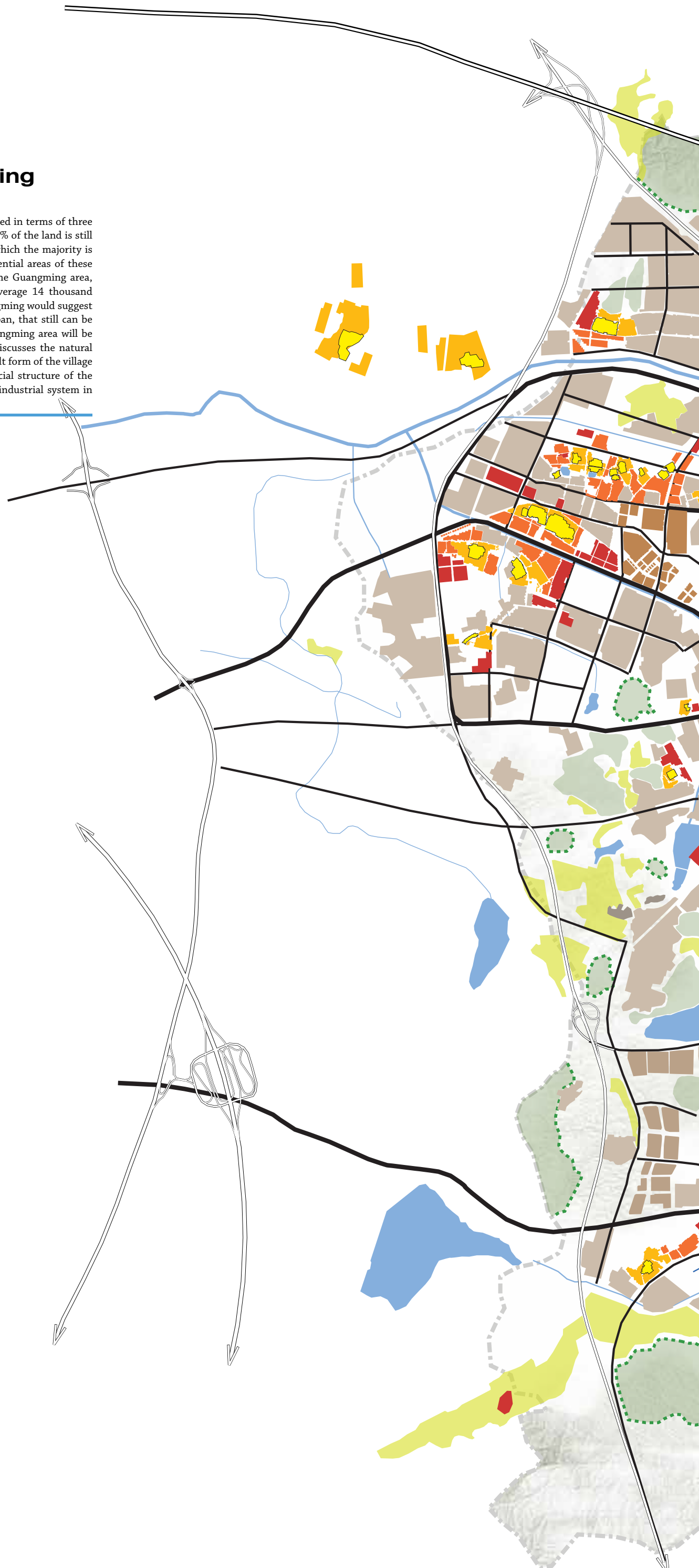
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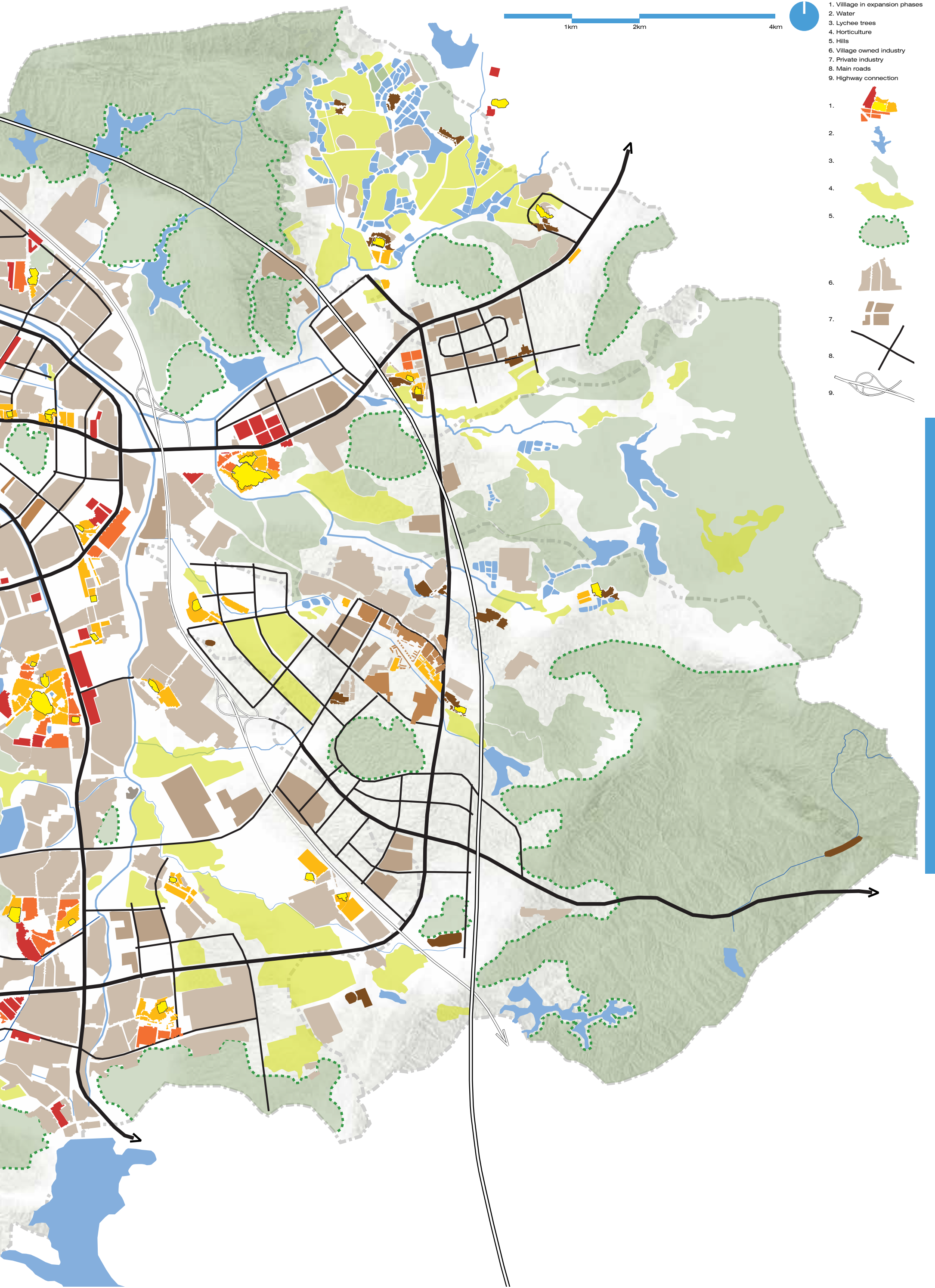


An overview of Guangming

The current condition of Guangming can be described in terms of three layers; the landscape, the village and the factories. About 60% of the land is still un built, either forest or cultivated land. The factories, of which the majority is village owned take up about 30% of all land use. The residential areas of these urban villages represent only 8% of the build-up area of the Guangming area, which means that the density inside the villages is on average 14 thousand people per square kilometre. Although the density of Guangming would suggest an already urban area, the area is considered to be peri-urban, that still can be further urbanised. In the following series of maps the Guangming area will be discussed in a number of thematic layers. The first layer discusses the natural landscape of Guangming. The second layer deals with the built form of the village in Guangming. The third layer takes a look at the commercial structure of the Guangming district. The fourth layer will elaborate on the industrial system in Guangming.

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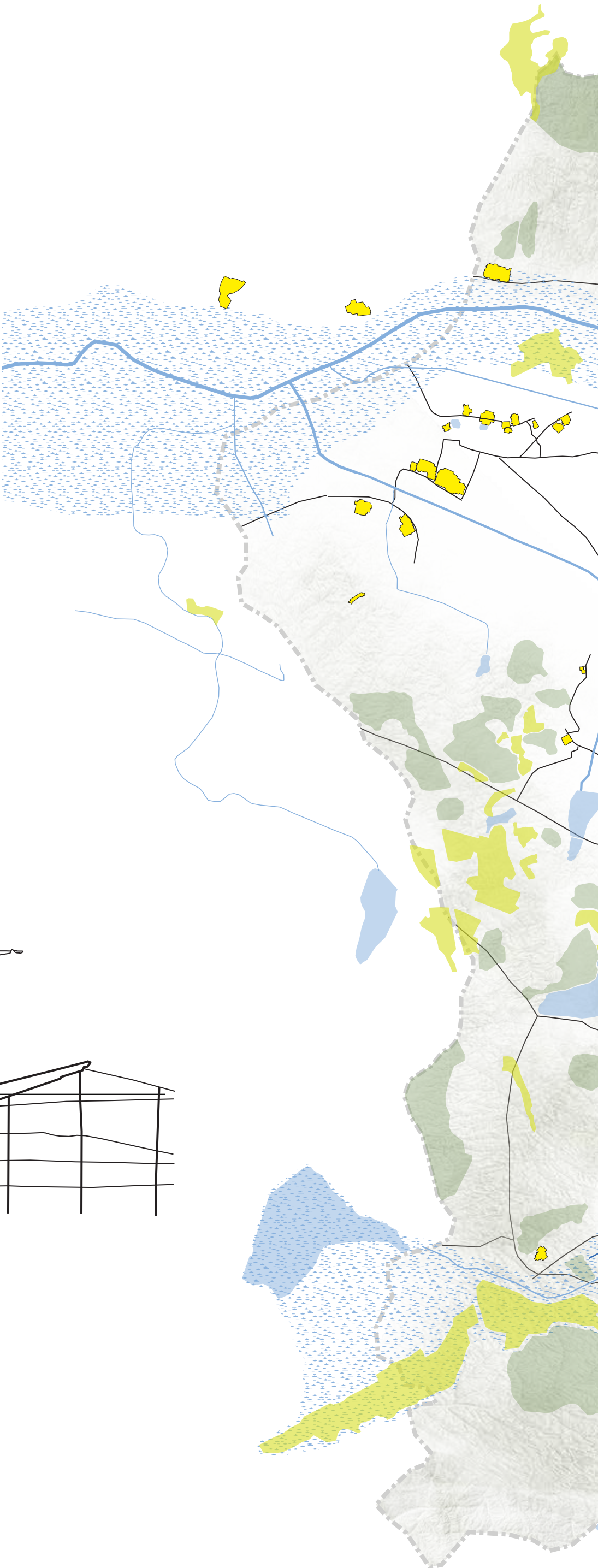
Natural landscape

For centuries long Guangming has been an agricultural society that worked in harmony with the natural landscape. The eastern side of the Pearl River Delta has a relatively sloped landscape with hills up to a 1000 meter in height. In the valleys between the hills, small rivers take the water to the Pearl River. The historical location of the villages in Guangming is determined by the position of the river and its surrounding flood zone. Villages are located at a safe distance away from the river, to prevent frequent flooding. In this way, the most fertile soil near the river is used for horticulture, while the higher ground is used for living. In places where the soil is not suitable for intensive horticulture, the land is cultivated for the growth of fruit trees. The main agricultural products from the Guangming area are the lychee fruit, pigeons, milk and sweet corn. These products are still referred to as the four treasures of Guangming.

In recent years the natural landscape has undergone dramatic changes. Of course, much of the agricultural land has been transformed to industry, but there also have been changes in the water system. Dams were constructed near the hills, so that a reservoir was created at the very beginning of the river arteries. These reservoirs allow for a very controlled flow of the water. Many parts of the river system have been polluted and used as an area to dump waste. This pollution threatens the agricultural production and also limits any possibilities of recreational use of the river system.

The geographical direction of the villages is closely related to the river system. According to the rules of Feng Shui all residences must face water, with their back towards the hills and mountains. This configuration provides a natural sheltered position and stands for a harmonious relation with nature. In front of the village, facing the river lays the village collective space. The main square is the most public space of the entire village and often features a monumental pond. The ancestral hall is located next to the collective space. Perpendicular to the main square is a road that connects the village with the river. The road often leads to a bridge, making the other side of the river accessible. This road often continues through or at on side of the village towards the hinterland of the village.

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Rolling hills surrounded the Guangming district. The hills are covered in trees, most of them lychee trees, which is the signature fruit of the Guangming district.

The area is dotted with small lakes. Some of them are natural, others are artificially created by the construction of dams.

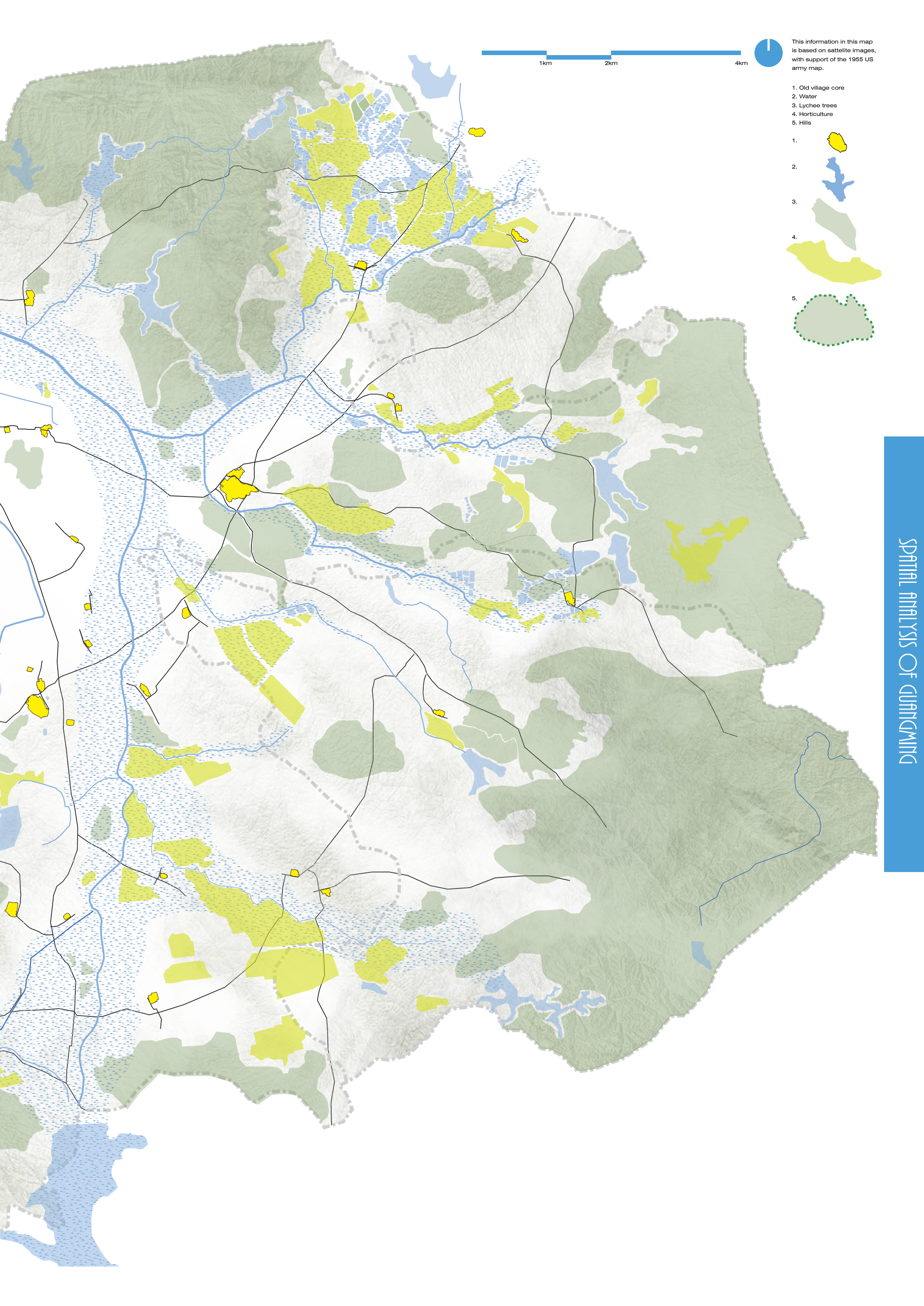


Many of the small lakes are used for the cultivation of fish and ducks. Especially because keeping pigs is prohibited in Guangming, the ducks offer an alternative source of meat.



In this aerial picture it is possible to see the fish and ducks ponds. The ponds are somewhat organically arranged around the villages.





1km

2km

4km

- 1. Old village core
- 2. Water
- 3. Lychee trees
- 4. Horticulture
- 5. Hills

1.

2.

3.

4.

5.

Structure of the built form

The main structure of the village is a simple grid following the geographical direction of entire village. The ancestral hall has an equal place in the grid as all other houses, at the edge of the village. The two directions of the grid have a different meaning to the village. The alleyways that run directly towards the river connect the main street of the village with all its houses. Parallel to the river and the main square are the more private spaces. These alleyways are only used by the residents of the house that faces the alleyway. The alleyways have a very narrow profile to prevent the sun from entering the windows of the house. Western

experience of a settlement with streets and houses that directly face the street is not present in these villages of Guangming. Also different is the strict orthogonal structure of the village, as opposed to a more organic growth.

The vernacular architecture of the house relates to the different meaning of the orthogonal grid of the village. The front door faces the river, but looks to the backside of the house in front of it. The three rooms of the house are aligned as a single sequence, without a hallway that connects them. The front part of the house has a flat roof and is used for the kitchen, bathroom and toilet. The middle part of the house is the living area, under the first sloped part of the roof. The last part of the house contains the bedrooms. The transgression from public to private is not only present in the urban structure, but also in the house.

In communist times some of the villages went through slow spatial transition. Migrants returning from overseas brought back with them new construction techniques, specially the technique of pouring concrete. If the financial situation of a particular family allowed for it, they could decide to demolish their old house and replace it with a modern concrete house. Although these houses represent a very small percentage of the housing stock of the old core, their architectural features are of a high quality. The biggest difference between the modern houses and the old houses, is that the modern houses allowed for the construction of multiple floors. The grey color of the modern houses is contrasted by bright yellow and green ceramic tiles that decorate the balconies and eaves of the building.

The village expansions are closely related to the original old core and its informal network connecting village with river and hinterland. The village can expand it two basic ways. First, is the incremental increase of the village by individual houses that are added to existing neighborhoods. Second, is the planned expansion of the village in new neighborhoods. The first type of growth is present in almost all the villages, but often makes only a very small percentage of the village growth. The biggest growth is controlled within new neighborhoods that are planned by the village committee. Some village expansions have been structured by the government, adding elements like trees, parking places and in general a more spacious layout.

The strong rectangular shape of the old core offers a natural alignment for the expansion of the neighborhoods. These new neighborhoods are planned in coherence with the existing structure of the village. By placing the neighborhoods along the main street and the river street, a system of parallel and perpendicular roads emerges. The grid in the new neighborhoods is very similar to the grid in the old core, but the relationship that the new apartments buildings have with the street is very different from the relationship in the old core. The alleyways have no specific meaning and their lack of identity means that they are no more than functional connections, without the inhabitants using them for other purposes.

The Guangming state farm was setup during communist times to organize the agricultural production of the eastern part of Guangming. The state farm was a company that, like the industrial compounds, offered employment and residence at the same time. To accommodate the farmers a number of new villages were created. These villages have a different spatial structure then the old cores or the new villages expansions, and therefor also a different relationship between public and private. The houses for the farmers were a very simple nature without any decoration.

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The second floor is reserved for sleeping

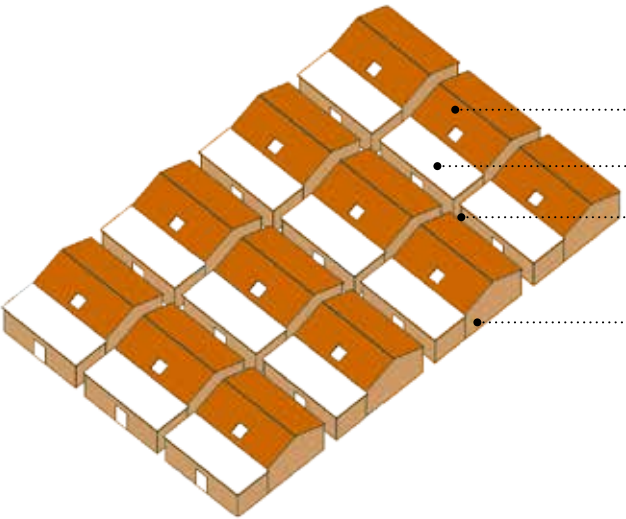
The central part of the house is the living area. The toilet is not connected to any sewage system

The back of the house is used as an bedroom or storageroom

A ladder takes you to the second floor

Posters above and aside the main door are a sign of good luck for the Chinese new year

At the front of the house is the kitchen and the bathroom. The ceiling is flat and lower then is the rest of the house



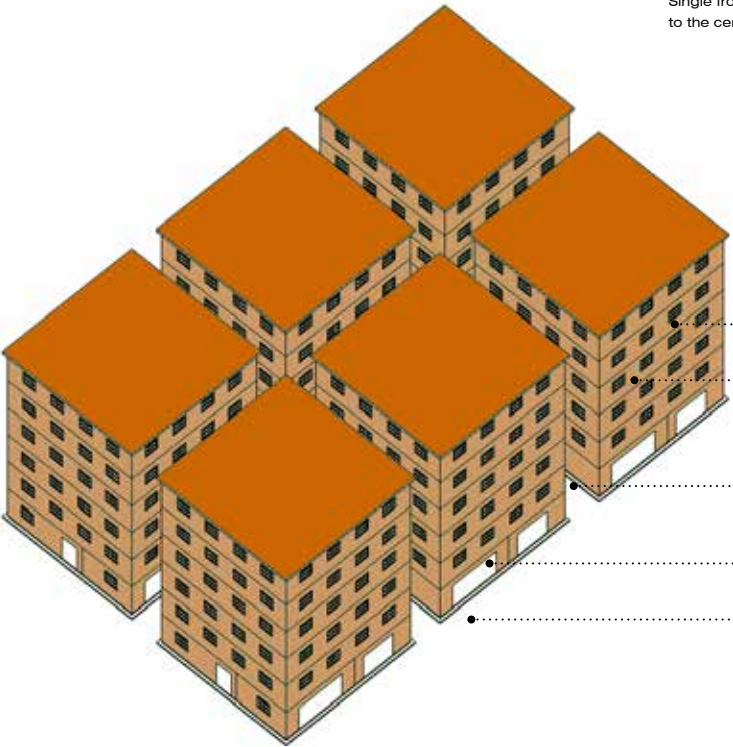
One single apartment is approximately 25 m². One apartment houses 2 to 4 persons

Buildings operate with a single staircase and without elevator

A single apartment costs between 2000 yuan in the city centre and 200 yuan at the periphery of the city like Guangming

All electricity, gas and water utilities are placed on the facade of the building, allowing cheap and easy maintenance

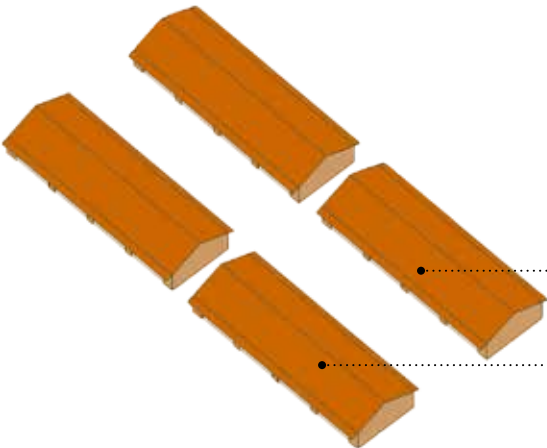
Single front door gives access to the central staircase



All buildings are painted white, to reflect the summer heat.

A single opening in the facade gives acces to the multifunctional space. In this space a small workshop, house or shop can be arranged.

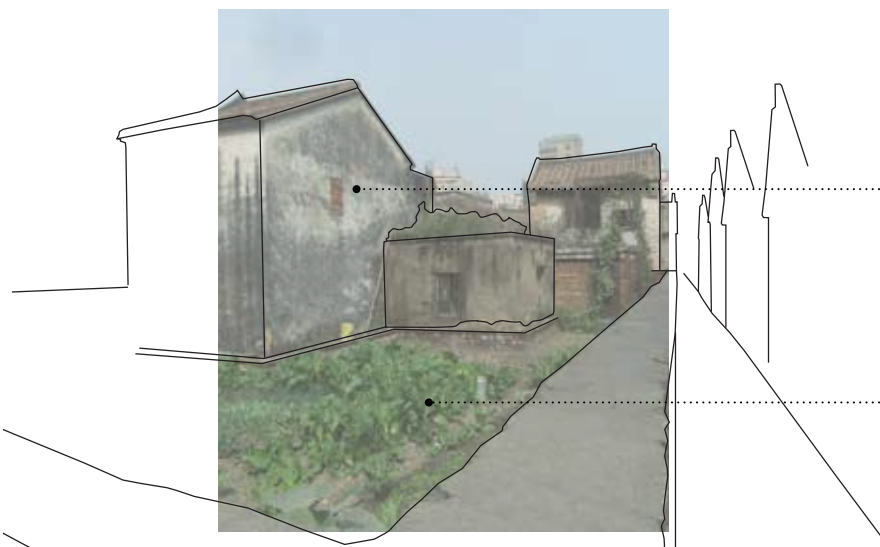
There are usally four or five units per building





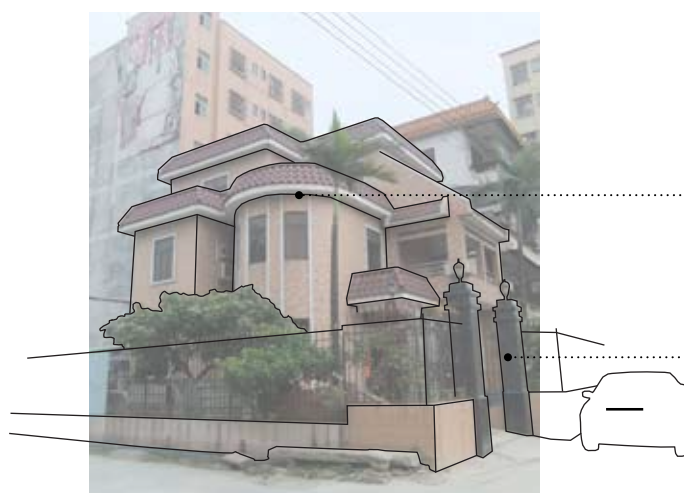
Vernacular housing from the period between the end of imperial China and the beginning of Communist rule. Concrete construction material was brand new when the building was constructed in the first part of the twentieth century and enabled houses that were higher than traditional Chinese architecture.

Geometric decorations in art-deco style. No direct reference to Chinese tradition. The gate indicates a single family home.



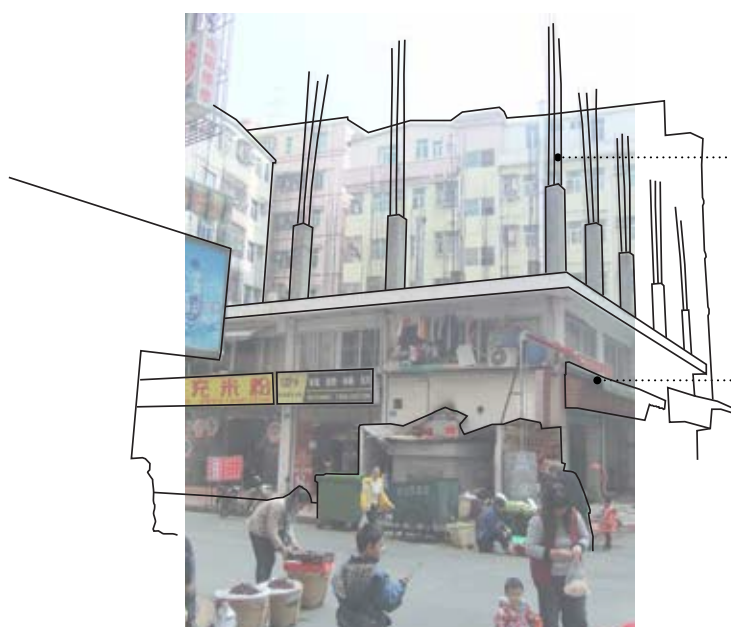
Abandoned buildings in old core of village. The traditional houses often have beautiful detailing, but are badly maintained and do not have the utilities like electricity and sewage. Many people decide to move out.

The land is temporarily used as a small garden for vegetables. No land in the village is left unused



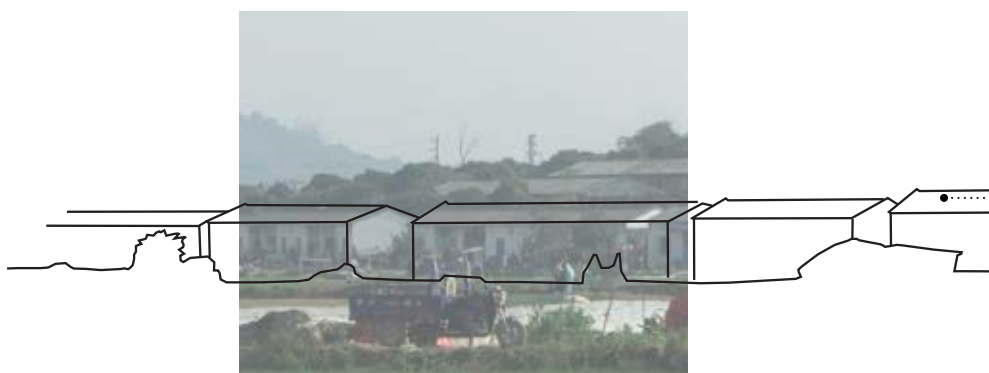
Luxurious village in the middle of the village. Probably owned by a local landlord. The small gabled roofs are the only link to Chinese identity in an otherwise none-distinctive architecture.

Singel front gate with fence indicates the building is occupied by one single family. The Mercedes car in front of the gate shows that this is a wealthy family

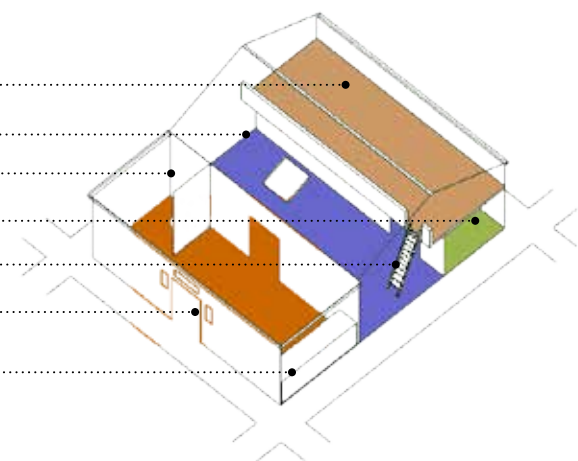


Many buildings leave the steel reinforcement open, for easy intensification of the building. Buildings constantly change in the village. Especially the new expansions are constantly changing.

The facades of the buildings are completely covered with laundry, advertisement and left-over trash. Every space alongside the mainstreet of the village are used for businesses.



Typical multifunctional living-and-work units that provide shelter to workers. Since the buildings are not constructed by the people who live there, the architecture is purely functional. The white chalked facades protect against the strong summer sun.

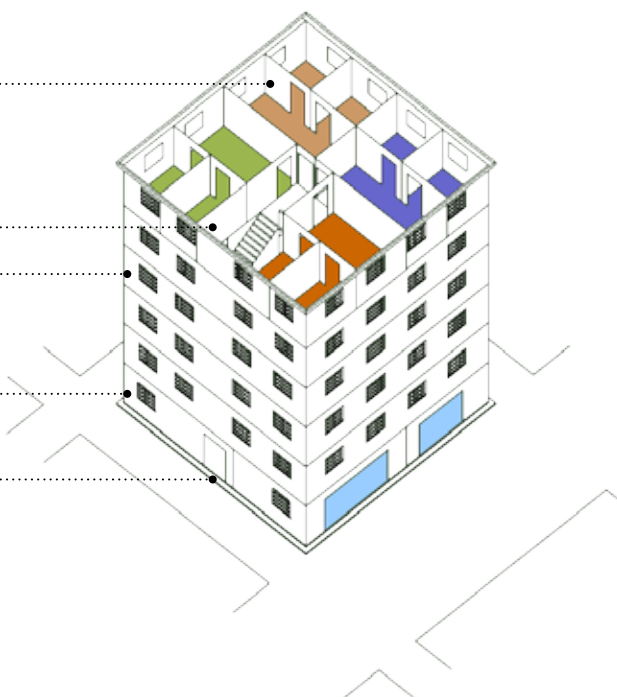


Most Hutongs face water, as guided by Feng Shui rules

Their is little public space between the houses

All houses are surrounded by alleyways. The alleyway that lies in front of the door is easily occupied for private purpose

The side walls are bearing walls and closed to passing people



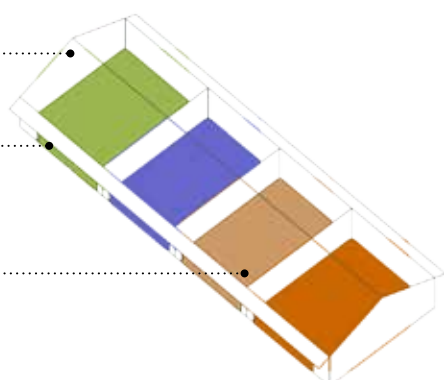
Metal bars in front of windows against the threat of burglary

Height of buildings varies between 4 and 12 floors

With the exception of the main shopping streets, all alleyways are roughly 2 meters wide

Shops or workshops on the ground floor

Grid of 10x10 meters, as determined by the village committee. Each family is given an equal amount of lots and has the right to develop their own lots

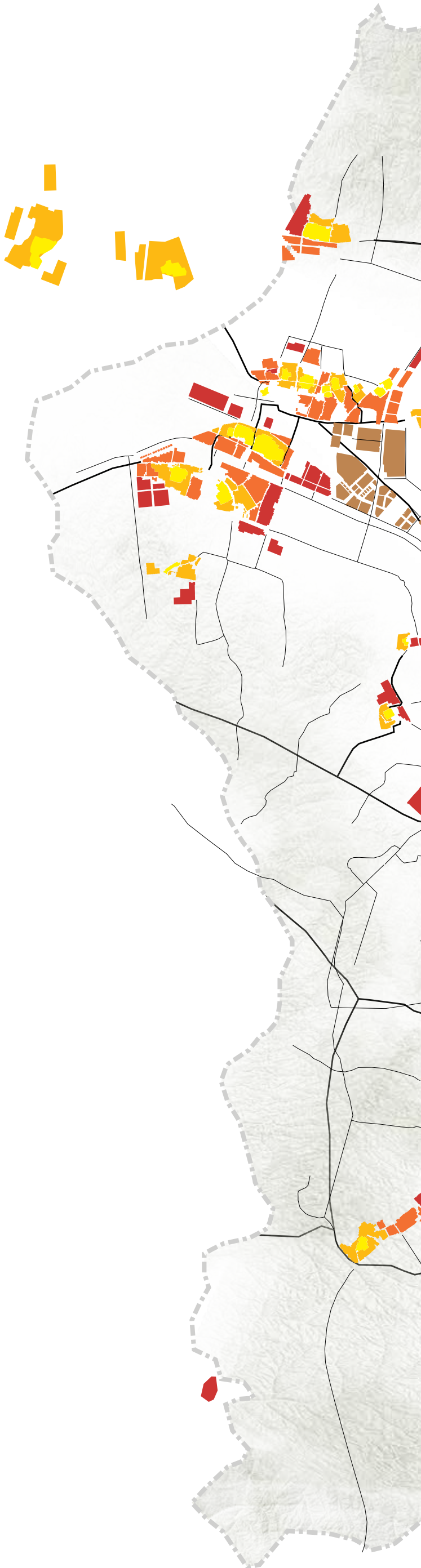


The units are arranged in a loose grid formation

The individual single-storied buildings are approximately 30 by 10 meters.

The different phases of expansion can be found by reading the form of the village on satellite images and comparing satellite images taken at different times. In total, 52 villages have been found in Guangming. Each village shows different degrees of expansion. Most villages are between 0,25km² and 1,0km² in size.

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Typical scene from a village surrounded by horticultural lands.

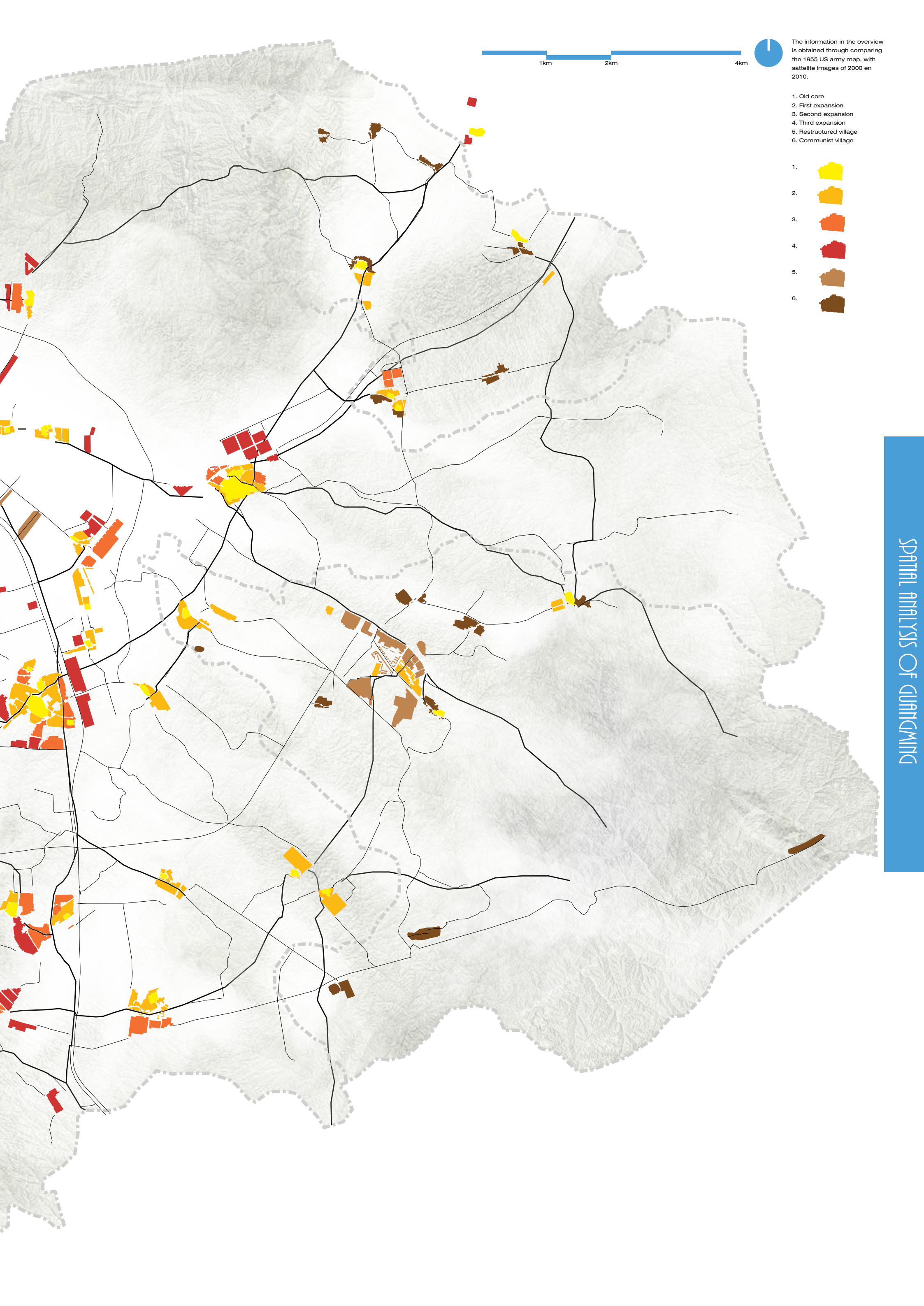


Typical scene from a village at the point of a major road.



Example of typical village expansion layout. The main streets are between 6 and 10 meters wide. The alleyways are usually 2 meters wide.





1km

2km

4km

The information in the overview is obtained through comparing the 1955 US army map, with satellite images of 2000 en 2010.

1. Old core
2. First expansion
3. Second expansion
4. Third expansion
5. Restructured village
6. Communist village

1. 
2. 
3. 
4. 
5. 
6. 

Commercial patterns

The architecture and urban form of the villages allow for informal use. Although the urban form of the villages is very homogeneous the informal activity in the village varies strongly. In order to find out which parts of the village are used for informal use and which parts are not this research focused on commercial activity as an overall indicator of informal use.

A first attempt to narrow down the centers of commercial activity is an analysis of the public transport system. This analysis departs from the notion that public transport and commercial activity are closely related to each other. In the case of Guangming there is only a bus system to be analyzed. When the bus lines of the region are plotted on a map of Guangming a clear pattern emerges. The bus lines coincide with the main road structure, but less apparent also with the centers of the villages. The analysis of the bus system indicates that the villages are the central in the commercial system of the area. This observation supports the notion that commercial activity and informal use are closely connected.

To more closely investigate the commercial activity in the village we turn to another flexible indicator of informal use, namely street hawkers and temporary pieces of shelter. These brightly colored carts, parasols and tent tops are easily spotted using a satellite picture. When plotted on a map of Guangming the dots seems to concentrate in the center of the villages. On a lower level of scale, these dots concentrate around big structures in the village. These big halls are, confirmed with on-site observations, the market halls of the village. The market hall lies at the functional center of the village and is the most important commercial building of the village. These halls are managed by the village and are not officially registered at any formal government.

Officially registered shops can be easily found on digital maps applications. These shops represent the official commercial activity in the area. When plotted on a map of Guangming an interesting pattern emerges. The shops are aligned along streets that seem to converge around the market hall at the center of the village. These observations show that formal commercial activity and informal activity are closely related to each other.

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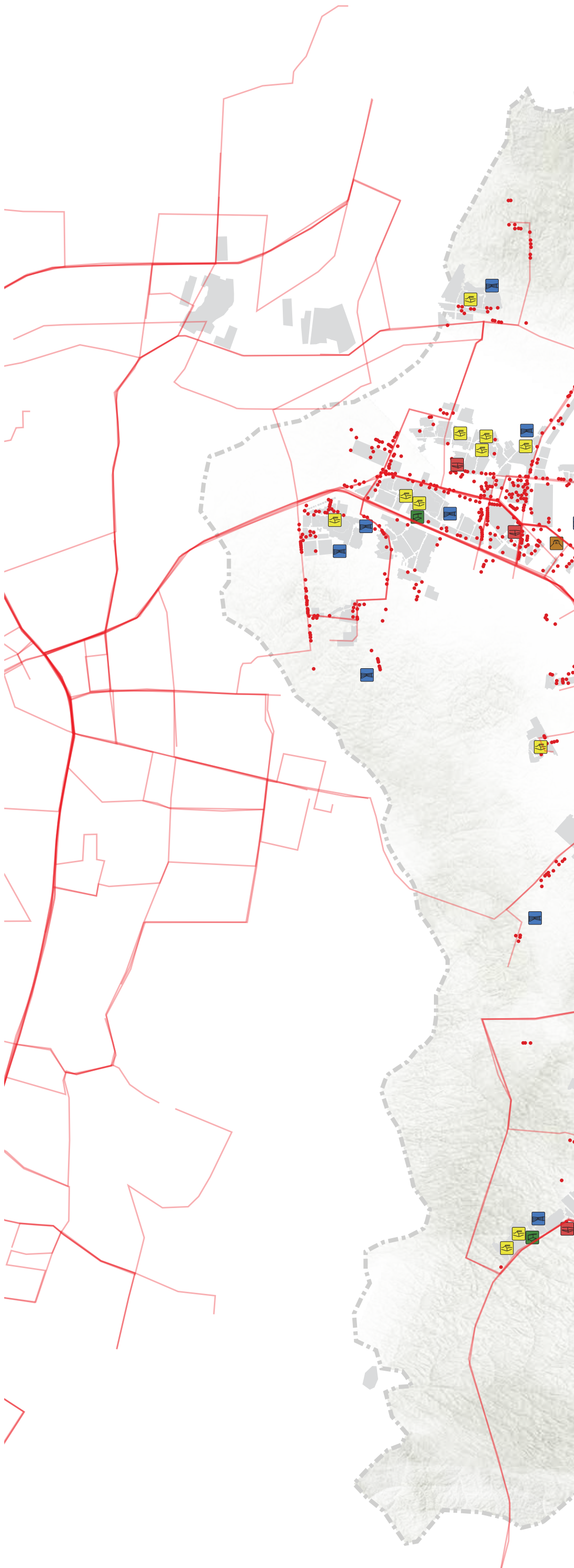
Typical scene from shoppingstreet in urban village. These informal businesses are not registered officially.

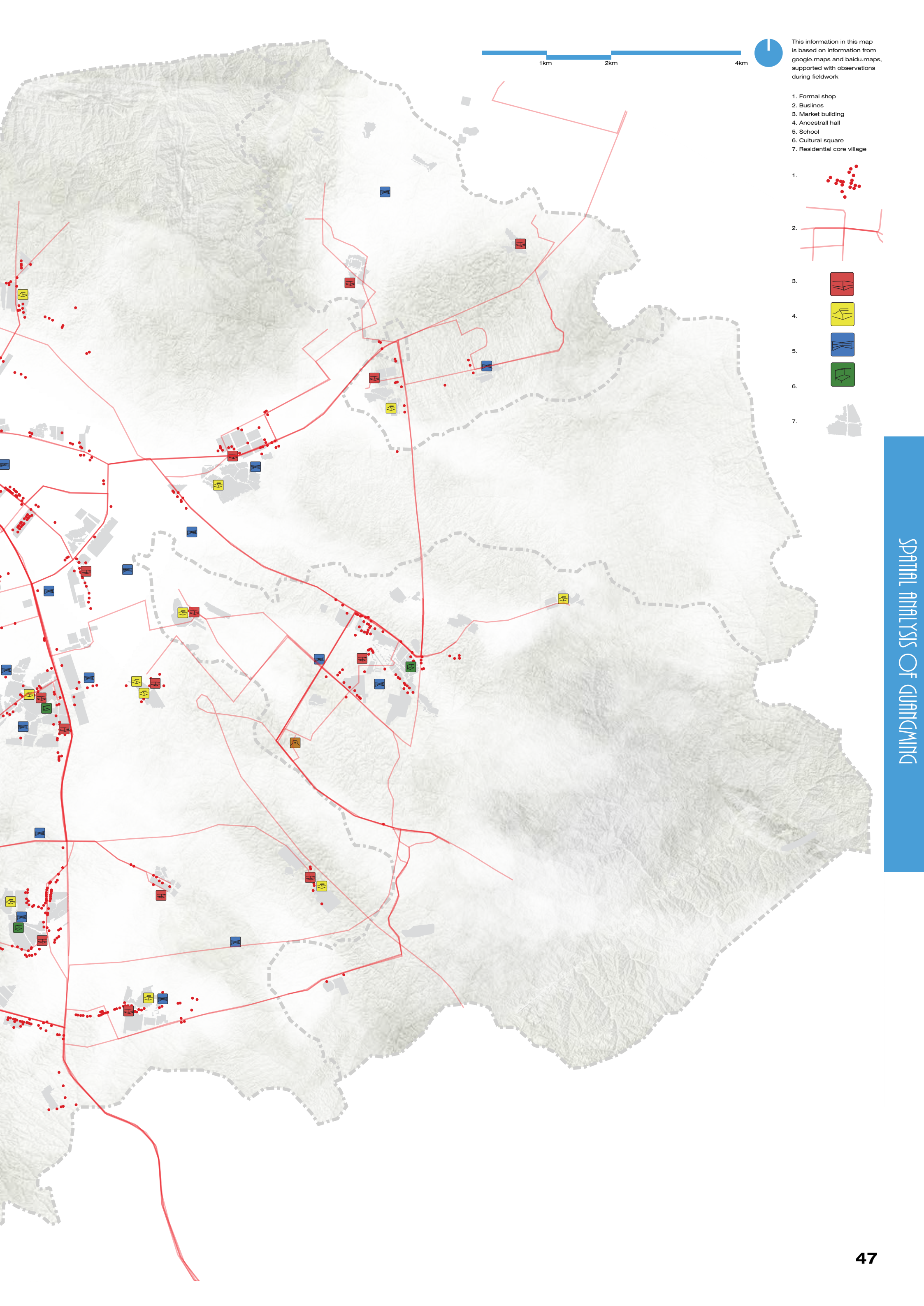


Example of a market building. The building can be recognized by the informal activity around the building. The bright red and purple colors represents individual street hawkers selling their goods



Example of a ancestral hall. The ancestrall hall can be recognized by its distinct form. The width of the building is usually slightly larger than the normal houses. In any case, it is longer than the normal houses, usually spanning 2 or 3 times the normal grid. The roof often has a green color. The color green represents harmony in tradional Chinese culture



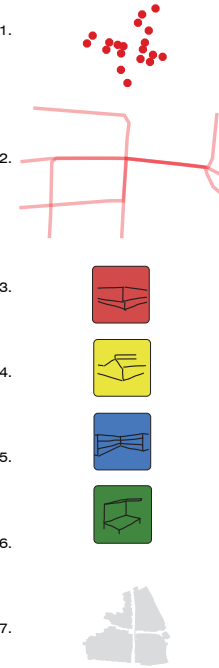


1km 2km 4km



This information in this map is based on information from google.maps and baidu.maps, supported with observations during fieldwork

- 1. Formal shop
- 2. Buslines
- 3. Market building
- 4. Ancestral hall
- 5. School
- 6. Cultural square
- 7. Residential core village



Direction of Guangzhou

Industrial landscape

A large percentage of the employment in Guangming is provided by the industrial production. As explained in chapter 4, there is a distinction between village-owned factories and privately owned factories. The two types of factories follow two different spatial logics. The village owned factories are organized around the residential core of the factory. The village committee only has the possibility to plan their factories on their own land. On the other hand, the privately owned factories are not restricted to the specific village boundaries. Developers can decide the location of their factory on the basis of economic factors, such as land price and truck accessibility. The infrastructure that supports the industrial development in Guangming was implemented in different stages. The urban highways that were implemented by the Shenzhen municipal government follow the villages along the two main river arteries. For the largest part, the regional roads are placed directly on top of the old network. Only when the highway reaches the village, does the urban highway move around the village, to prevent any expensive acquisition of land in the village. In retrospect, the roads through the villages look like exits from the urban highway, but in reality, the exits were there before the highway. The urban highway profile is characterized by a broad profile of three to five lanes in both directions, separated by a closed median. The axes of the intersections cross at the same level, controlled by traffic lights. The system of urban highways is connected to the system of regional highways through a select number of exits (four in Guangming). The regional highways connect Guangming to other cities like Shenzhen, Dongguan, and important airports and harbors. The two different organizational system with their own financial and legal restrictions create a dual system. Village-owned factories are organized in donut-shaped layout around the village, while privately owned factories are organized around the main roads that give a direct connection to the highway exits

CONTINUES ON NEXT PAGE

Direction of Guangzhou city

Direction of downtown Shenzhen

Direction of Dalang district

A factory compound with large bulky buildings that are both using for factory space, as for residential use.



The same factory compound in a aerial view. The factory has a single exit to the urban highway that connects the factory directly to the highways towards the harbours of Shenzhen



The current road system is bust with traffic. Trucks take goods from the factories to the harbours in the region.





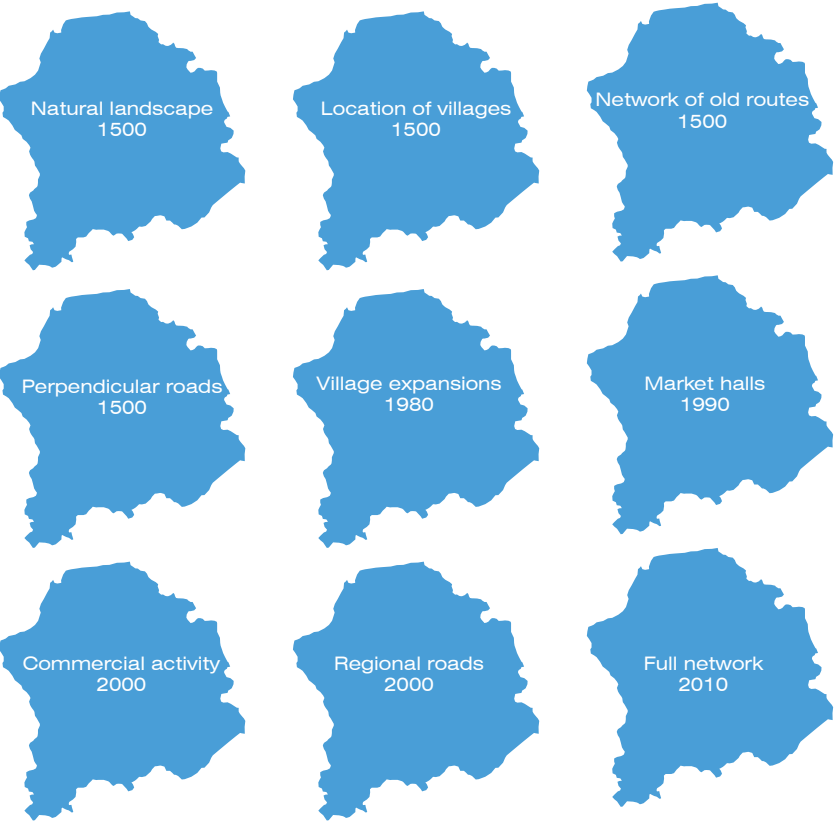
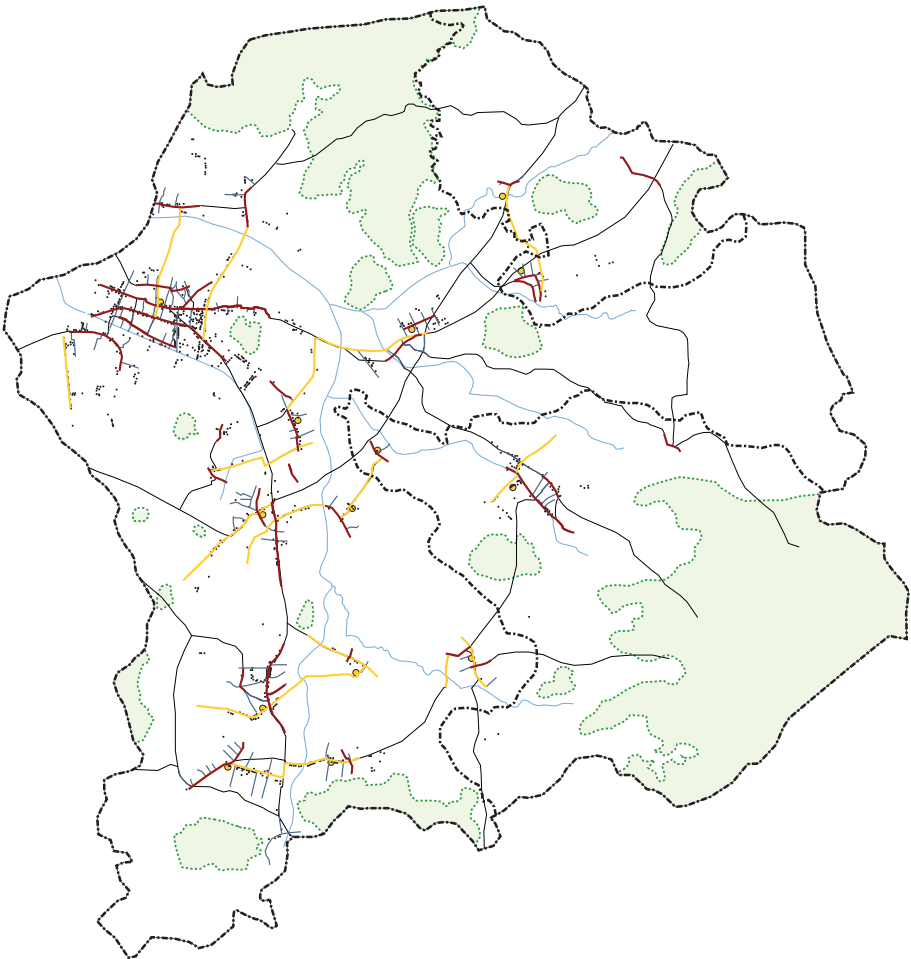
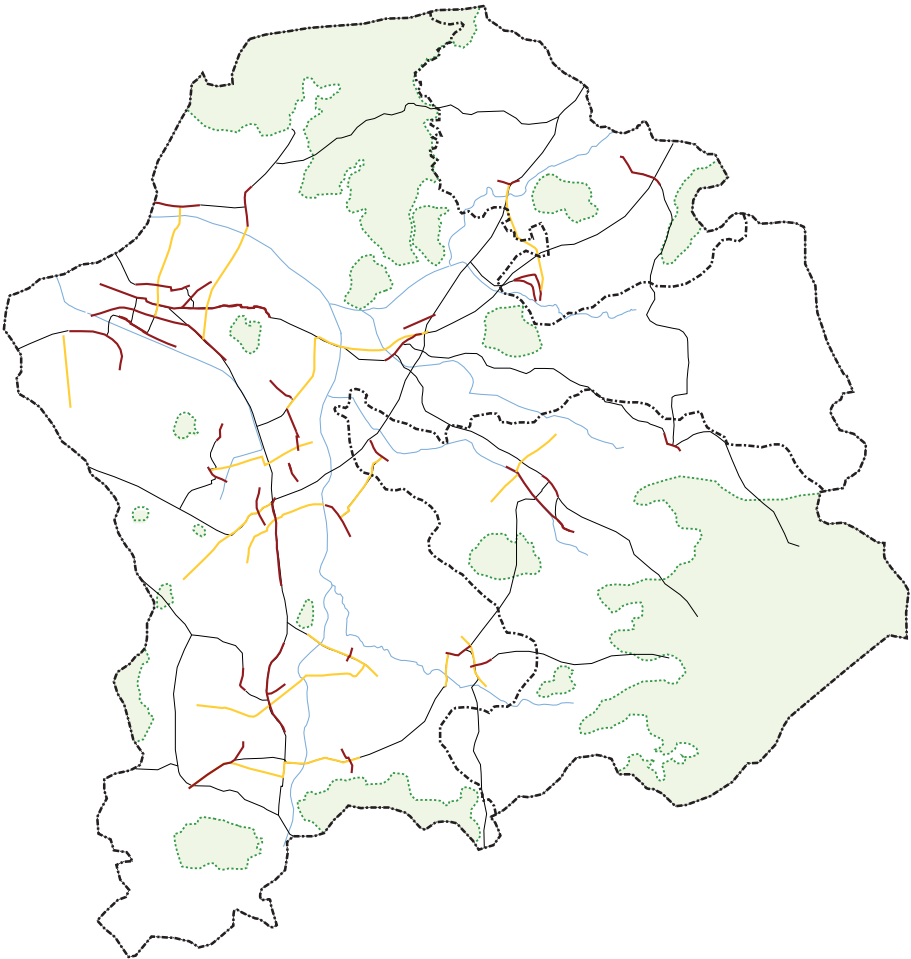
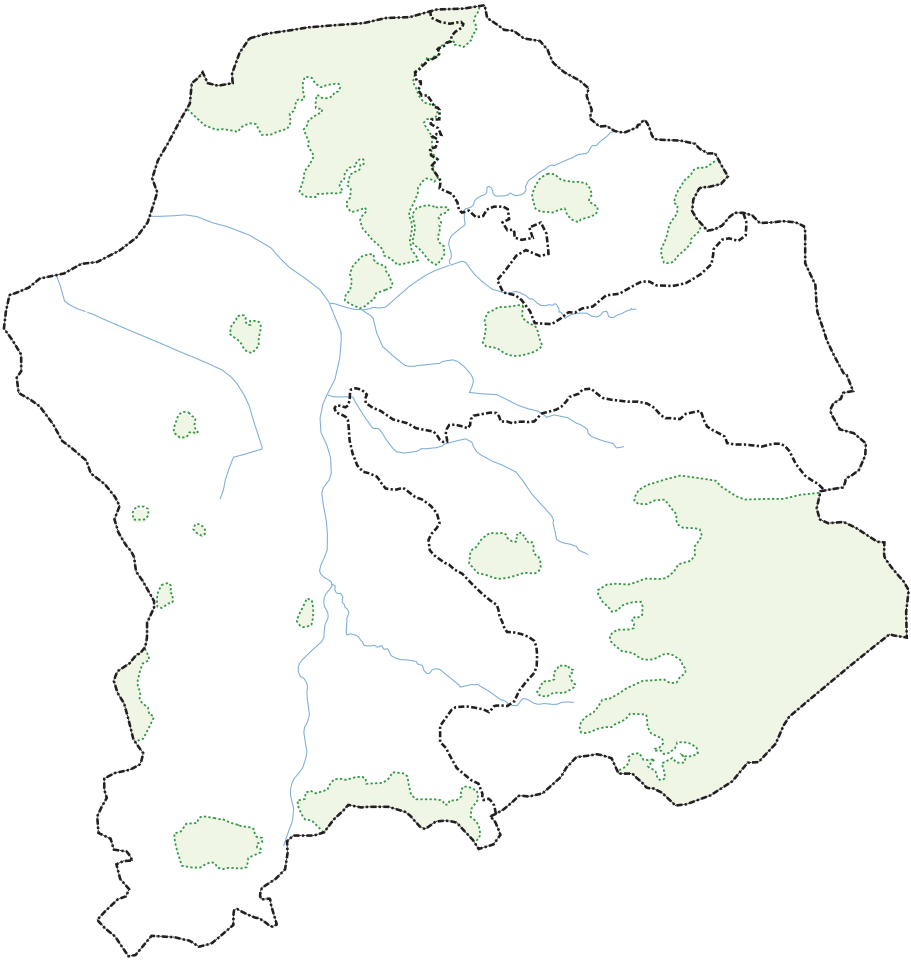
Conclusion

The spatial analysis shows that the informal settlements, their architecture, the natural landscape and the commercial activity are closely related to each other. Each new layer of the network is Guangming is a logical consequence of the older layers of the network. The conclusion of this layered structure of the network can be observed in the next sequence of maps. The sequence can be divided in two main periods; an establishment phase before 1980 and an expansion phase after 1980.

The establishment phase relates to the foundation of the villages and the system of roads that connected these early settlements. The year 1500 signifies the starting point for the development. Most villages can date their origin back to 500 years. For this analysis we assume that the natural landscape was pristine up to that point. The year 1600 marks the point of establishment settlement in the region. The villages are set back from the river for the reasons of flooding an fertile land. In front of the villages lies the collective space of the village that has a direction parallel to the river the villages faces. The year 1700 is taken at the moment where the collective spaces of the village are part of a regional network of roads that connect the villages to each other and beyond. Perpendicular to the collective spaces of the village and the regional network connecting them is a system of roads that connect the highgrounds to the village, across the fertile plains, over the river and to the village on the opposite side of the village.

The expansion phase relates to the growth of the villages from the 1990's onwards. Following the structure laid down by the regional network the expansions fit the loose grid. The market halls are situated at the crossroads of major connections in the network, usually at the intersection of a parallel road and a perpendicular road. The market hall acts as a pivotal hub in the commercial system. The commercial activity is especially strong along the perpendicular roads. This makes sense, because these roads cut through the different functional areas of Guangming. The final image shows the full network as a compilation of all the previous systems. Seen as a separate mage, the network appears chaotic. It is only through the careful analysis of the different networks in Guangming to be able to understand the underlying logic of the system.

END OF CHAPTER

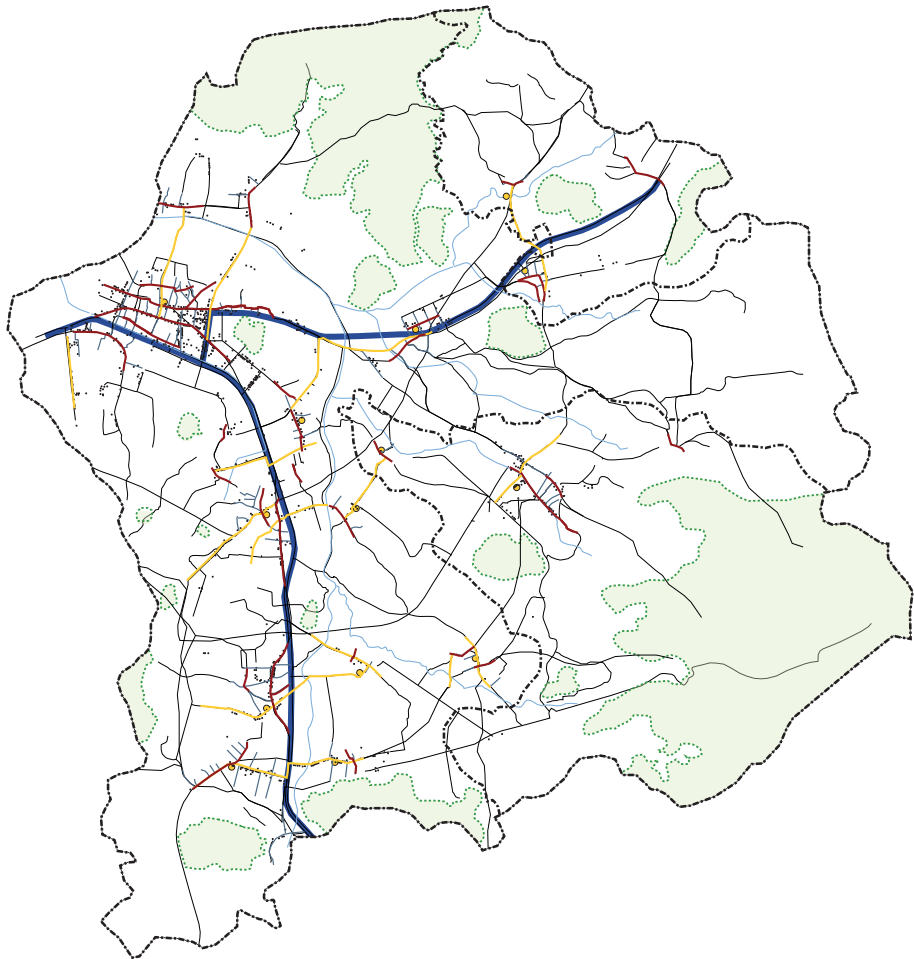
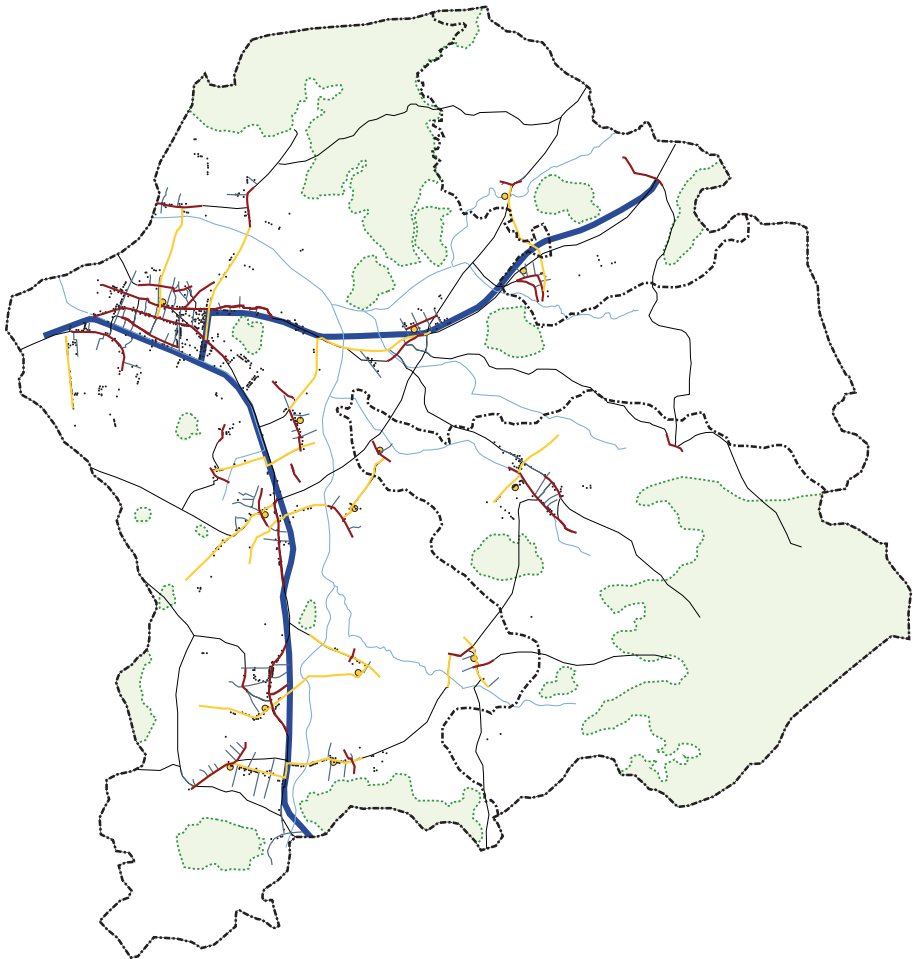
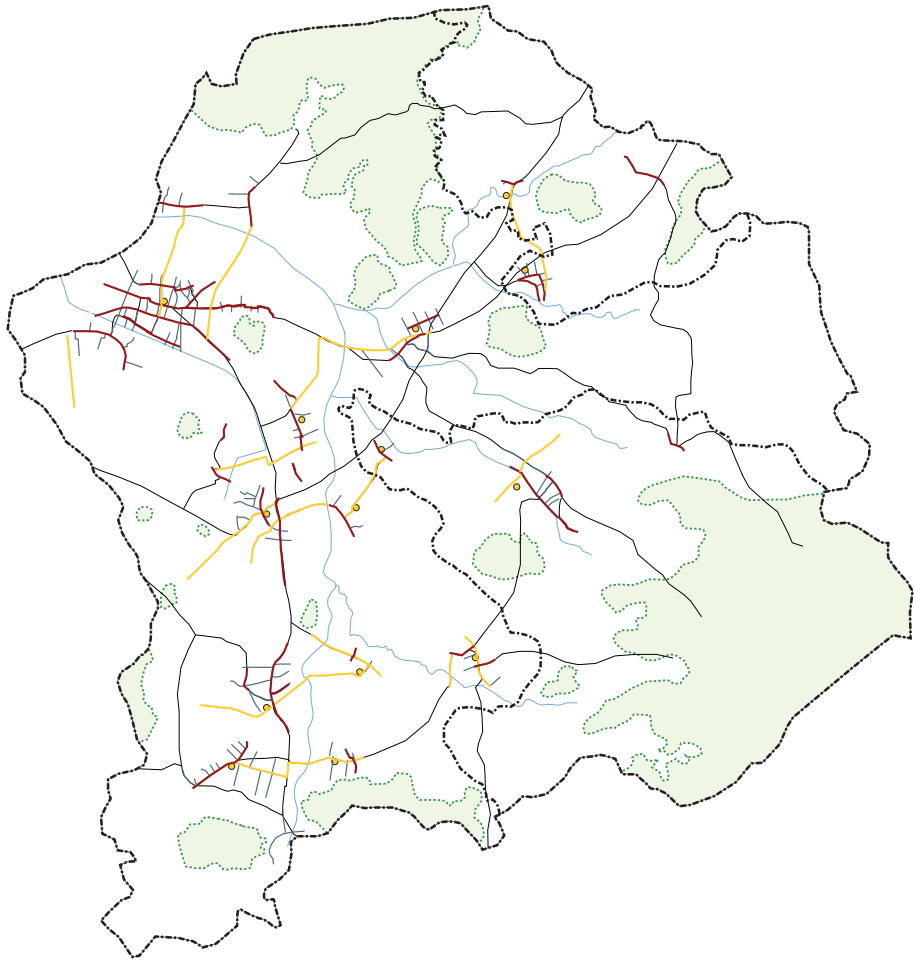
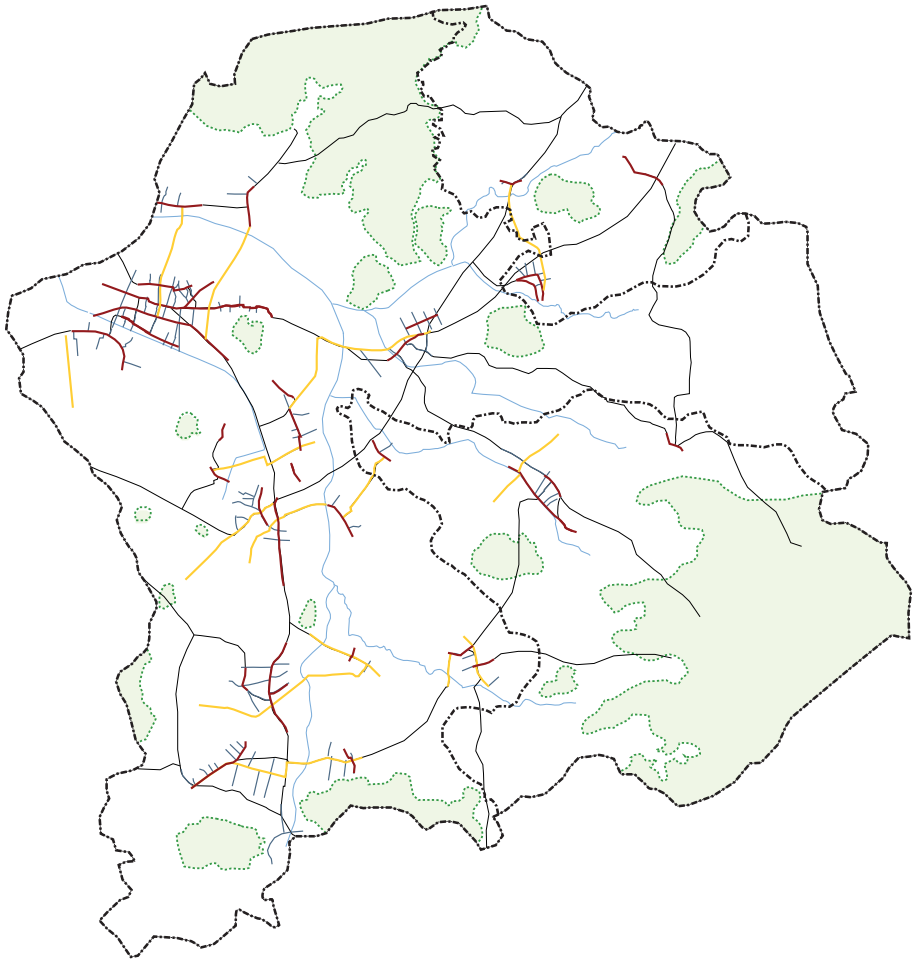
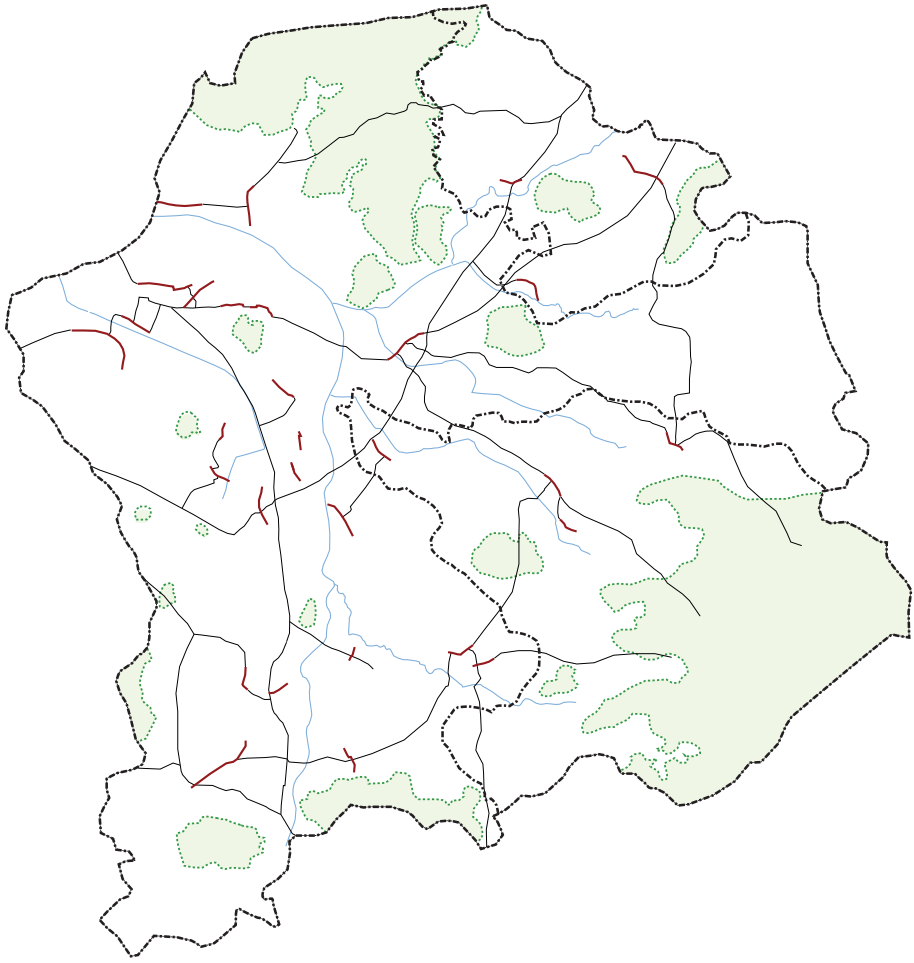
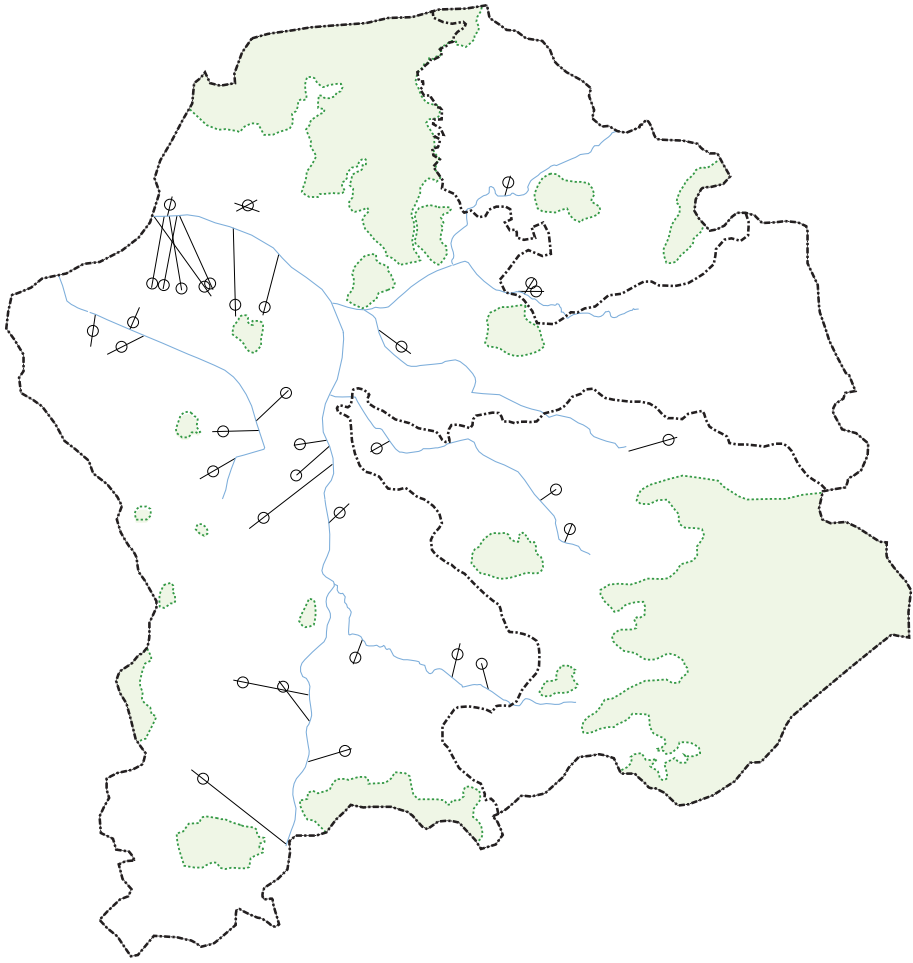
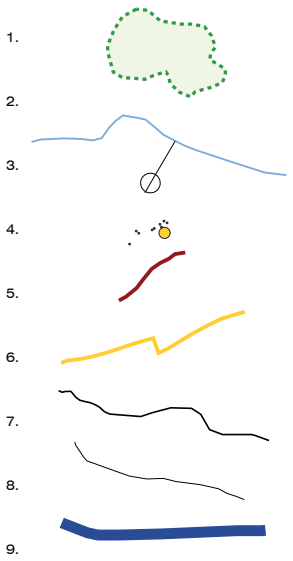


2,5km 5km 10km



This information in this map is based on satellite images, supported with observations during fieldwork

1. Hills
2. River
3. Orientation towards river
4. Market building and shops
5. Collective space
6. Perpendicular roads
7. Old routes
8. Minor lines in network
9. Regional roads



#8

TYPOLOGICAL INVENTORY OF VILLAGES



Introduction

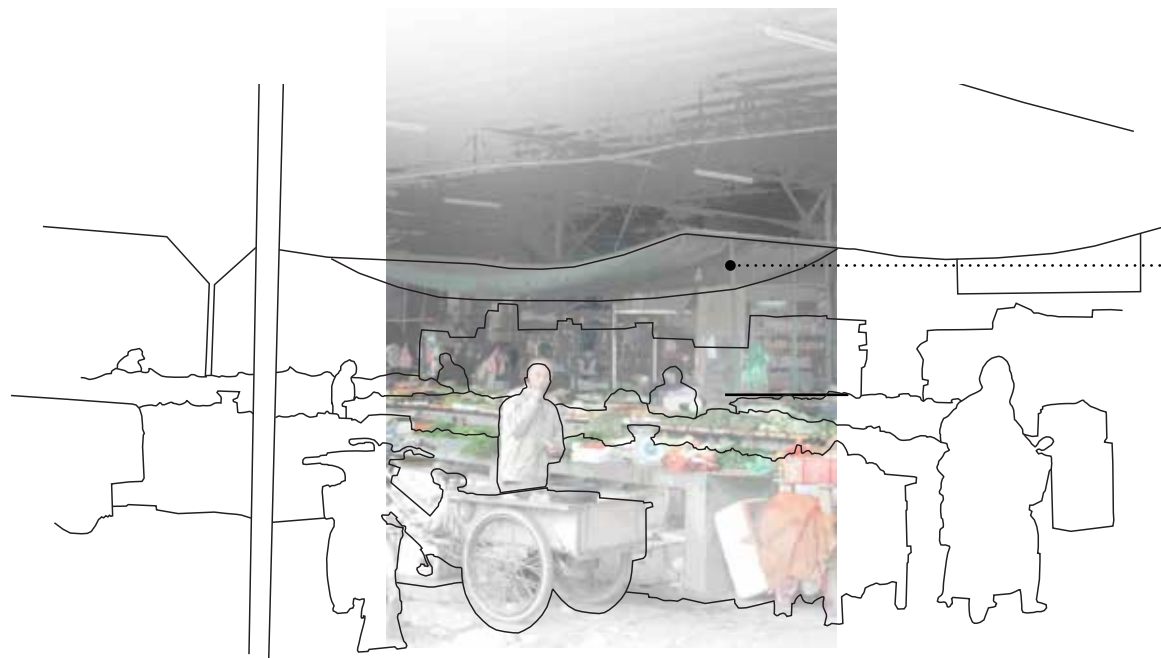
Morphological and functional studies of the elements in Guangming reveal different degrees of development for the villages in Guangming as was expected. The distinction between rural, suburban, peri-urban and urban villages that are related to the degree of embeddedness is not enough in understanding the internal spatial structure and the presence of certain spatial elements in the villages. In order to develop a comprehensive approach to improve the integration of the villages with the formal city, it is necessary to have a precise typological description for each stage of development. Based on typological research this chapter will introduce five stages in the development process, each with their own characteristics and challenges. By using the informative framework on the interests of stakeholders and the spatial analysis, the development and position of the villages, can be explained. The five development stages form the basis for future development of the Guangming district.

Setup of typological research

The review on informal development in Shenzhen brought forward multiple spaces that are produced in the informal development process. Not all of these spaces can be mapped in Guangming because of a lack of data, or simply because these elements are no longer or not yet present in Guangming. These spaces that can be mapped are the historical origin, size, presence of agricultural land, presence of a market, presence of school, presence of government subsidized urban facilities, location. Based on the presence or size of these spaces it is possible to make a distinction between different villages. The typological research looks at these seven different factors to determine in which stage of the development process a particular village is. This typological distinction is important to make sure that any design strategy fits the village it is implemented in.

The information for these maps comes from three different sources. The location of the villages is taken from the 1940 US army map and satellite images. The information on the size, agricultural activity, presence of market, presence of urban facilities and presence of historic cores is a combined effort from satellite images. Schools and commercial activity are extracted from google.maps and baidu.maps

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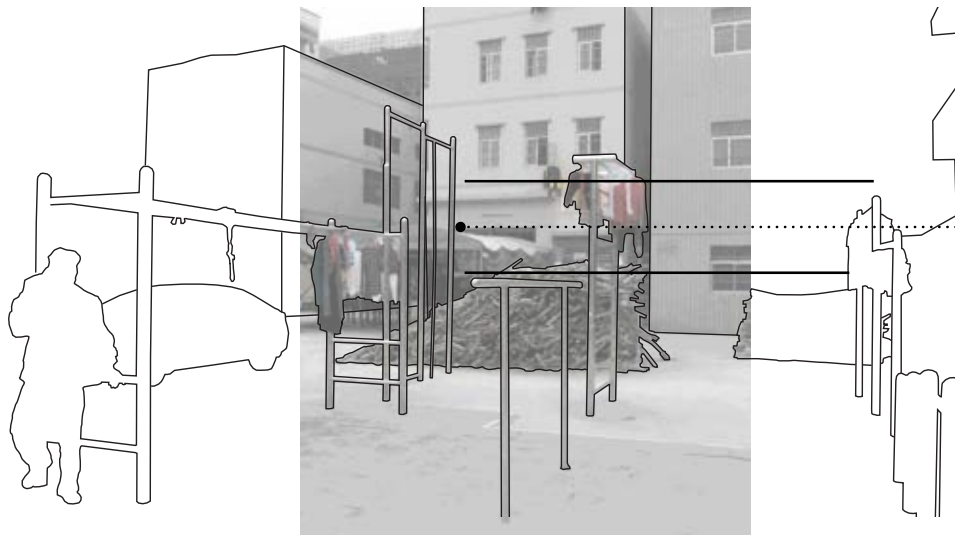


The market hall is a place for trade. The market hall varies between actual concrete buildings, to covered outdoor squares. Market halls feature a great variety of goods, having meat, fresh vegetables, electronics, clothing and many other items for sale. The market hall can gain a unique position in the city when it specializes in one particular sector like clothing or electronics. The market provides not only an economic function, both also a social one. It is a place for people to meet, gossip, argue.

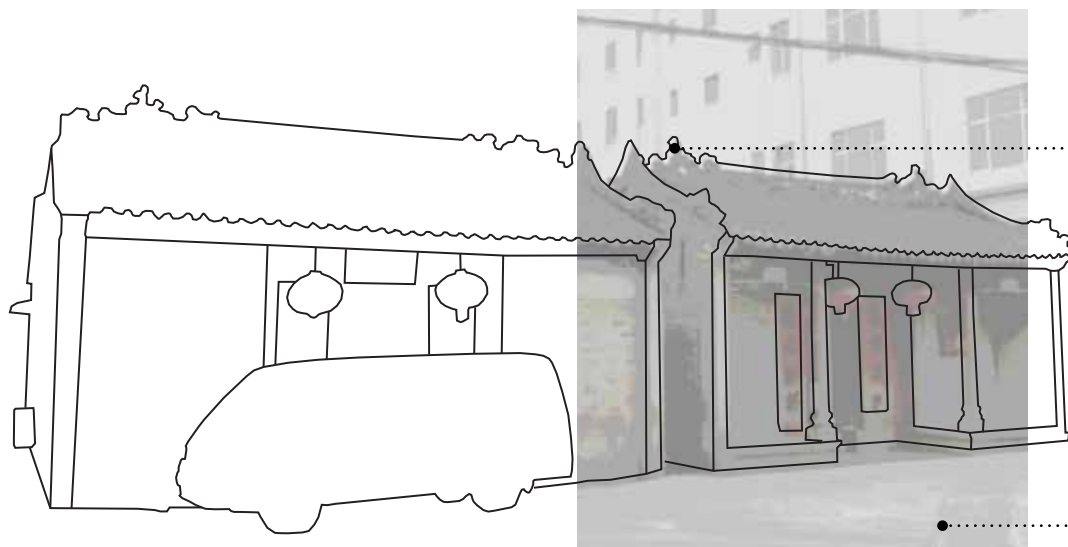
Selected spatial elements

See page 35

- Location in subdistrict
- Cultural square and or urban facilities
- Ancestral hall
- Gated residential compounds
- Horticultural land
- Residential expansions
- Market hall



Urban gymnastics equipment have been installed in most urban villages. In the downtown area of the city these are well used for their original purpose. But here the racks are used to dry laundry. The recreation ground offers space for the people to temporarily store their construction material.



The ancestral hall or temple is a place for ancestor worship. Most of the halls are several hundreds years old and still have most of the original details. For a western audience, the ancestral hall is easiest compared with the church. Historically ancestral halls were closely linked with the confusion faith, and provided a place to pay respect to your ancestors. The halls are maintained by collective funds from the village committee.

The ancestral hall is the centre of the original community that lived in the village. Because of the strong emphasis on ancestral lineage, the role that these halls play for the migrants is little.



New gated residential compounds are a good indicator of increased formalization of the village

Despite the height of the new residential towers, the built density of the towers is lower than the buildings in the new expansions of the village. Also, because the apartments in the new towers are much spacier, the population density is much lower than in the village.

Every compound is gated and only has one or two entrance points, that can only be accessed by the inhabitants of the towers



Small plots of horticulture provide a employment opportunity for many new migrants in the area. The economic output is very low, which makes the area's very likely to be developed.

Typological observations

None of the villages has been demolished yet. This means that the land price is not sufficiently high enough for the villagers to choose the one-time sale over their monthly rental income from their property. Some of the largest village do face the demolition of their old core under the pressure for development. The gated residential communities are most present around the largest villages, replacing former industrial compounds.

Villages with an old core have seen far greater growth than the communist villages. Not only the origin of the village seems to mater, also its position in either the Gongming or Guangming subdistrict strongly affects the potential of a village to grow. Village expansions are very limited in the Guangming subdistrict. It seems that the local government was more strict in the control of

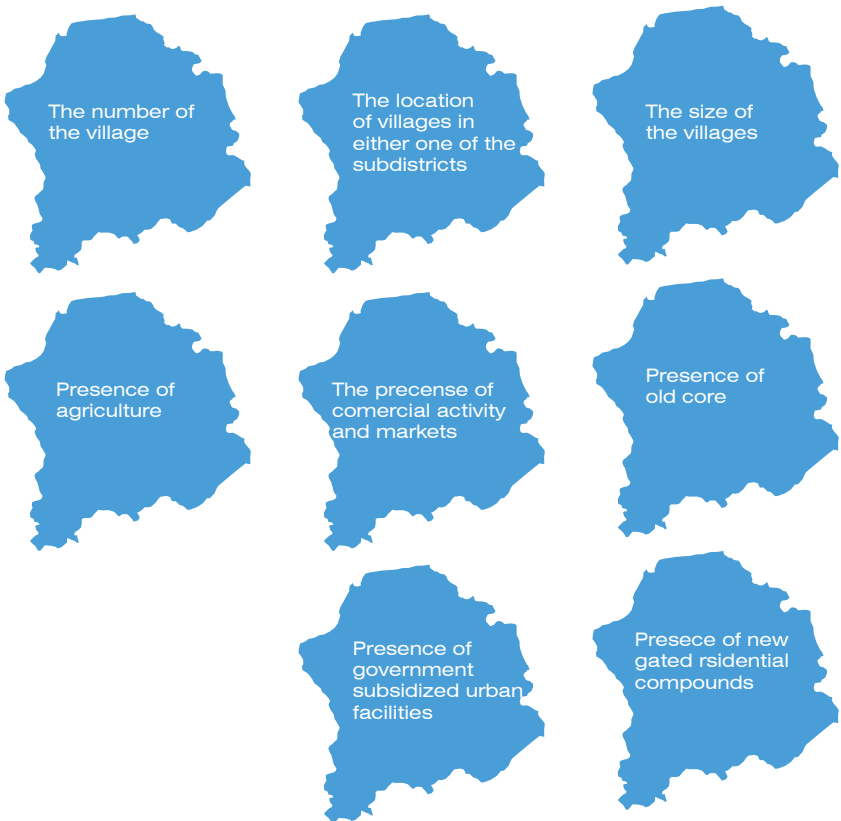
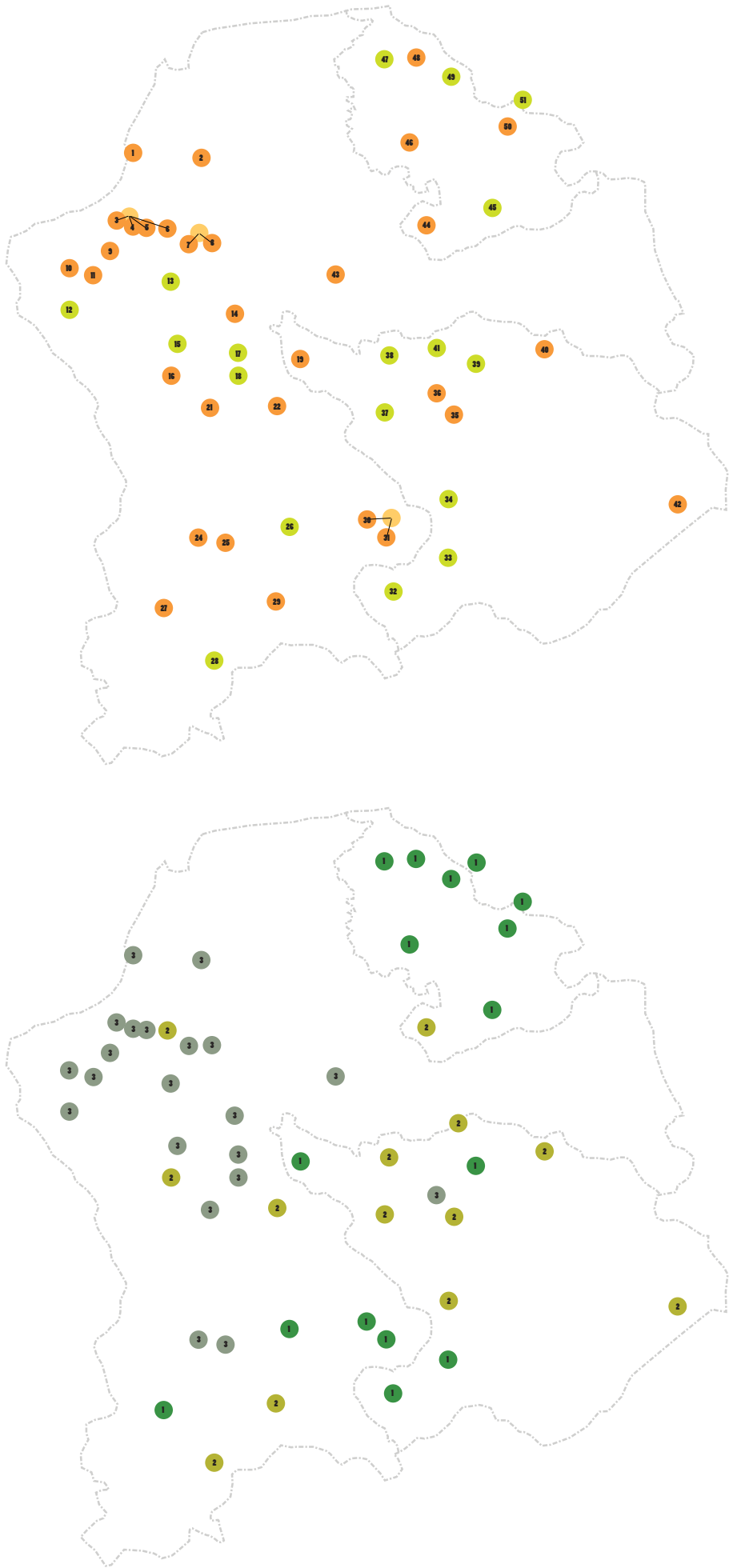
the urban rules in this area.

Urban facilities are placed equally over the territory. They are not related to the location in either the Gongming or Guangming subdistrict or to the size of the village. They seem related to the oldest villages of the region, implying a special right that is recognized to the oldest villages.

The commercial activity of a village is closely related to the size of the village. A bigger village has generally speaking also more commercial activities. An important moment in the growth of a village is the appearance of a market building. A market building seems to boost the commercial activity of a village strongly. The commercial activity is not only related to its size and the presence of a market, but also to its position to other villages. When a village is located to a significantly larger village, the commercial activity is smaller than you would expect for a village of that size. When a village is located to a village of similar size, their seems to be a positive influence on the commercial activity of the village.

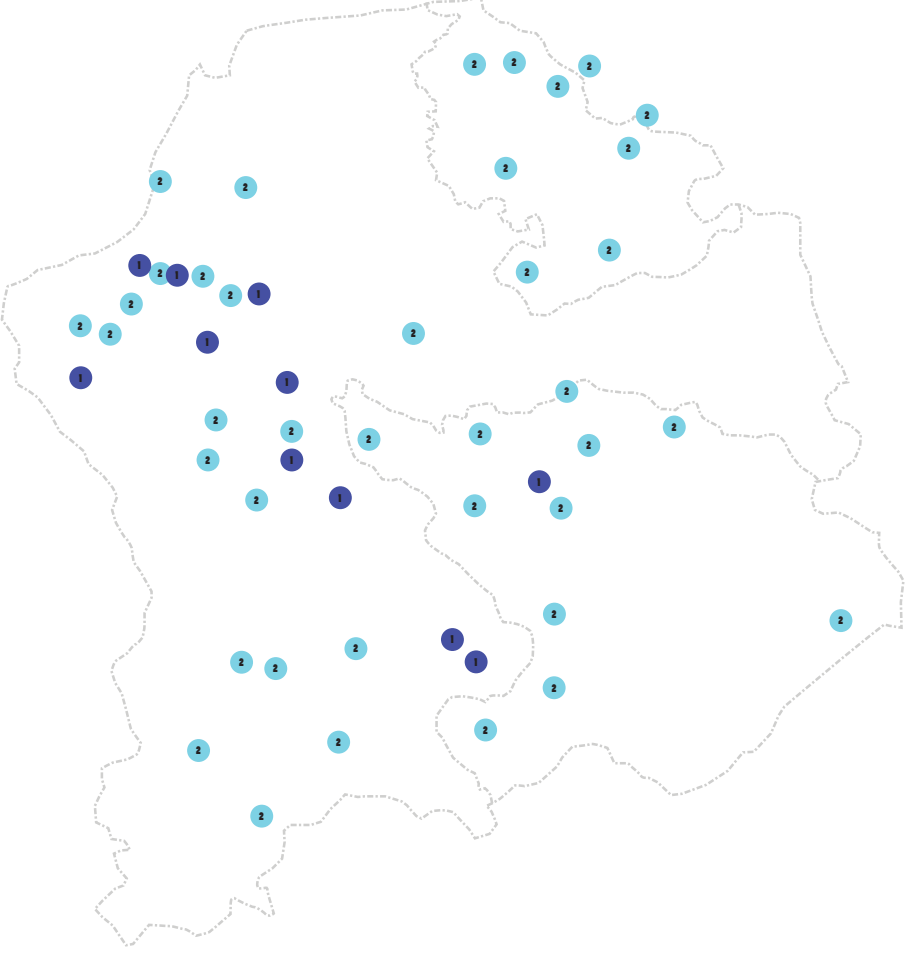
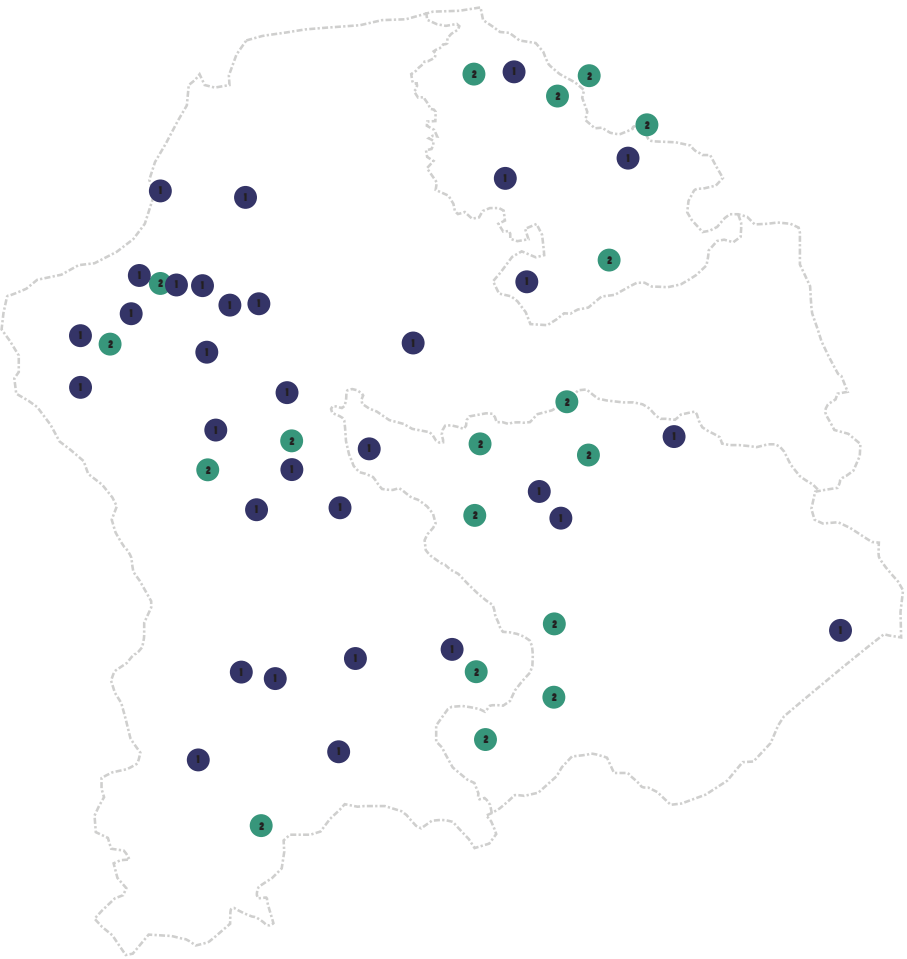
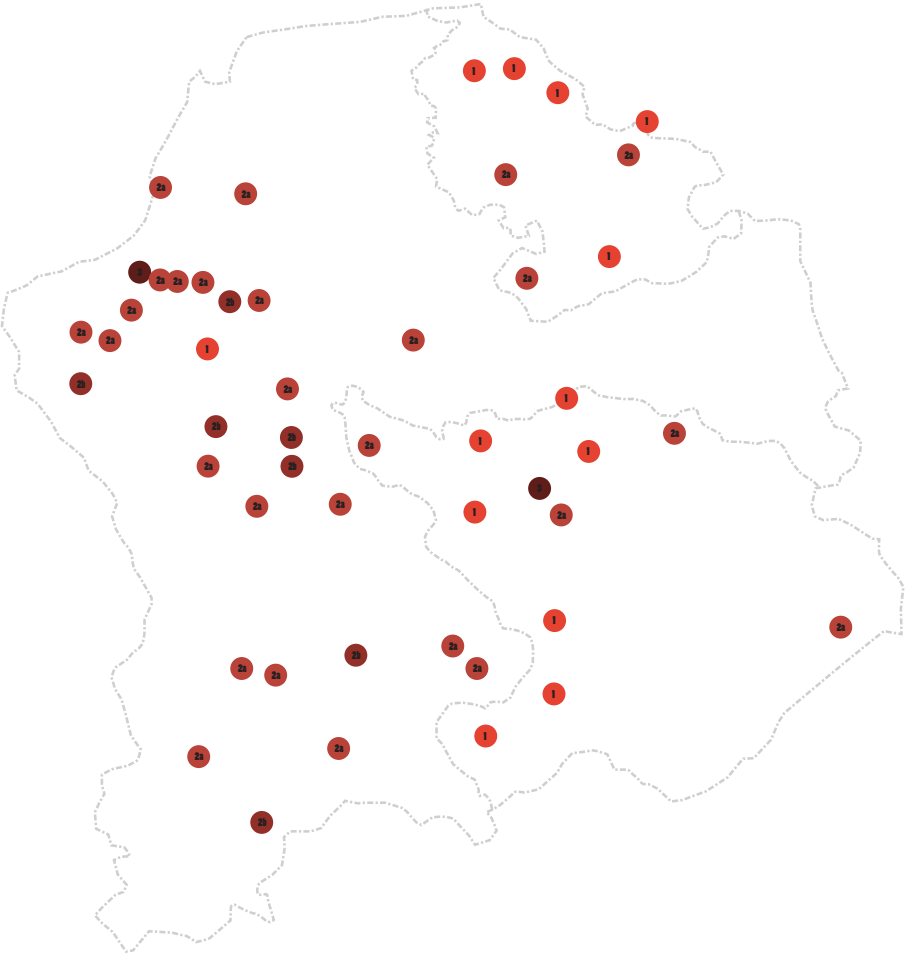
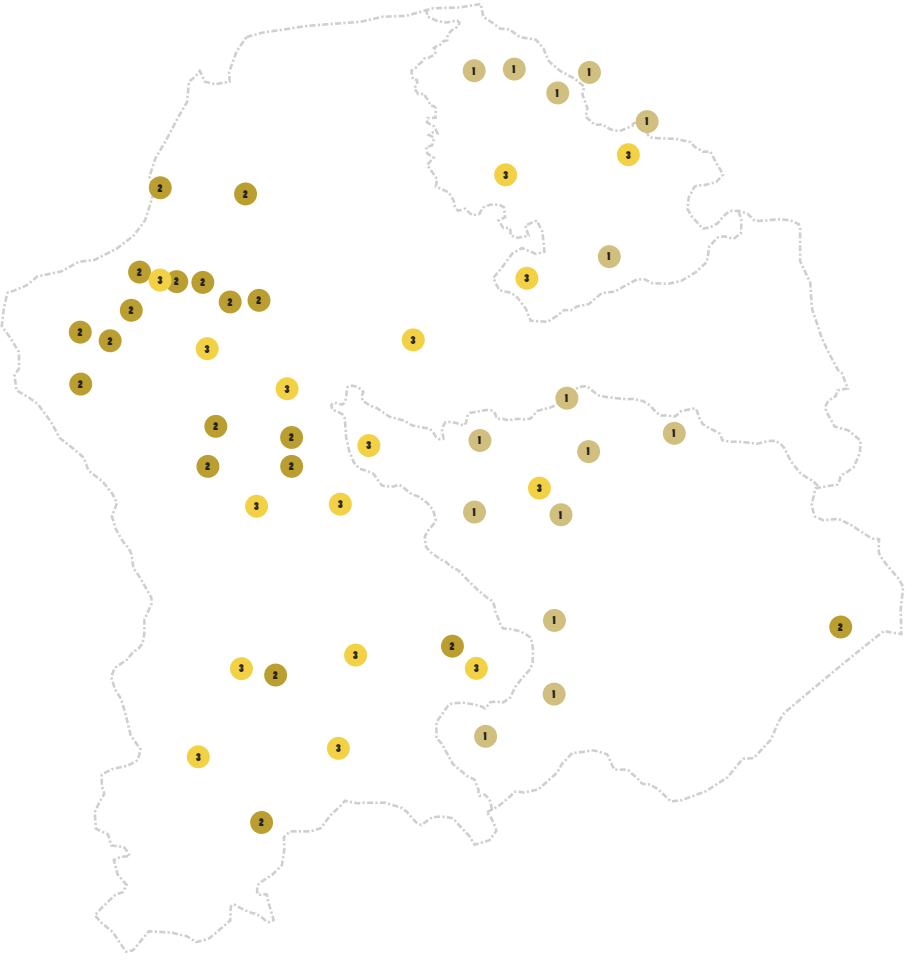
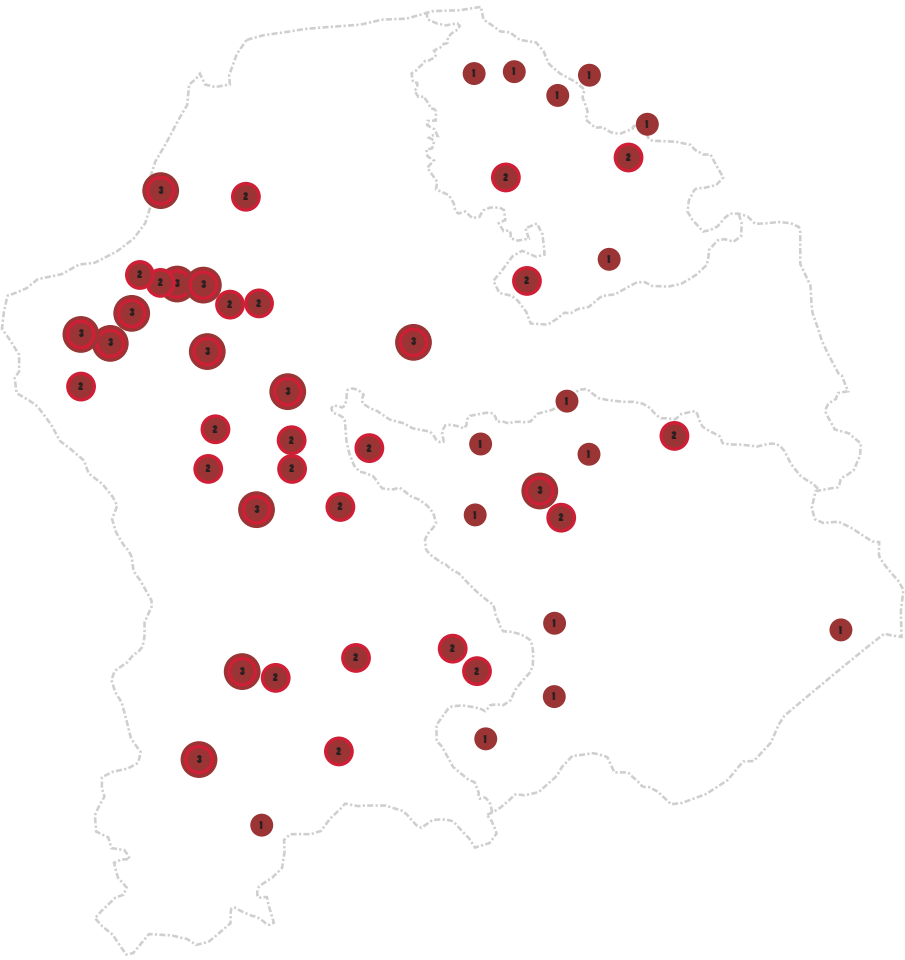
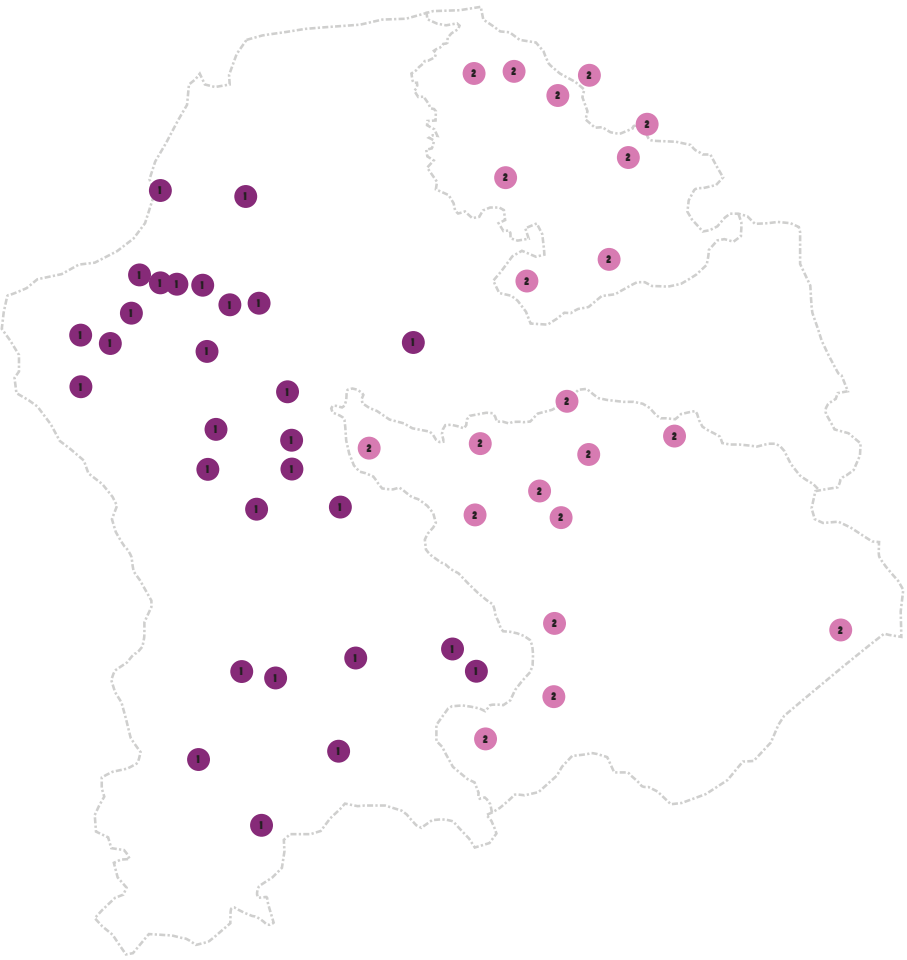
To conclude, all the characteristics per village have been put together in a single scheme. The horizontal rows represent the eight different elements that have been mapped. The vertical rows represent the 50 villages of Guangming. When looking at the scheme distinct patterns emerge, which confirms the information from the observations that certain elements in village are related to each other.

The observations on the different characteristics of the villages can be explained using the informative framework developed in chapter 4. The different

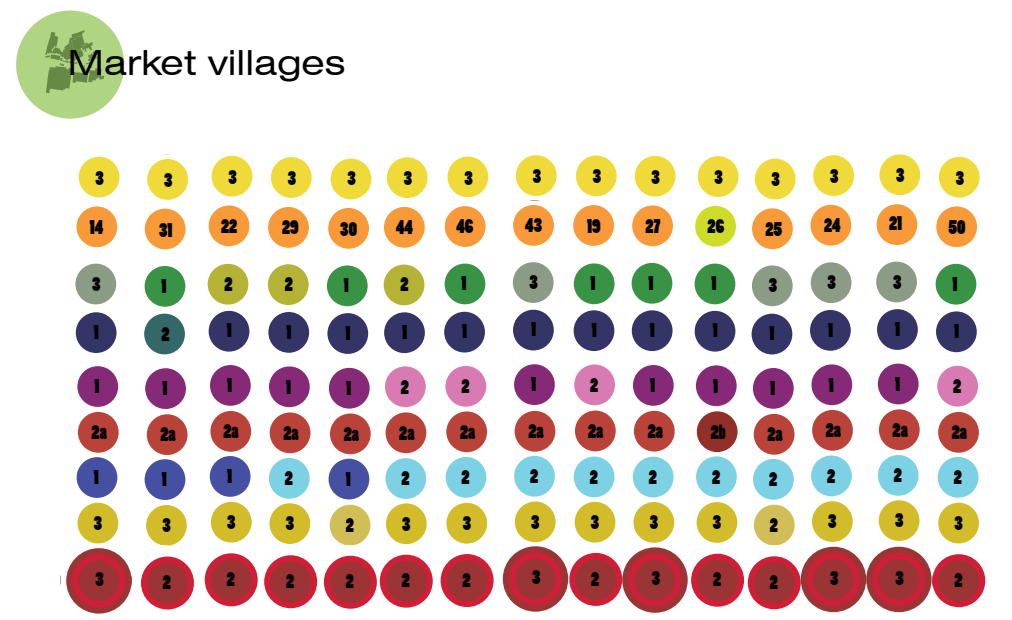
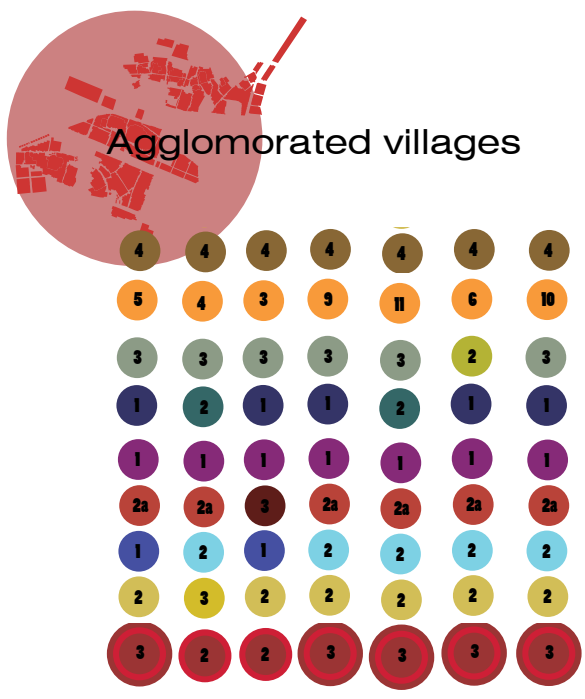


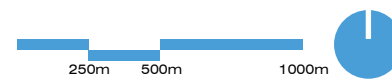


This information in this map is based on the spatial analysis of chapter 7 of this research



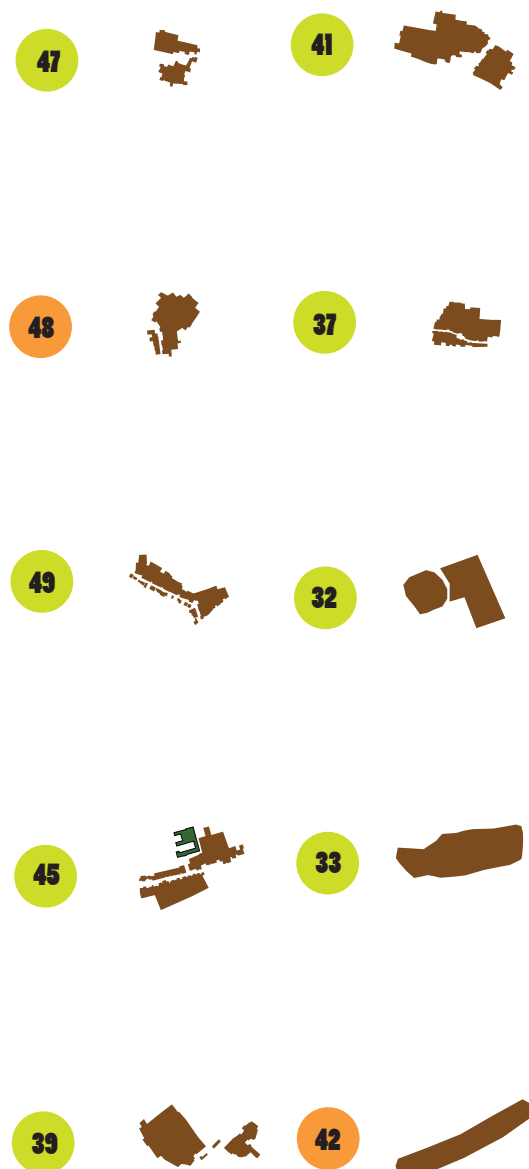
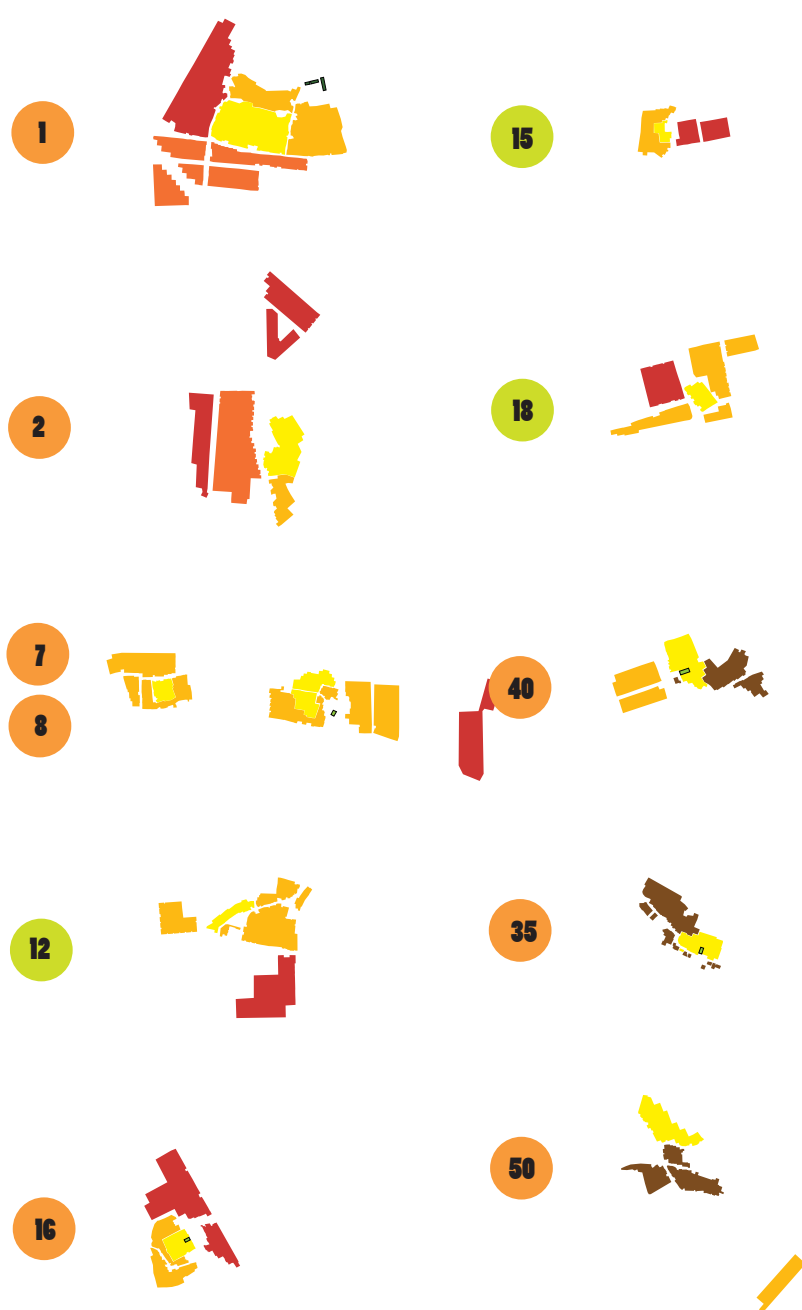
- 1. Number village
- 2. Number village
- 3. Guangming territory
- 4. Gongming territory
- 5. Size of village
- 6. Much agriculture
- 7. Some agriculture
- 8. No agriculture
- 9. No commercial activity
- 10. Some commercial activity
- 11. Market building
- 12. No old core
- 13. Old core
- 14. Destroyed old core
- 15. Urban facilities
- 16. No urban facilities
- 17. Gated housing compounds
- 18. No housing compounds



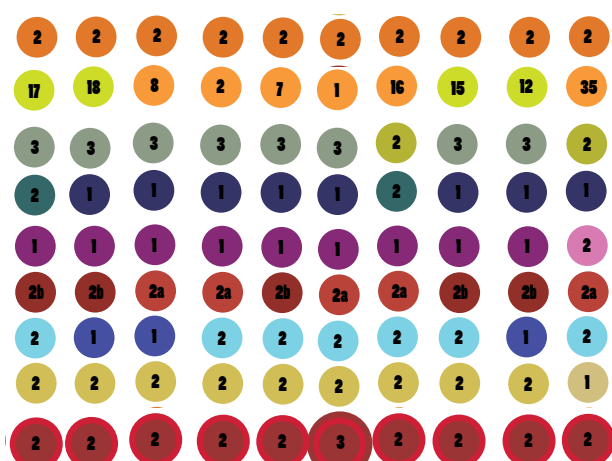


The information in the overview is obtained through comparing the 1955 US army map, with satellite images of 2000 en 2010.

1. Old core
2. First expansion
3. Second expansion
4. Third expansion
5. Restructured village
6. Communist village
7. Market building
8. School building
9. Ansetrall hall
10. Cultural building



Production villages



Peripheral villages



7. Village type
8. Number of village
9. Agricultural production
10. Presence of urban facilities
11. Location of village
12. Presence of old core
13. Presence of gated housing
14. Commercial activity
15. Size of village

interaction between the main stakeholders had led to a different development speed for different villages. The division between five developmental stages represents the integration of the theoretical framework and the spatial and empirical research. The categorization of villages does not represent a strict divide. Individual villages may differ slightly from the general type and thus a spectrum of villages appears. The next section will explore the five development stages by means of a research by design methodology.

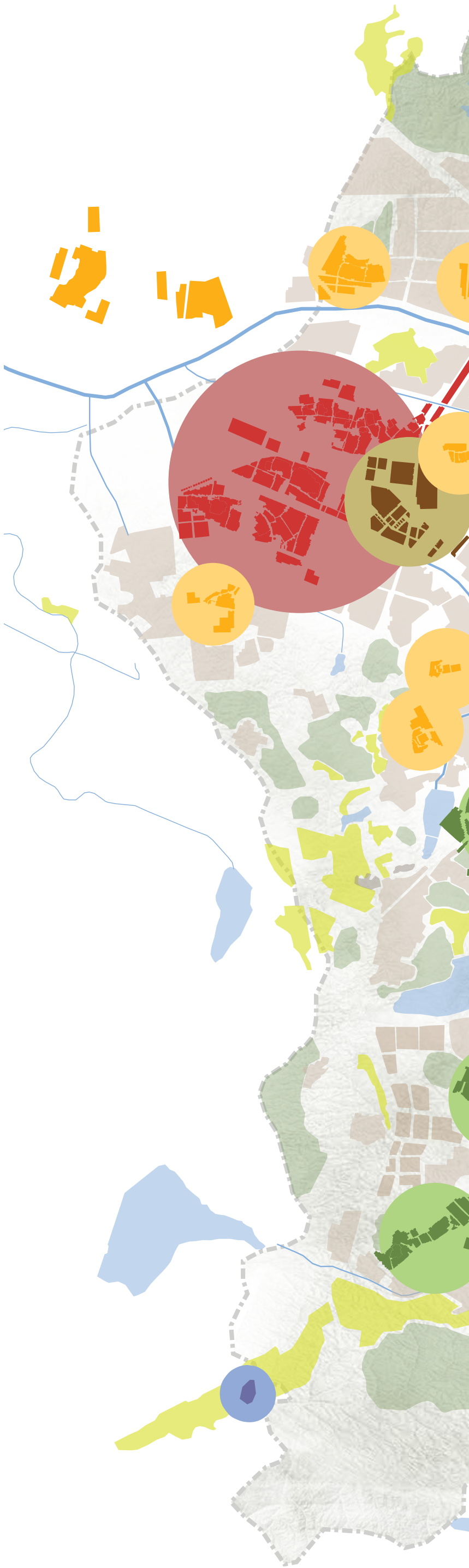
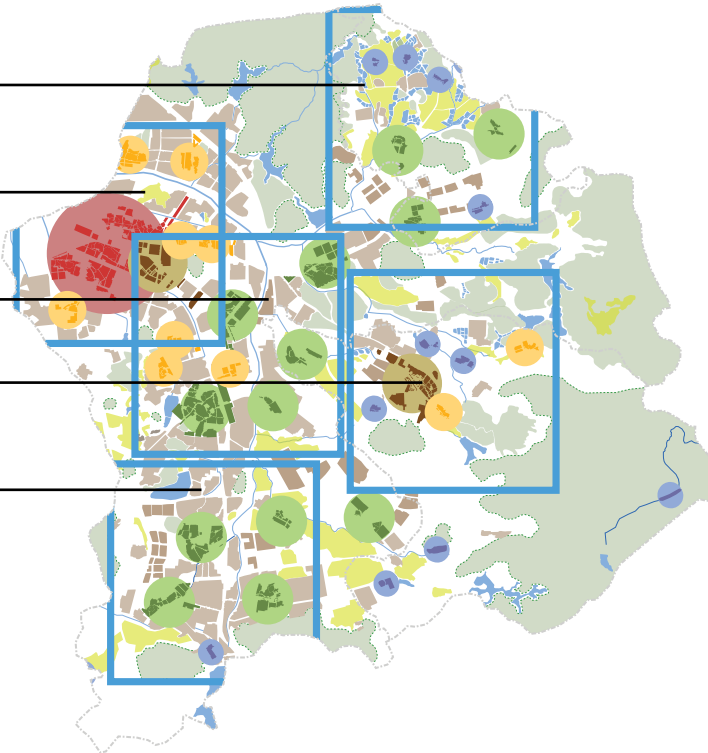
Conclusion

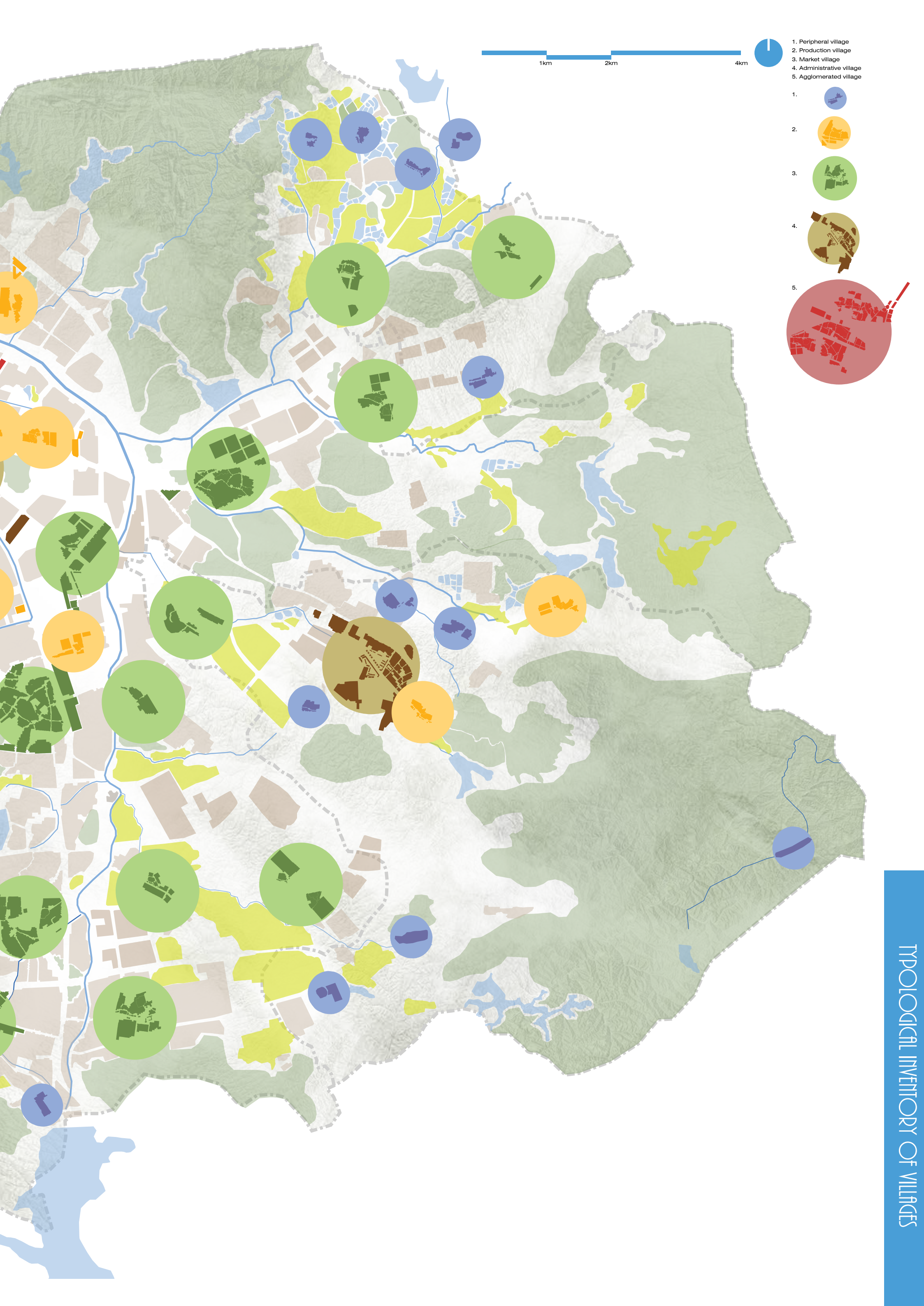
The 52 villages of Guangming show different degrees of development. Literature divides the villages in 3 stages - sub-urban, peri-urban and urban – that are related to their position towards the formal city. The research in this section suggests a slightly different division, based on the intrinsic structure of the villages, rather than the position towards the formal city. The villages of Guangming can be divided into five different stages of development– the peripheral, the production, the market, the administrative and agglomerated village –, each with its own characteristics and challenges. These development stages each require a different approach for a successful integration into the formal planning. The next part of this thesis is concerned with a future development proposal for the Guangming district, in which the structure of regional fabric and the development stages of the villages form the basis.

END OF CHAPTER

In the next part a number of design studies will explore the different development stages of Guangming

- 1. Design study focussing on peripheral villages in a very rural part of Guangming (see page 64-65)
- 2. Design study focussing on agglomerated villages in the Gongming centre (see page 72-73)
- 3. Design study focussing on production villages in central Guangming (see page 66-67)
- 4. Design study focussing on administrative villages in the Guangming centre (see page 70-71)
- 5. Design study focussing on market villages in the southern Guangming (see page 68-69)





8#

CAPTURING THE QUALITY OF INFORMALITY



Introduction

The existing network in Guangming allows for a large diversity of informal opportunities. Different villages create different socio-economic conditions, where migrants in different stages of their transition can find jobs that match their skillsets and housing that they can afford. These informal opportunities are embedded in the space of the layered structure of the regional system of Guangming. The purpose of the following analysis is to capture the quality of the informally grown villages and network. Only with the knowledge about why informality happens or not, can clear guidelines be formulated that support informal activity. The quality of the informal settlements will be divided in two categories. The first section will discuss the quality of the urban fabric in the region. The second section will go down in scale and discuss the quality of the collective space inside the villages. The quality that is being discussed is principle about the opportunities it creates for the floating population. The characteristics that describe this quality deal mostly with very pragmatic issues and are less concerned with ideas about aesthetics and appearance. The characteristics that are extracted to describe the core structure of the informally organized networks and spaces can be translated into guidelines for future development.

The regional fabric

The informal network as it was found in the last chapter has a particular form that follows from the historical structure. It is clear that the network support the informal activities that take place there, because the network itself is a product of the informal growth process. This section will try to capture the precise quality of this informal network so that its most essentials parts can be preserved. The qualities of the fabric might also be translated to new areas, thus enabling the design to allow for informal activities. In support of my own spatial analysis I draw upon some established theories on urban networks. The slow-process socio-economic change of the migrants, that is the aim of the project, forms the basis for Salat's theory of systematic resilience of complex urban systems. This theory states that in order to achieve a dynamically stable urban state, three conditions of the urban system must be met: "a high connectivity, the presence of a mechanism that creates new connections and a sufficiently low degree of control, since less control implies emergence and vice versa." To support his proposition, he quotes work done by Christopher Alexander on the difference between natural and artificial cities. In *The life and Death of great American cities* Jane Jacobs emphasis the importance of vital street life in the health of a city. Jacobs defines four conditions for a healthy city which are mixed use, short blocks, variety in building-age and high density (Jacobs, 1961). Together these theories provide some leavers to understand the informally grown network in Guangming.

"A city is not a tree." In Christopher's famous essay he described the difference between natural and artificial cities. According to Alexander natural cities arise in a spontaneous way, while the artificial city is deliberately created by designers and planners. Alexander argues that there is an essential element missing in artificial cities and he thus asks himself the question "What is the inner nature, the ordering principle, which distinguishes the artificial city from

the natural city?" Many of the artificial cities that Alexander refers to, operate according to a tree-like structure. Tree structures are simple in the sense that each unit is only connected 'through the medium of that unit as a whole'.

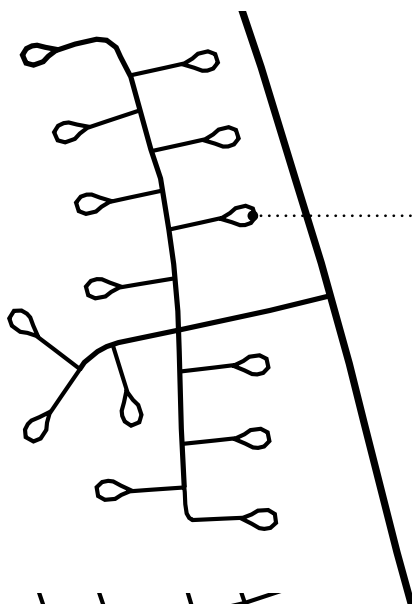
The grid structure allows for the overlapping of structures as Alexander suggested. Grid structures have been a very common tool for planners since the rise of the earliest cities. The village extensions of the villages in Guangming also use a grid structure to divide the land in small enough pieces to develop and to allow easy accessibility to all. Some of the most celebrated neighborhoods have grid structures, such as Jane Jacobs Greenwich village. Grid structures allow for an overlap of functional systems. Grid structures are non-hierarchic, so that is can allow to be part of multiple systems at the same time. This overlap of functional systems means it creates different combinations of conditions. These changing conditions create a large spectrum of opportunities. Grids are not natural systems. With the exception of tabula rasa situations, grids do not appear naturally. This means that grids are more easily applied in small scale, than in large scale. Grid structures do not allow for the concentration of lines in the network. This means that grid structures have the tendency to be uniform.

The leafy structure of the fabric is second adaptation to the network that allows for informal activities. The pattern of the network in Guangming resembles much of the pattern of the veins in the leave of a tree. Christopher Alexander coined this type of leafy urban fabric in his famous article *a city is not a tree*. None of the roads end in dead-ends, but rather change form, dissolve into a factory area and reappear at the other end. The network in Guangming does not follow a rigid structure, but rather flows through the landscape, breaking away and joining up again. Salat argues that the leafy structure of the fabric itself prevents catastrophic fluctuations thus ensuring continuity.

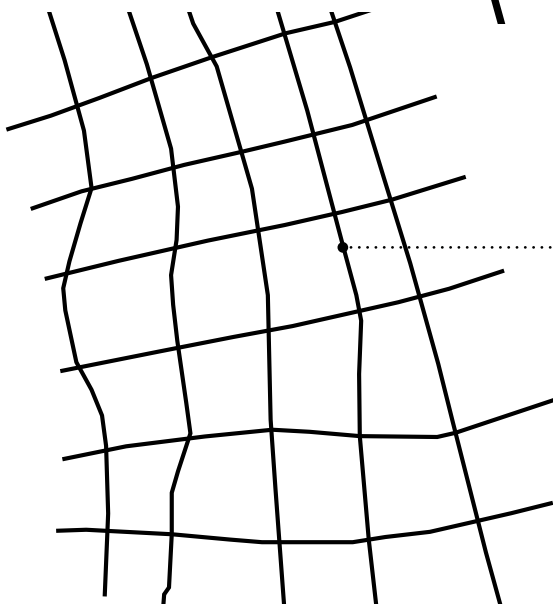
The scale hierarchy of the network is the third adaptation of the network that enables informal activities. Not all the roads in the semi lattice network are the same. Some roads are broad and allow for huge flows of traffic, while others are very narrow and concentrate are their flows in a small space. This hierarchy in scales strengthens the informal activities. A hierarchy in the fabric creates a spectrum of opportunities in the urban fabric. Larger parts of the network are more suitable for bigger shops, while smaller parts of the network give change to small businesses

The spatial continuity over time of the fabric itself is the third quality that enables informal activities. The slow economic integration of the floating population is only possible when there is also a spatial continuity that allows for informal activities to grow and develop. Spatial continuity over time allows businesses to start up and flourish. It allows parts of the network to specialize and develop unique goods and services. Continuity of the fabric does not only allow for continuity of economic processes, but also of social ones. Characteristics can be nurtured, so that distinct identities develop. It allows for communities to be formed and for social networks to grow. People with different interests and needs need time to develop their own spaces for sharing.

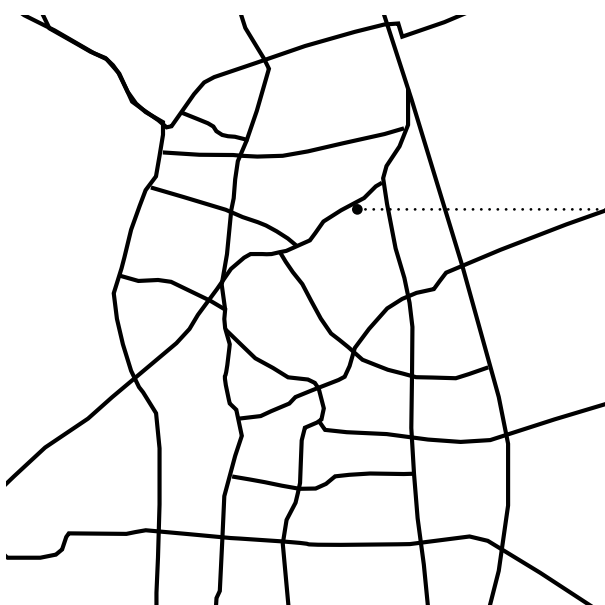
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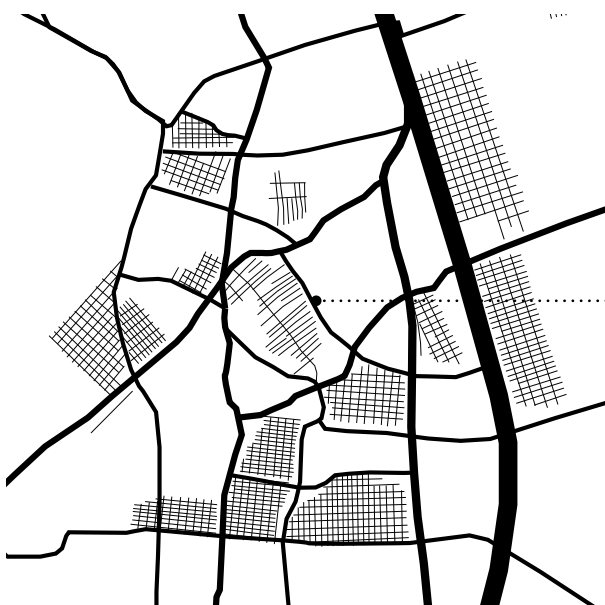
Cul-de-sac urban form.
Each part of the fabric is
only accesible through its
connection to the part higher in
the hierarchy



Grid structure urban form.
Each part of the fabric is
equally accesabile. The size of
the grid ican vary enourmously.
Grids in the urban village is
only 10 by 10 meter. Grids in
neighborhoods in Western
cities can vary between 100
and 200 meter. Grids of the
municipal government are very
large, between 500 and 1000
meter.



Semi-lattice urban form. This
structure is very similar to the
grid structure, except that the
structure is not uniform, but
concentrates and diverges.
Intercestions can have four
roads, but also less or more.



Leafy structure urban form.
Again, the structure is similar
to the semi-lattice structure,
only now the network has a
hierarchy. This hierarchy



Spatial continuity over time.
No matter to what structure,
continuity over time allows for
activities to happen.

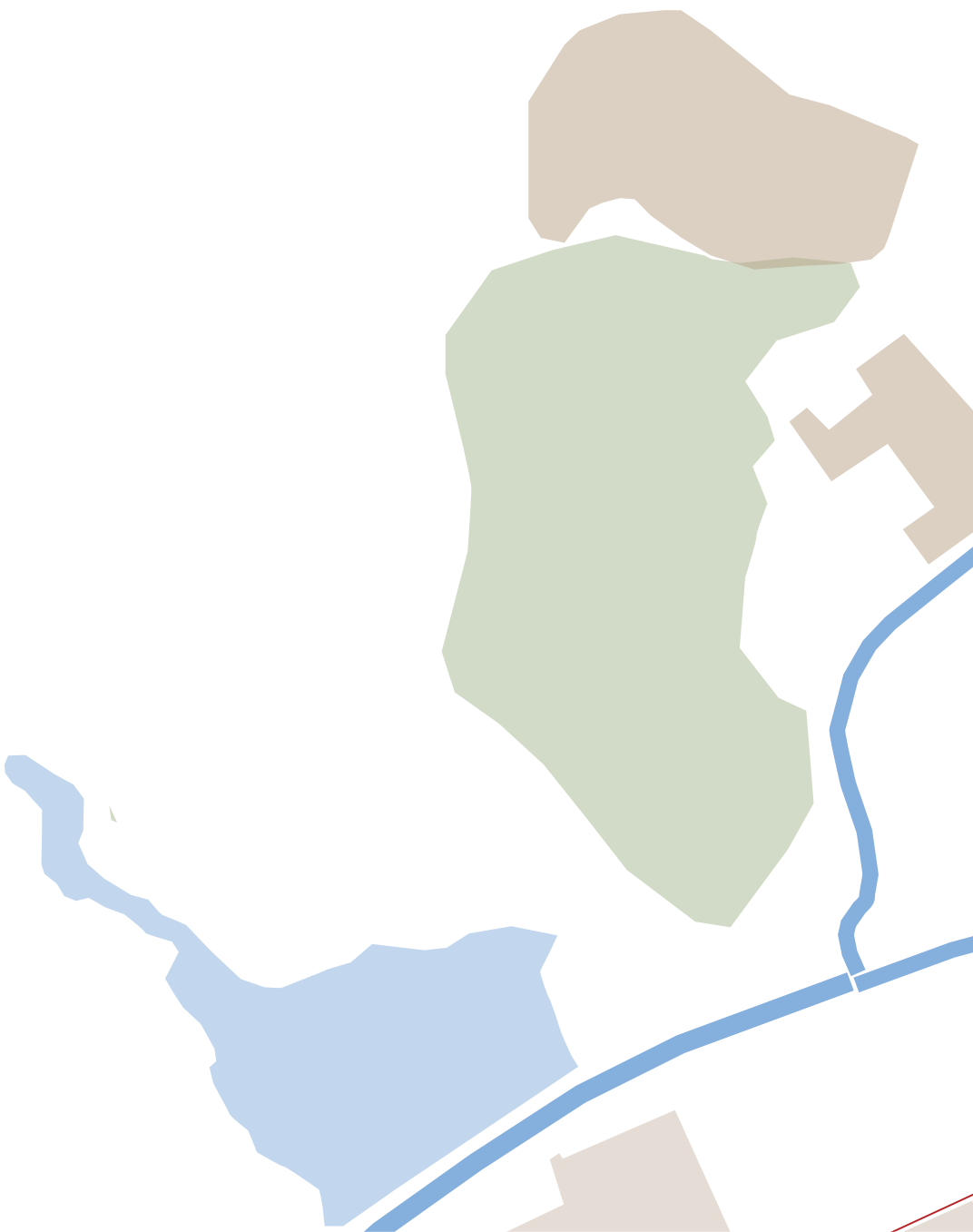
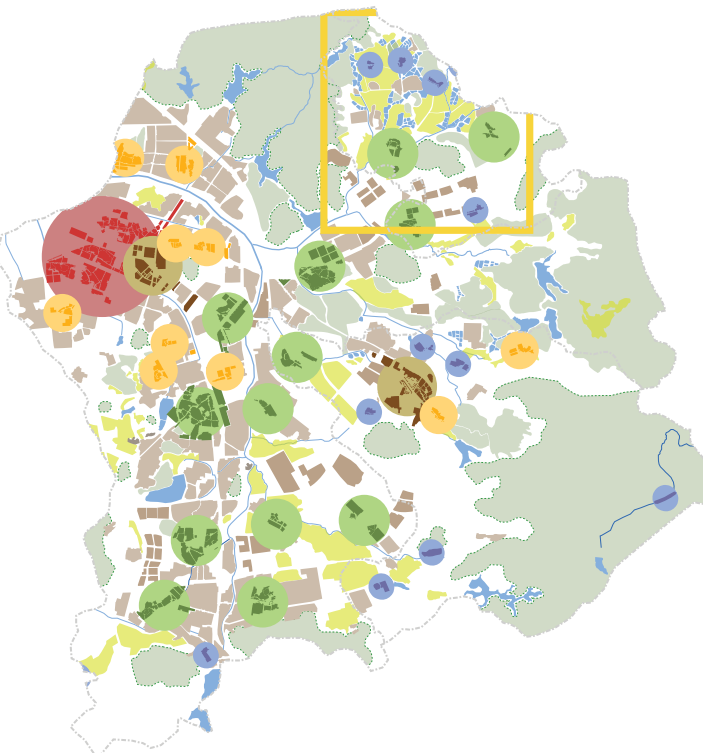
Atlas of types - Peripheral villages

The Peripheral village or horticultural village is the first type to be distinguished. The most important feature of the peripheral village is the strong economic dependence on labour intensive horticultural, and the absence of industry or commercial activity. In general, the peripheral village has no old core, no village expansions, no commercial activity, lies in Guangming subdistrict, has no new gated residential development, but does have urban facilities and lots of agricultural land left. In its function as agricultural center, this type comes closest to the original villages that covered the region for hundreds of years. The main difference being that the origin of these villages is completely different and therefor also does not have an old core. The location of the peripheral villages is, as the name suggests, on the periphery of the Guangming district. The villages are all in the Guangming subdistrict, where the government had authority to establish the agricultural production centers. This factor explains both the location of the villages, as well as the limited development of the villages. The villages have no expansion in the area of the village. Some villages did replace their houses with newer buildings. The villages are no bigger than 0,5 km² an house approximately 1000 inhabitants each.

The development of local industries is the main challenge for the peripheral village. The lack of local employment limits the size of the village and other opportunities for informal activity. The small size of the village does not allow for commercial activity. The interventions that should be made in this village are directly related to the preservation of the horticultural lands of this area. The first intervention is a strict zoning ordinance that ensures the maintenance of the horticultural lands. The first local design takes a look at the peripheral villages in the north of Guangming. Heavy development is not desired here because it would undermine the horticultural function of this area for the Guangming district. The regional plan that relates strongest to this village is the maintenance of horticultural areas.

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Small peripheral village in the north of Guangming district. There is no commercial activity in the village. Other informal use of the space happens only on a very small intensity.





This map represents a zoom-in of the Guangming district map.

1. Village interior space
2. Facade around urban blocks
3. New interior space
4. New facades
5. Shops
6. Water
7. Lychee trees
13. Lychee trees
14. Horticulture



The area is covered in a pattern of small lakes that are used for the cultivation of fish and ducks.

Only market village in the area. The village profits from a location close to the regional road.

This market villages lies directly next to the regional road.

Atlas of types - Production villages

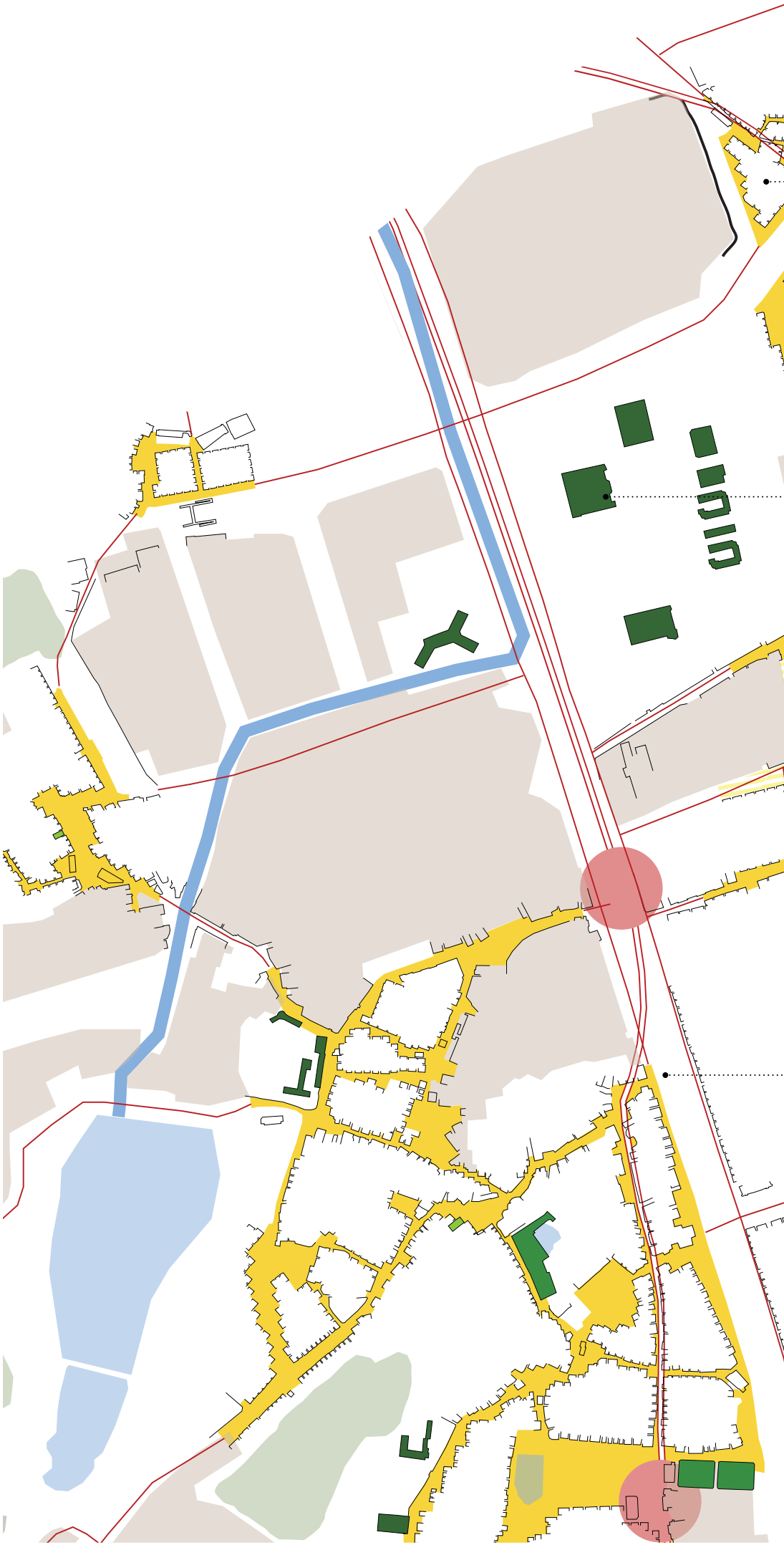
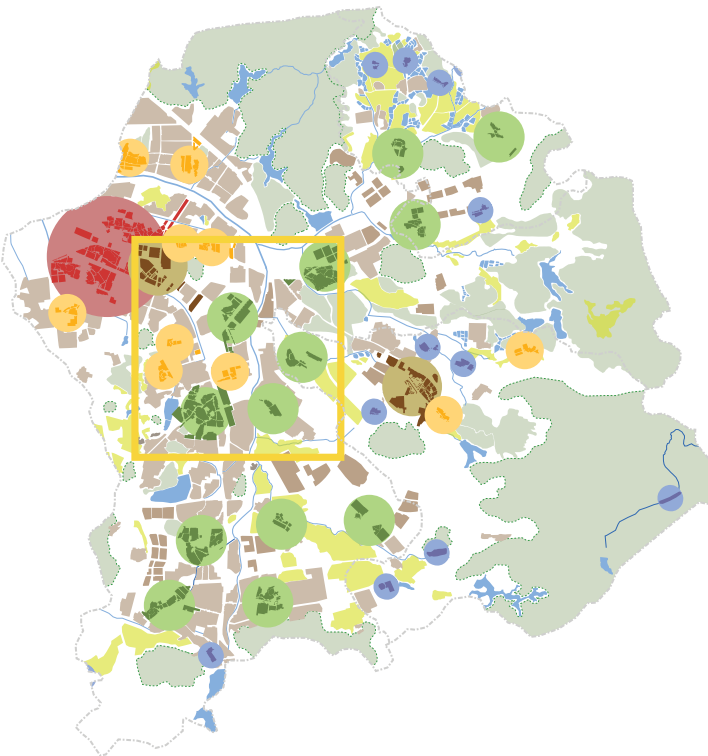
The production village is the second type of village to be distinguished. The production village is qualified as a village with industrial development and minor residential expansion. In general the production village has no agricultural land, little commercial activity, but it still has an old core, a few village expansions, some new gated residential development, some urban facilities and lies in Gongming subdistrict. Because the village is still relatively small in size, the old core still represents a large art of the total territory of the village. These old cores are still inhabited and show activity. The location of the production villages do not seem to be contained to a specific administrative setting, like the peripheral villages. Rather these villages seem to always is the proximity of larger villages, and thus seem to face a form of competition. Most of the production villages are situated in an arc around the Gongming centre. The other production villages are located close to the Guangming centre. This proximity to larger villages seems to explain the relative low level of development.

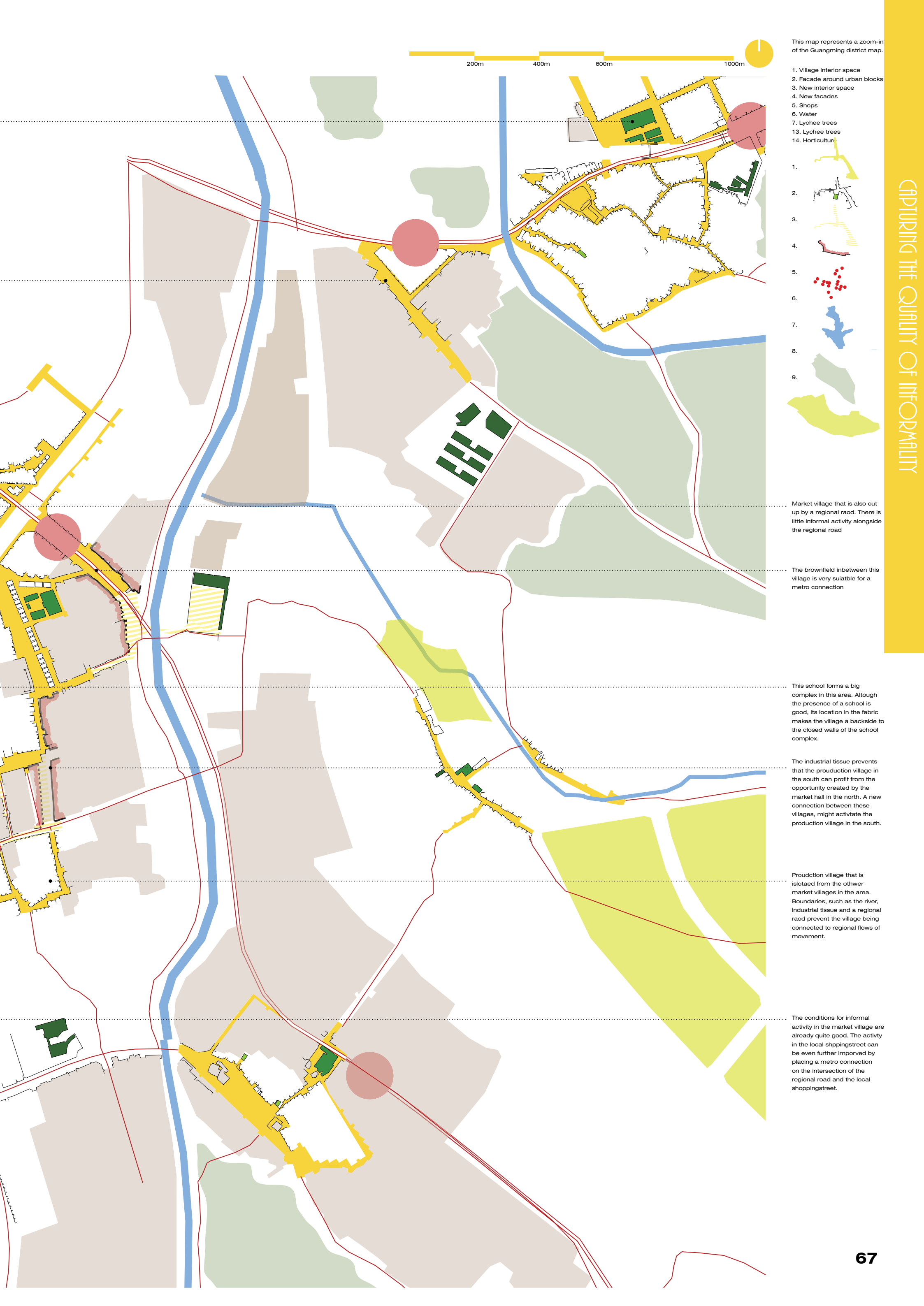
In the design study it becomes clear that the industrial program around the villages needs to be transformed. The existing commercial lines should be extended into this fabric. The interventions that should be made in this village directly address this challenge. The first intervention is the introduction of a markethall that can accelerate the commercial activity in the area. The second intervention is the restoration of the highground road that used to connect the two villages. Improved edge conditions around this new connection. The development of commercial program is the main challenge for the production village. The amount of informal activity is higher than the peripheral village. Agricultural land is lost, but is compensated by new opportunities in industrial development. A higher density allows for more commercial activity.

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One of the biggest market villages in the Guangming district. This village is special because it has almost equal development on both sides of the regional road. Because the markethall lies on the old north side of the regional road, the new expansions of the village have much more informal activity than the old south side.

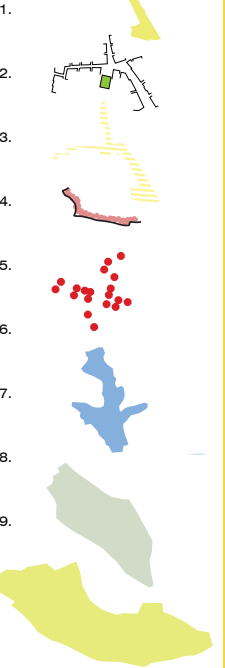
The only part of the village south of the regional road that shows commercial activity, is where a local road meets the regional road.





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- 14. Horticulture



Market village that is also cut up by a regional road. There is little informal activity alongside the regional road

The brownfield inbetween this village is very suitable for a metro connection

This school forms a big complex in this area. Although the presence of a school is good, its location in the fabric makes the village a backside to the closed walls of the school complex.

The industrial tissue prevents that the prouduction village in the south can profit from the opportunity created by the market hall in the north. A new connection between these villages, might activate the production village in the south.

Proudction village that is isoltaed from the othwer market villages in the area. Boundaries, such as the river, industrial tissue and a regional raod prevent the village being connected to regional flows of movement.

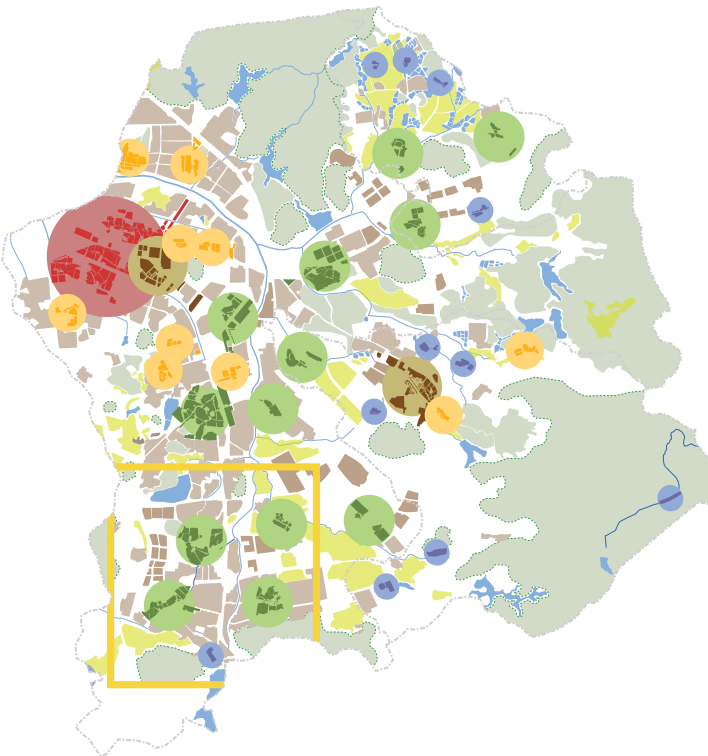
The conditions for informal activity in the market village are already quite good. The activity in the local shppingstreet can be even further impovred by placing a metro connection on the intersection of the regional road and the local shoppingstreet.

Atlas of types - Market villages

The market village is the third village type. The most important feature of this type is the presence of a market hall. This village acts as a center for the surrounding villages. In general the market village has no new gated residential compounds, some agricultural land, much commercial activity, an old core, many village expansions, some urban facilities and lies in Gongming subdistrict. The original size of the old core in most of these villages is relatively large, suggesting that these villages historically had a greater importance. The market villages vary enormously in size. In general, the market villages on the western side of the river have experienced greater growth, then their subsequent partners on the other side of the river. This suggests that the western side of the river, closer to the sea, was historically the more developed are of Guangming. The location of the villages shows a strong correlation with the two main river arteries. Following the river further in the direction of the sea, the typology of the villages will change again. A subdivide of the marketvillage into two types could make the strategy more focused in the particular structure of the village. The market villages in Guangming subdistrict have seen considerably less growth than the market villages in Gongming subdistrict.

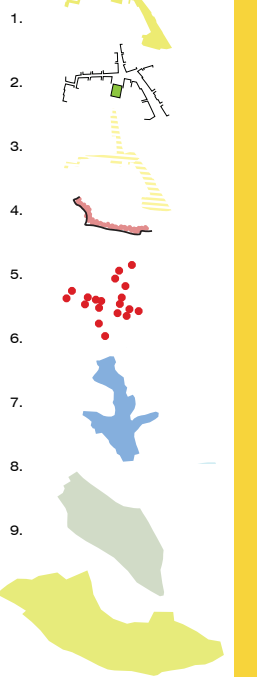
In the design study of the southernmost market village shows a number of issues that are constricting for the informal activity in the village. The diversification of the village is the main challenge of the village. The amount of informal activity is very high in the village, thanks to its diverse places of employment and critical density for commercial and social program. This village has a high risk of degradation, because the cheap land can be easily leased to commercial developers that will replace the existing fabric with new, not well integrated development. The heavy growth of the village has been directed along one direction. All the activity is concentrated around the main road, while the interior spaces lack activity because they are not part of the regional network.

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One of the biggest market villages in the Guangming district has plenty of village-interior space to accommodate informal activities

The cultural square lies at the physical centre of the village, easily accessible through the finegrained network.

This market hall lies on the intersection of a local shopping street and the regional road. This hub could be further reinforced by a metro station.

This market village has all its commercial activity on the south side, right next to a major road. Functions inside the village are reached through a number of dead-end streets. A new structure at the back of the village might open up this part of the village.

The intersection of a local shopping street and the regional road is a suitable point for a metro station.

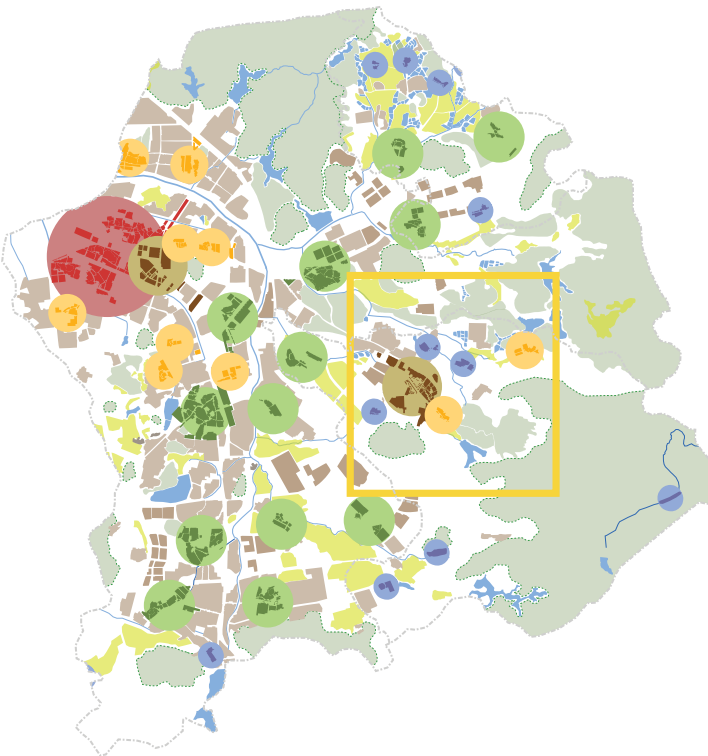
Atlas of types - Administrative villages

The administrative village is the fourth type to be distinguished in Guangming. The most important feature here is not the market, but the administrative centre of the government. Whereas the market attracts large flows of people every day, the administrative centre is rather a display of power. The village is massively restructured to fit the image that the government would like to project. The urban form is very reminiscent of western European urban form. Although the buildings in the administrative village look very much like the ones in other villages, the urban layout is completely different, rather resembling western style urban planning. The location of the administrative villages is limited to the seat of the local streetoffice (the subdistrict of Gongming and Guangming). In the case of the Gongming village, the village is closely connected to other villages in the area. In the case of Guangming, the administrative centre is surrounded by a number of peripheral villages.

In the design study of the administrative centre of the Guangming

subdistrict a number of issues become clear. The fifth local design takes a look at the administrative centre of Guangming and the peripheral villages that are directly connected to it. The location of these villages correlates with the location of the new industrial developments. For the factories to prosper, they need the informal quality of the villages. The development of the factories should be connected to the development of the peripheral villages.

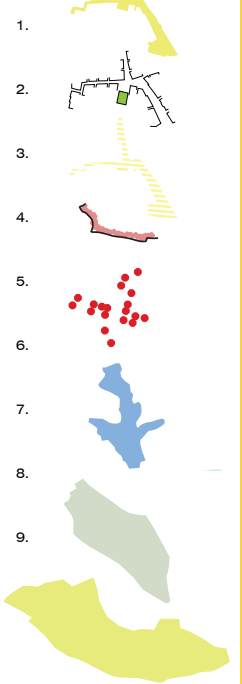
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Stronger connections between administrative centre and surrounding village might boost informal activity.

Small peripheral villages around administrative village could be allowed to grow, together with new industrial developments in the area.

Administrative centre of Guangming subdistrict. The village is restructured according to very different organization principles than the normal grid structures.

Atlas of types - Agglomerated villages

The agglomerated village is the final type of village to be distinguished. The main difference with the four previous types is the physical merger of the build-area of the villages. In these villages it is hard to tell where one village ends and the other begins. Although the old cores are clearly separated from each other, the in-between fabric of new village extensions, industry, larger commercial buildings and public facilities constitute a single and continuous pattern. As the importance of newer extensions and other urban functions takes over, the old cores lose their relative importance. The old cores of the agglomerated villages are, as in the case of the market village, relatively big, suggesting that these villages have had a longer importance as a centre. The old cores face the biggest threat if destruction in these agglomerated villages continues to develop. The buildings of the historic cores are the cheapest to compensate, and therefore the ones most likely to be

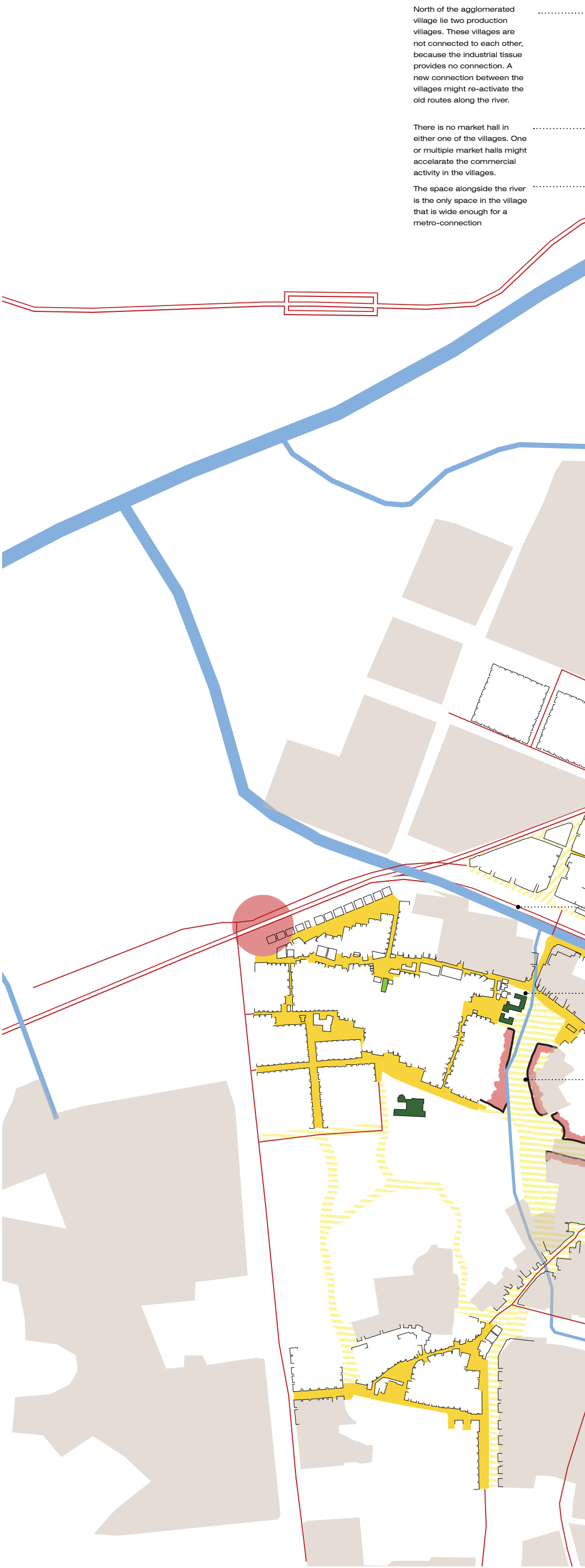
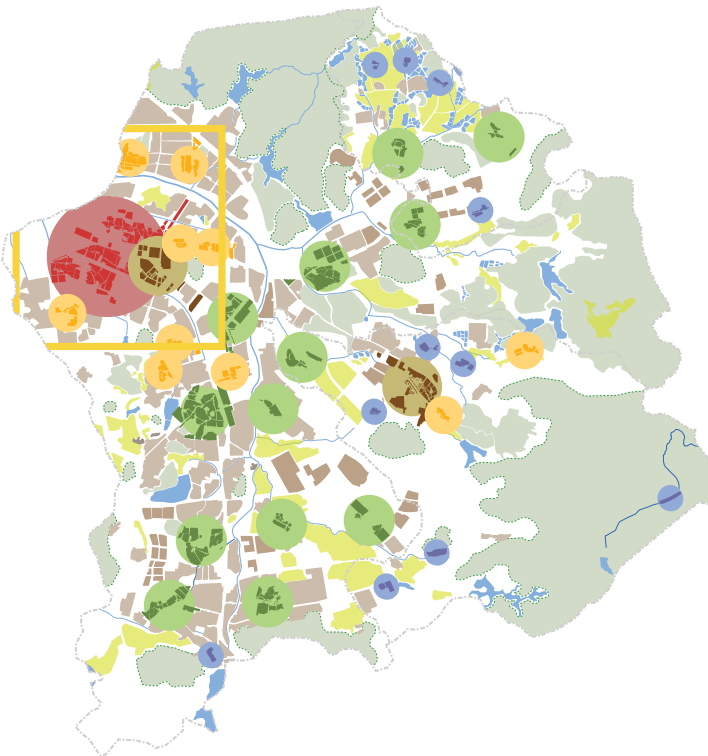
developed first. The location of the villages centers at a cluster of villages near the main river of the region. This pattern follows the logic of the market villages, which were also located along the main river. At the crossroads of two river systems, it makes sense that these villages developed most. In addition, these villages lay closest to the main axis from the original Special Economic Zone and Guangzhou. A final factor that explains the development of these villages, is the nearby presence of the administrative village of Gongming, which might have contributed to the development.

The design study takes a look at the southern part of the agglomerated villages of the Gongming centre. These villages still have commercial activity, but no longer a market. The regional connections are fragmented. To the east of the village new development has erased all signs of old structures and has narrowed

the highground route to a single factory road. Restoration of the informal

network is the main challenge for the agglomerated village. Attracting higher income people is the main challenge for the agglomerated village. The village already diversified into a car-orientated program, which is a type of program that does not generate many economic opportunities. Some informal connection must be brought back and space for informal activities must be made. The amount of informal activity is lower in this village than in the market village. Parts of the informal network are gone and key informal amenities like the market hall are starting to disappear. Higher rent prices force migrants out.

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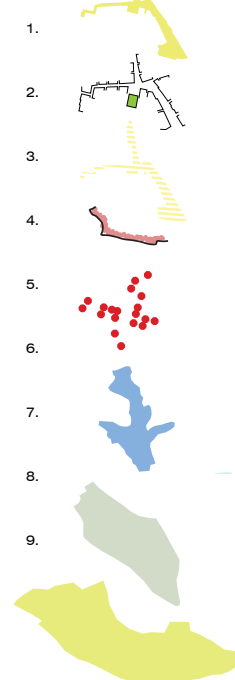
North of the agglomerated village lie two production villages. These villages are not connected to each other, because the industrial tissue provides no connection. A new connection between the villages might re-activate the old routes along the river.

There is no market hall in either one of the villages. One or multiple market halls might accelerate the commercial activity in the villages.

The space alongside the river is the only space in the village that is wide enough for a metro-connection

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The industrial tissue between these two parts of the agglomerated villages prevents a continuous network. The old network could be restored here, to provide a better north-south connection.

The regional road that already cuts through the agglomerated village is the only space in the village that could accommodate a metro connection.

Southern part of the agglomerated village. The two villages are separated and only connected through a single bridge across the creek.

Village has a closed character towards the river and hills behind the village. Opening the village up towards this side might increase the socio-economic opportunity and the connectiveness of the two agglomerated villages.

Square in front of the seat of the local subdistrict government. The square has a central position in the restructured blocks of the administrative village.

The former location of a factory has just been demolished to make room for a new high-rise residential development. The pressure on the land is especially high in the agglomerated villages.

The interior space

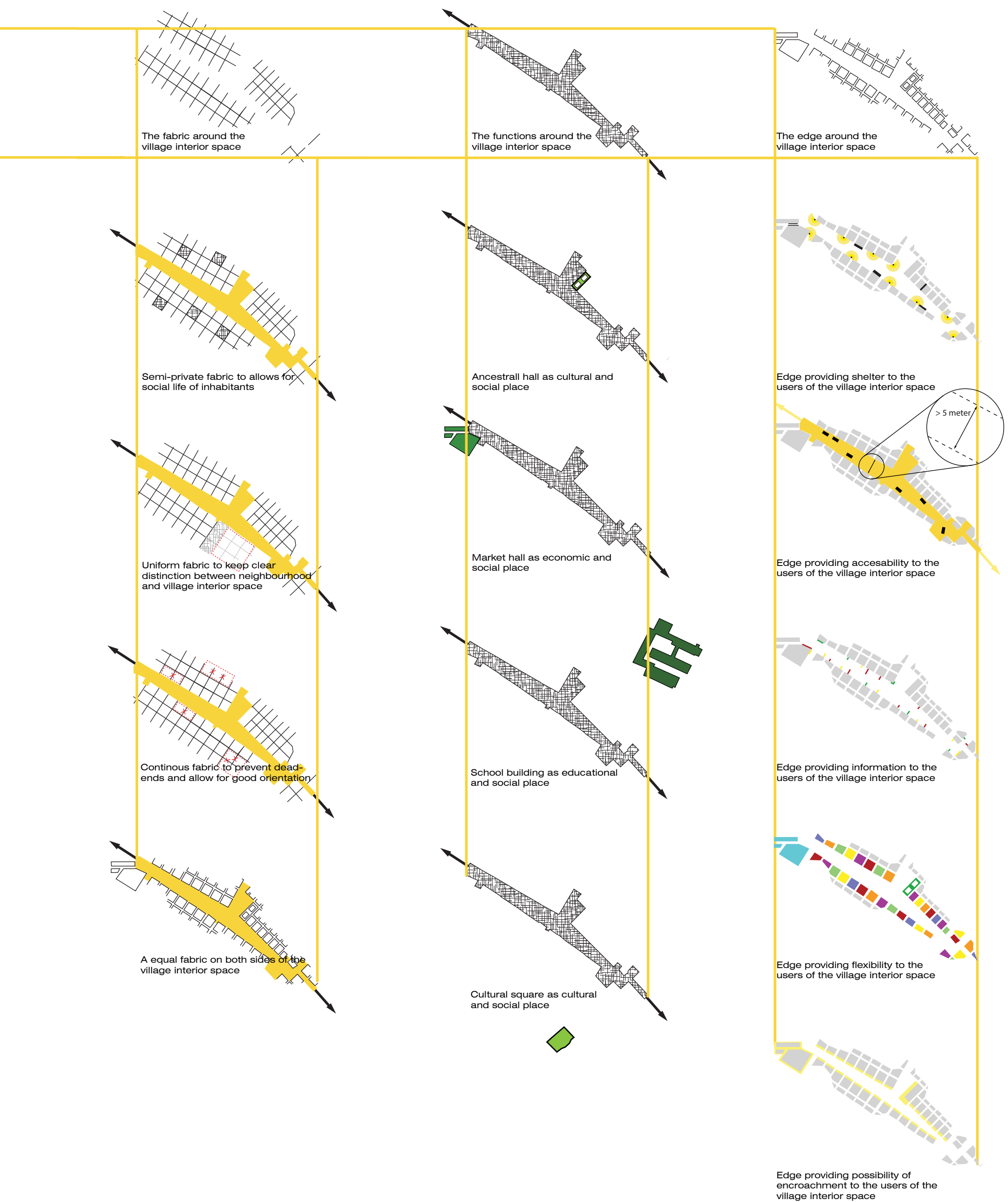
A particular urban form has emerged from the development process of the village in Guangming that I will call the interior space of the village. The features of this space are equally important as the network that ties these places together. Informal activity can only occur when both conditions – a good network and a good space – are met. As became clear from the analysis on the spatial form of the village, all the space in the village, including the interior space is owned by the landlords. Although the ownership of the space is clear, the public or private character is more ambiguous. The municipal government does not own the land, so the space is not completely public. On the other hand, it is not completely private either, since the space is accessible to all. The village interior space is a semi-collective space of which its character is deeply embedded in Chinese culture. The interior space is not a space that is planned, but rather one that emerges as a left-over space from subsequent village expansions. In the village that is characterized by small dense neighborhoods, the interior space is the only open space in the village that allows for informal activities. Because the interior space is a historically grown place, is it part of the networks that cover the Guangming region.

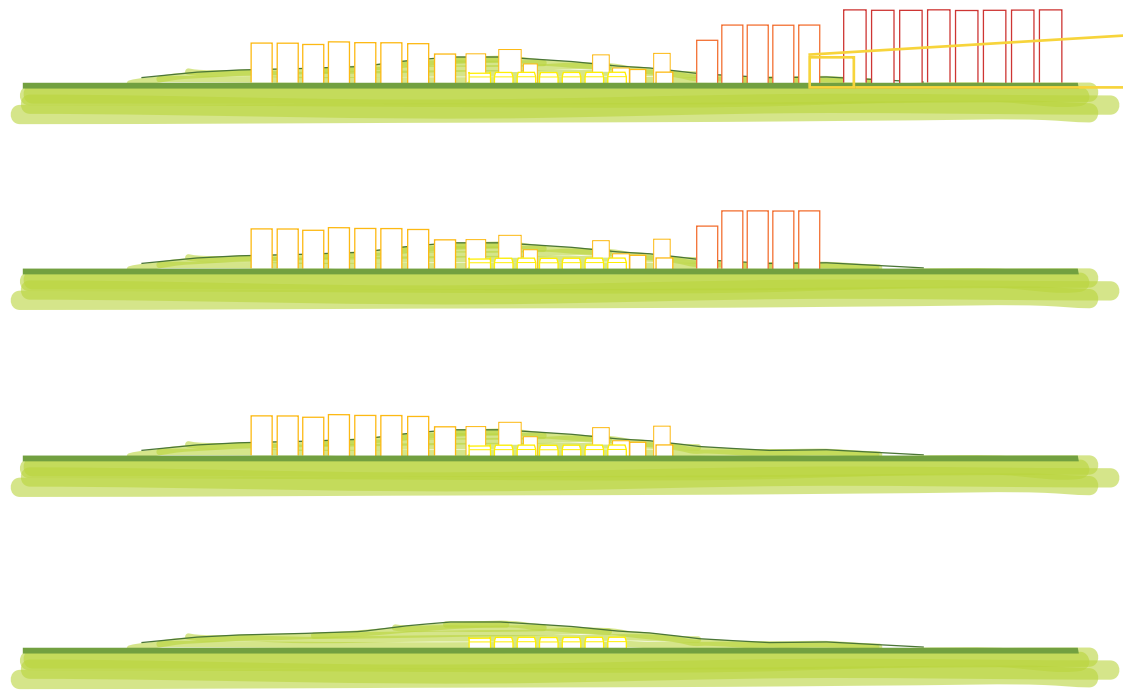
The spatial quality of the interior space of the village is threefold. The functions that are located next to the collective space acts as catalyst for other informal development. These functions provide a specific identity to pieces of the collective space. The fabric that surrounds the collective space is essential to the proper functioning of the collective space. The edge of the collective space is perhaps the most important part of the collective space, because it is the edge that provides the flexibility for informal use.

Almost all residential buildings have commercial use on the ground floor. Private schools and cultural facilities that are financed by the local villagers, are on the edge of the villages, but always on walking distance. Employment is mainly generated by factories that are a stone's throw away from the residential core of the village. The whole village is constructed and inhabited in an extremely high density. The only condition that could be argued is the age of the buildings. Jacobs argued that this factor was important for the mix of socio-economic classes and their possibilities to invest in their environment. The buildings in the urban village react to the constant influx of new migrants, and are constantly being added to.

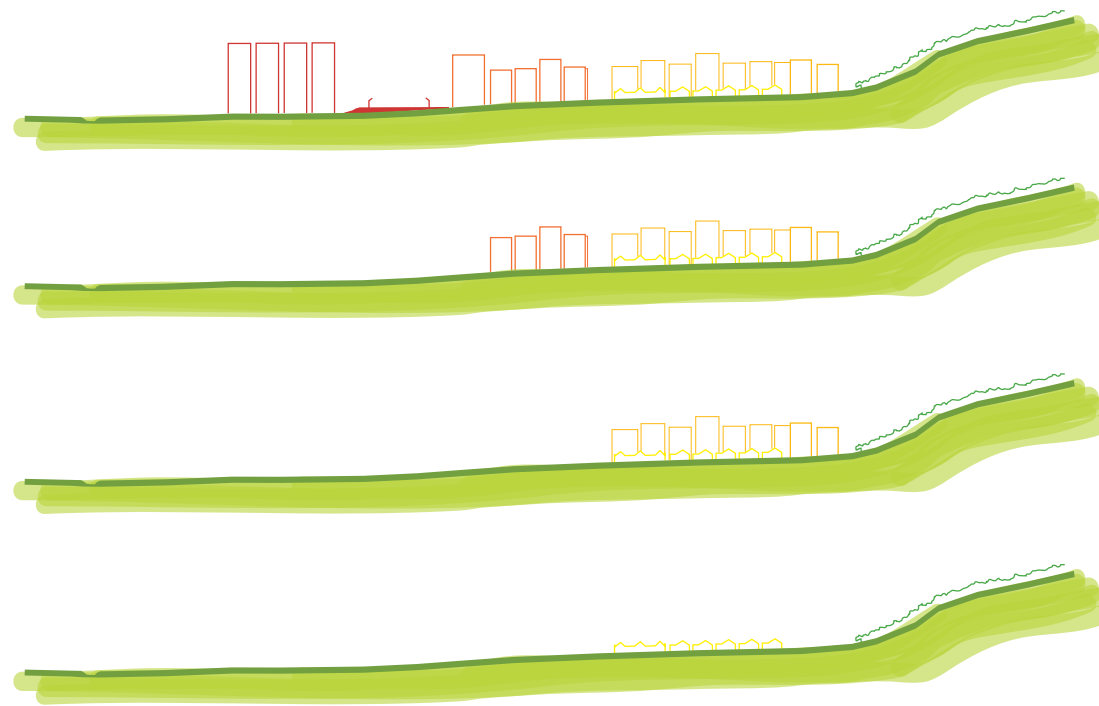
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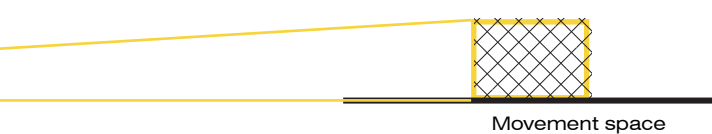




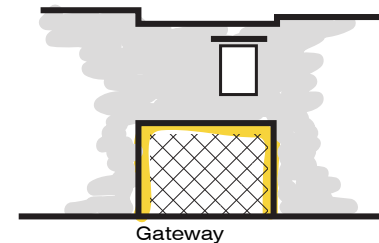
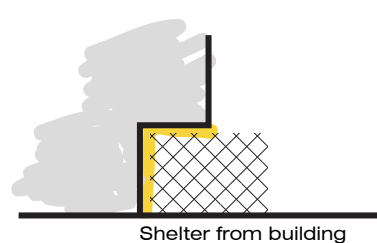
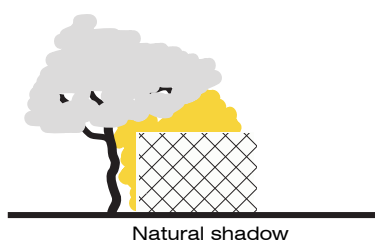
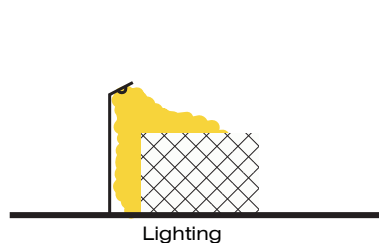


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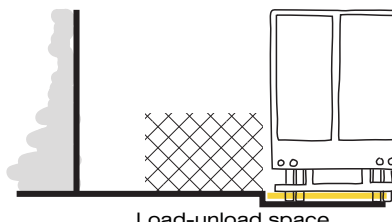
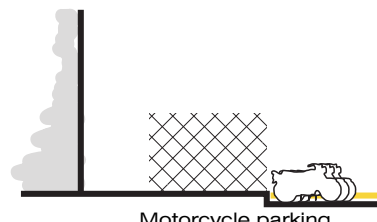
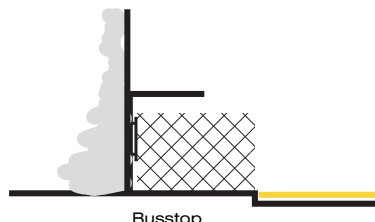
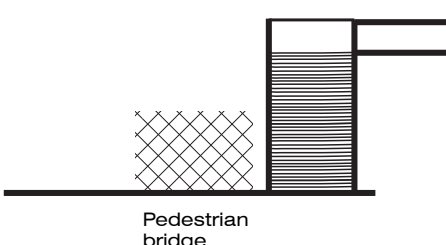




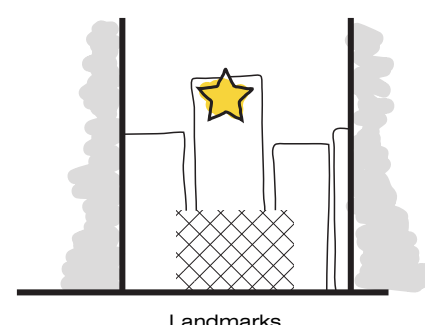
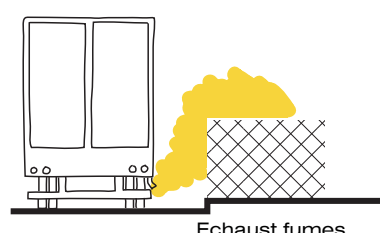
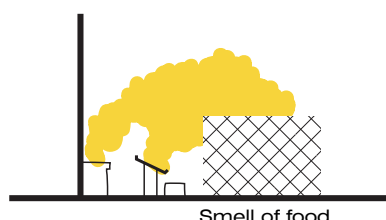
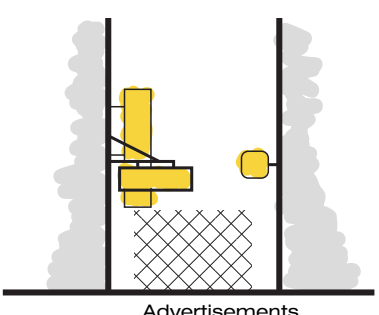
Shelter function of edge



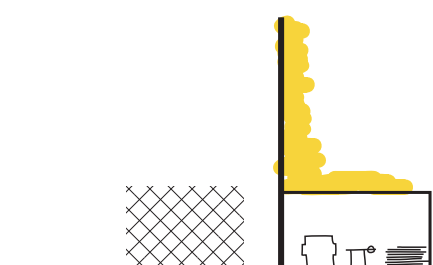
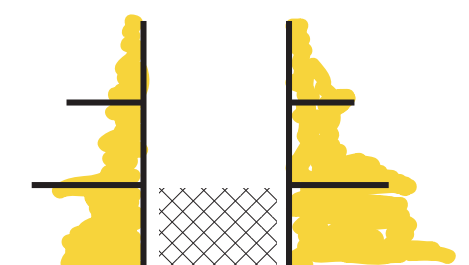
Accessability function of edge



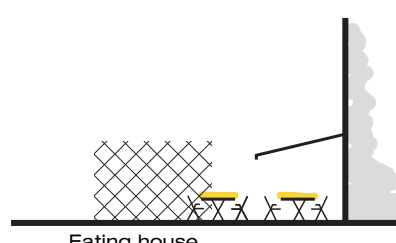
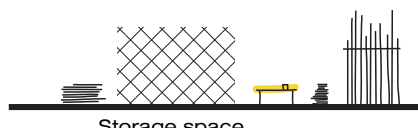
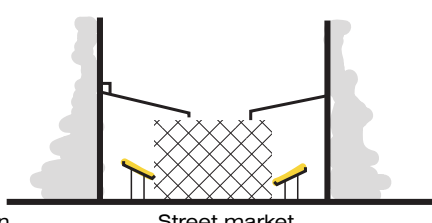
Informative function of edge



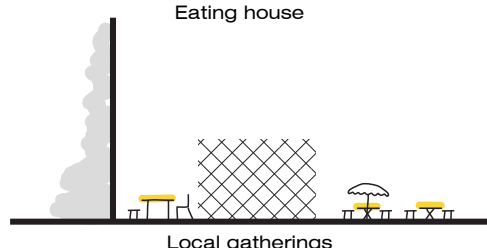
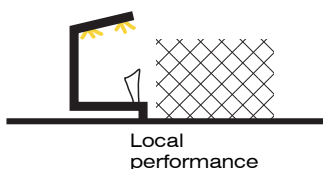
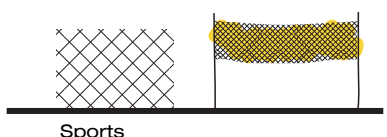
Flexible function of the edge



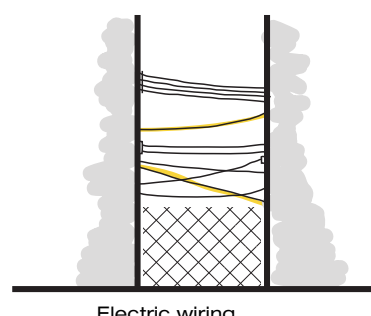
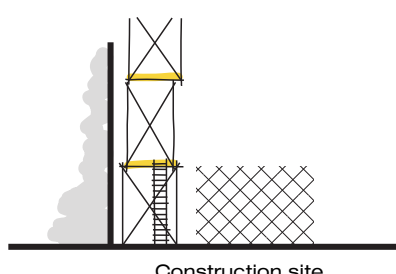
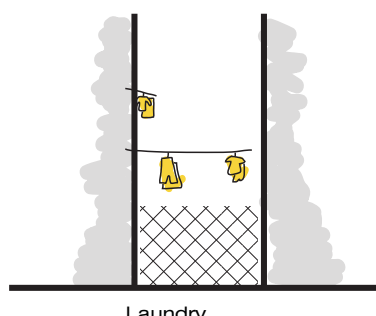
Encroachment function of the edge - Economic encroachment



Encroachment function of the edge - Social encroachment



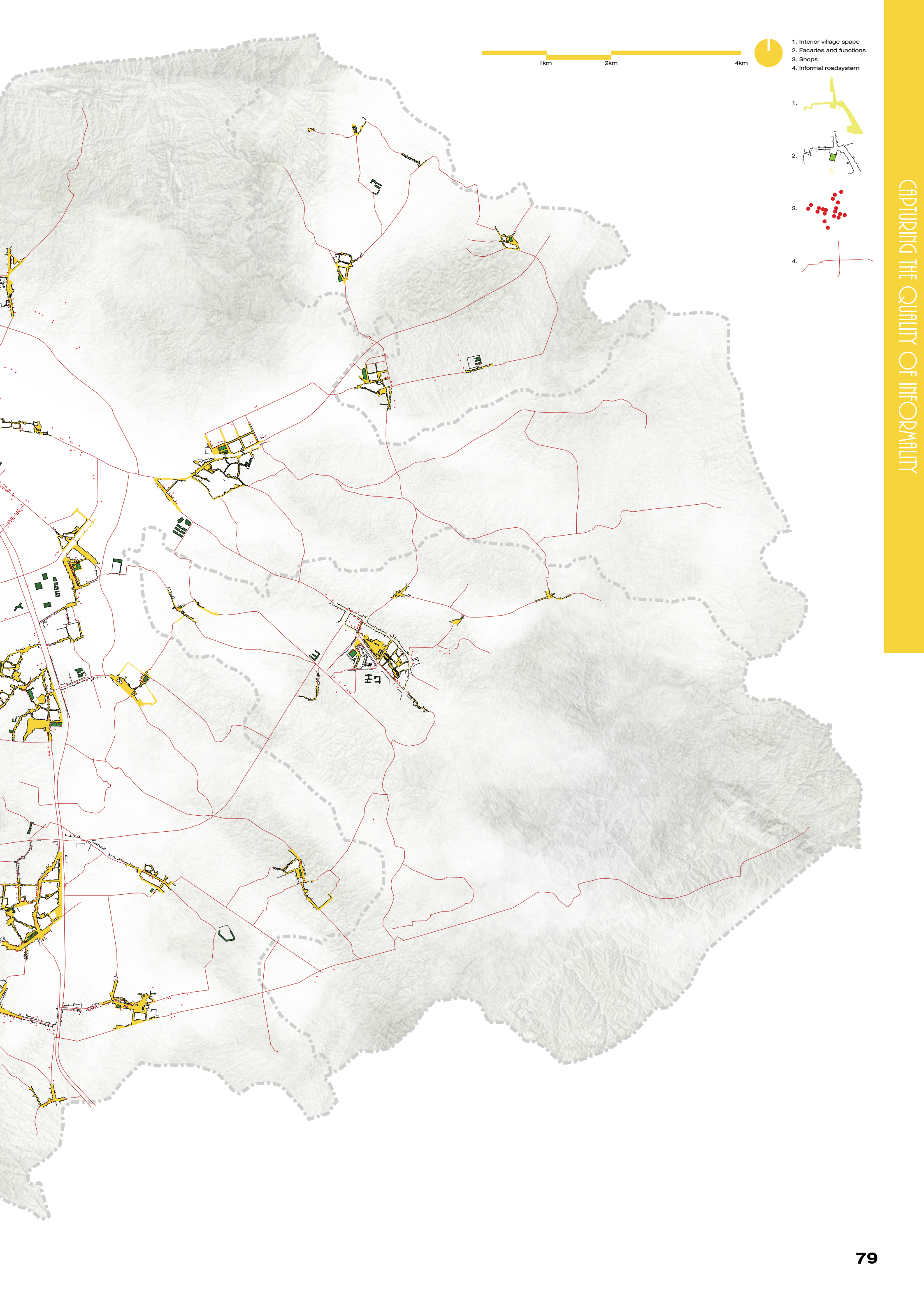
Encroachment function of the edge - Vertical encroachment



The network in Guangming has largely been the product of informal development. In this informal development, the natural landscape, the Chinese built environment, the commercial structure and the industrial structure have reinforced each other in their development and thus created a strongly layered and embedded network. Unintended, the growth of the village has created a collective space between the different neighbourhoods that has a very high quality in terms of informal use. Together, the network and village interior constitute the space that allows for socio-economic upgrading of the migrant population. This system of spaces is extra beneficiary to the migrants, because it connects villages in different stages of development, thus allowing migrants to move between them and seek opportunity to enter the socio-economic upgrading process. The next chapter will combine the spatial characteristics of the informally developed system with the development stage of the villages, to come to a regional development proposal.

END OF CHAPTER





#10

REGIONAL DESIGN



Introduction

The purpose of the design in this chapter is to propose a number of regional interventions that are designed to integrate the new formal developments with the existing informal settlements, in order to maximize the informal opportunities in the area, without degrading the existing informal system. This chapter will give an answer to the aim of the project, namely how to integrate formal and informal parts of the city, in such a way that it improves the economic and social inclusion of the floating population. Each section is divided in three parts. The first part focusses on the existing system. The second part explains that this system is under threat. The third part elaborates on the proposal.

Current proposal

The regional network of village interior spaces holds a high quality for potential socio-economic upgrading of the migrant population. Under new urban pressure this system becomes threatened to lose critical elements or even disappear completely. My approach tries to understand the current development model. The maps to the right show a clear urgency towards a more integrative development solution, than the current proposal. In order to understand the development proposal that is put forward in this thesis I will shortly introduce the tools that the Chinese planning system puts forward to develop the Guangming district. Planning in China is a very broad topic that would require much more time to elaborate on fully. This section is meant to highlight some of the most important common practices of the planning of the governmental system in Shenzhen in relation to informal development. One of the major characteristics of informal development in China is that the informality precedes the formal planning. This means that as the formal city expands, it almost always encounters informal development. The urban development that is proposed for the Guangming area consists of three parts. The first part tries to organize and prepare the existing elements to fit the new plan. The second part is the implementation of infrastructure. The third part is the infill of the gridlines that are formed by the new infrastructure.

The development of peripheral areas and large scale demolition is strategy to avoid the problems of intervening in high density areas. The villages are the densest places in terms of floorspace and therefore also the most expensive places for the government to expropriate. The official strategy is to develop the area's on the very boundary of the agricultural land of the villagers in order to avoid high compensation and the relocation of the original villagers (P. Hao et al., 2011, p. 215). Anything that still exists on this land is demolished. This strategy brings another advantage for the government, namely that the do not have to deal with the social and spatial problems of the villages on the short term. As becomes clear from the city beautiful strategy, avoiding the urban villages is much easier than a mutually beneficial urban dialogue. Clustering of villages is a strategy to simplify the natural distribution of the villages. Rather

than to have multiple smaller villages scattered around the landscape the government tries to cluster them in larger villages. Once the settlement has reached a critical size an settlement upgrading approach is adopted to improve the housing conditions and implement facilities. Beautification of informal urban villages is strategy to obscure the chaotic appearance of the urban villages. Alongside the main traffic arteries in the city the outer edges of the urban villages have been given a proper face-lift. The buildings have been painted in a distinct brown orange colour scheme, sometimes with the addition of a 'typical' Chinese roof. A journey from the airport to the city center in Futian or the stage of the Universiade games would be a pleasant ride through a city without urban villages, without slums, without problems. In the case of Guangming the district is divided in three areas, which will undergo different forms of transition. The area west of the Maozhou river is the densest area, so the plan will keep this area largely untouched. The area east of the high speed train line is a planned as a nature reserve area. This assumes that existing development of villages will not be allowed to continue further. The area inbetween the Maozhou river and the highspeed train line is the area where most of the planned new development will take place. Here, the presence of the large grids is already dominant. Existing villages will be demolished, to make room for new privately owned factories and high-rise development.

The implementation of infrastructure is one of the most important tools in the Chinese planning system. The formal expansion of the city is usually preceded by new highways or highspeed train connections. In the case of Guangming three types of new infrastructure are introduced to attract investment; a large grid road structure, a metro connection and a highspeed train connection. The new large grid road structure is first implemented in those peripheral areas, where there are little obstacles for the construction. Implementation of infrastructure before development of buildings is common practice in Chinese urban planning. Newly acquired land is divided in large urban blocks that then become available for leasing to developers. Other than in European practice the road system is not a part of the urban design plan, but rather a tool to chop the land up in buy size chunks. The dimensions of the roads often feel out of scale, since most of the buildings are not yet there. It might be that when development and traffic comes, the size of the roads makes more sense. The planned metro system follows these newly developed grids and do not follow the existing concentrations of population. The new high speed train station, which is already constructed and functional allows for a quick connection to downtown Shenzhen 8 times a day. The train station is disconnected from the planned metro system.

The proposed program for Guangming consists of high-tech factories and residential high-rise. The plots inside the grid can be leased and developed by a single company. Much of the development consists of gated communities, which have no relation with the existing informally grown network. The combination of the current development model – peripheral development, infrastructure driven and high-end orientated – takes little account of the existing urban structure and the means of socio-economic upgrading it provides to the migrant population. Therefore, I will propose an alternative development model.

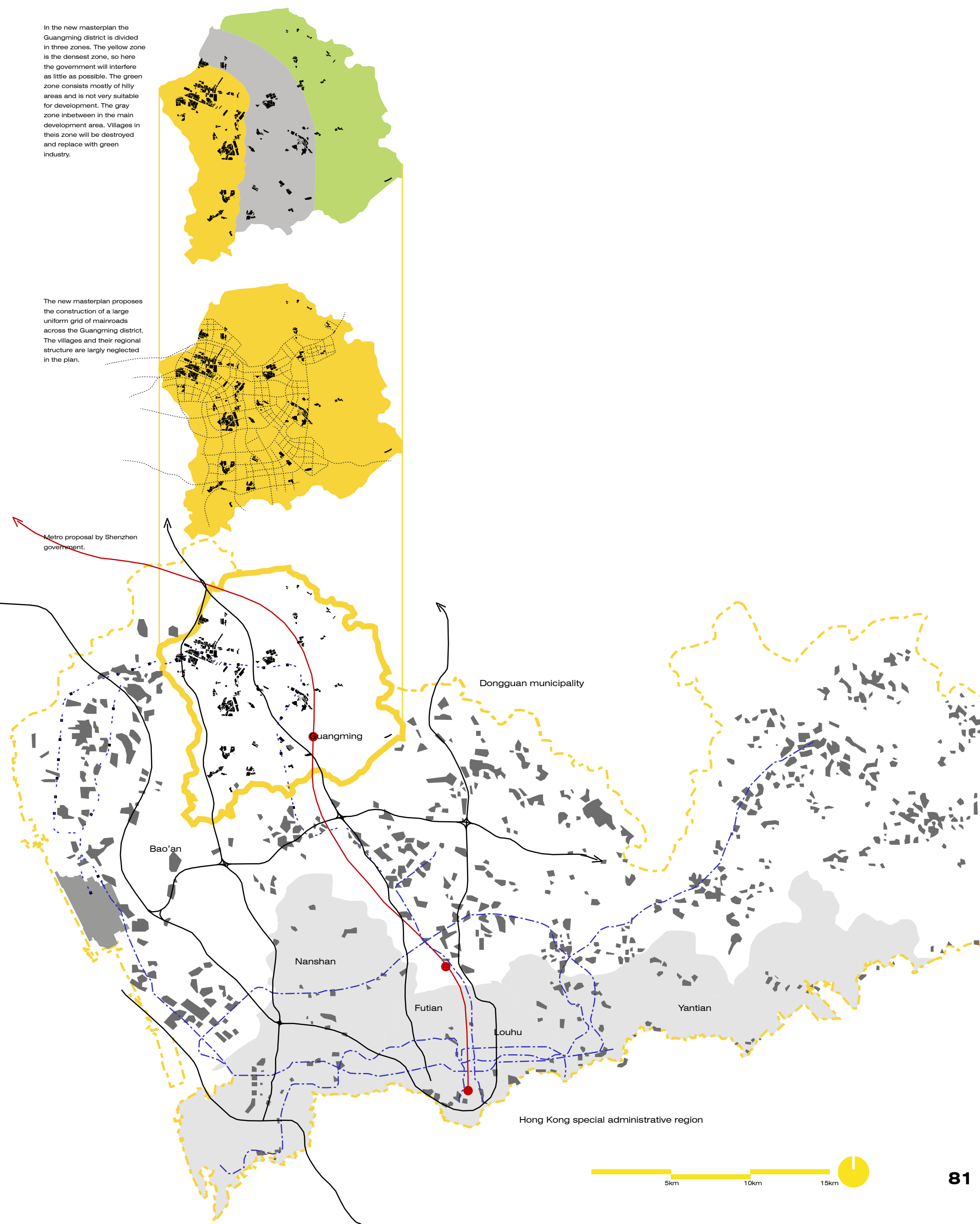
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Government development strategy

In the new masterplan the Guangming district is divided in three zones. The yellow zone is the densest zone, so here the government will interfere as little as possible. The green zone consists mostly of hilly areas and is not very suitable for development. The gray zone inbetween in the main development area. Villages in this zone will be destroyed and replaced with green industry.

The new masterplan proposes the construction of a large uniform grid of mainroads across the Guangming district. The villages and their regional structure are largely neglected in the plan.

Metro proposal by Shenzhen government.



onal

Strengthening the regional structure

Research has shown that this regional structure will disappear under pressure from formal development. If the fabric around the villages is damaged, then this will also have impact of the informal activities in the village, because the space is no longer used by flows of people. New developments in Guangming are inevitable, but how to steer them in coherence with the existing informal system, so that the migrant population can benefit from the formal interventions. My proposal is to use this existing regional structure to steer future development. The historic structure of the region is a product of the original location and growth of the villages. The villages and their informal activities are embedded into this network. Therefore, development that takes this network as the basis, will also be embedded into the network.

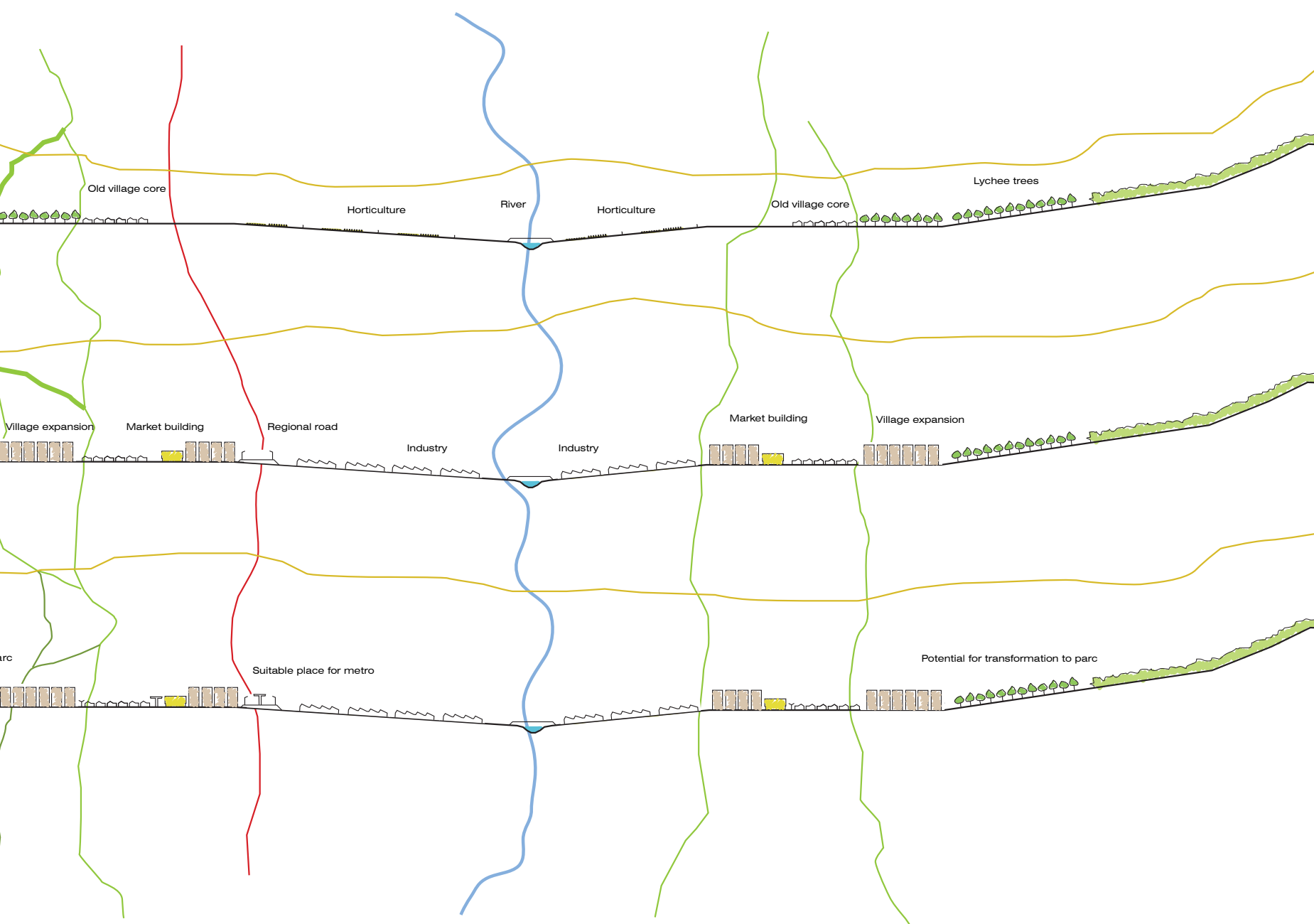
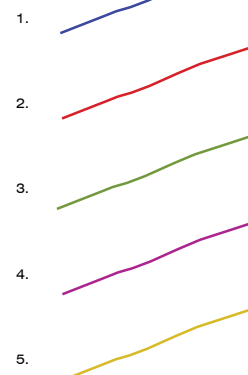
In order to use the existing regional network for future development, a further systemization of the network is necessary. A clear role of the different parts of the network will make the future development also more clear. The division of different parts of the network that I propose draws heavily upon the historic growth and function of the network. The first part of the network is coloured green in the section. The pedestrian roads connect al the village alongside a particular side of the river. The roads are small, fine grained and follow the typical semi-lattice structure that was discussed in the previous chapter. The second part of the network is very similar to the first, only that the second follows smaller creeks and not the bigger rivers. Villages are not so wide spread along the smaller creeks, so the connection is used much less intensively. Although these roads also flow through the landscape, they do not have the semi-lattice structure of the green roads. The third part of the network is the system of perpendicular roads that connect the different functional areas of the village. These roads connect the hilly parts of the village, with the residential core, the horticultural lands along the river and then across the river, to repeat the same pattern on the other side of the river. The fourth part of the network is the system of larger regional roads that run along the river. These wide roads create a completely different condition. A final part of the network would be the system of alleyways inside the urban blocks that are defined through the regional network. All roads fall into either one of the fifth categories that I explained here. In the next map I will show the regional system that appears when the systemization is applied to the whole Guangming district.

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The sections do represent an actual reality, but an typological summary of many sections across Guangming. The section is not drawn to scale and buildings are enlarged to be more clear.

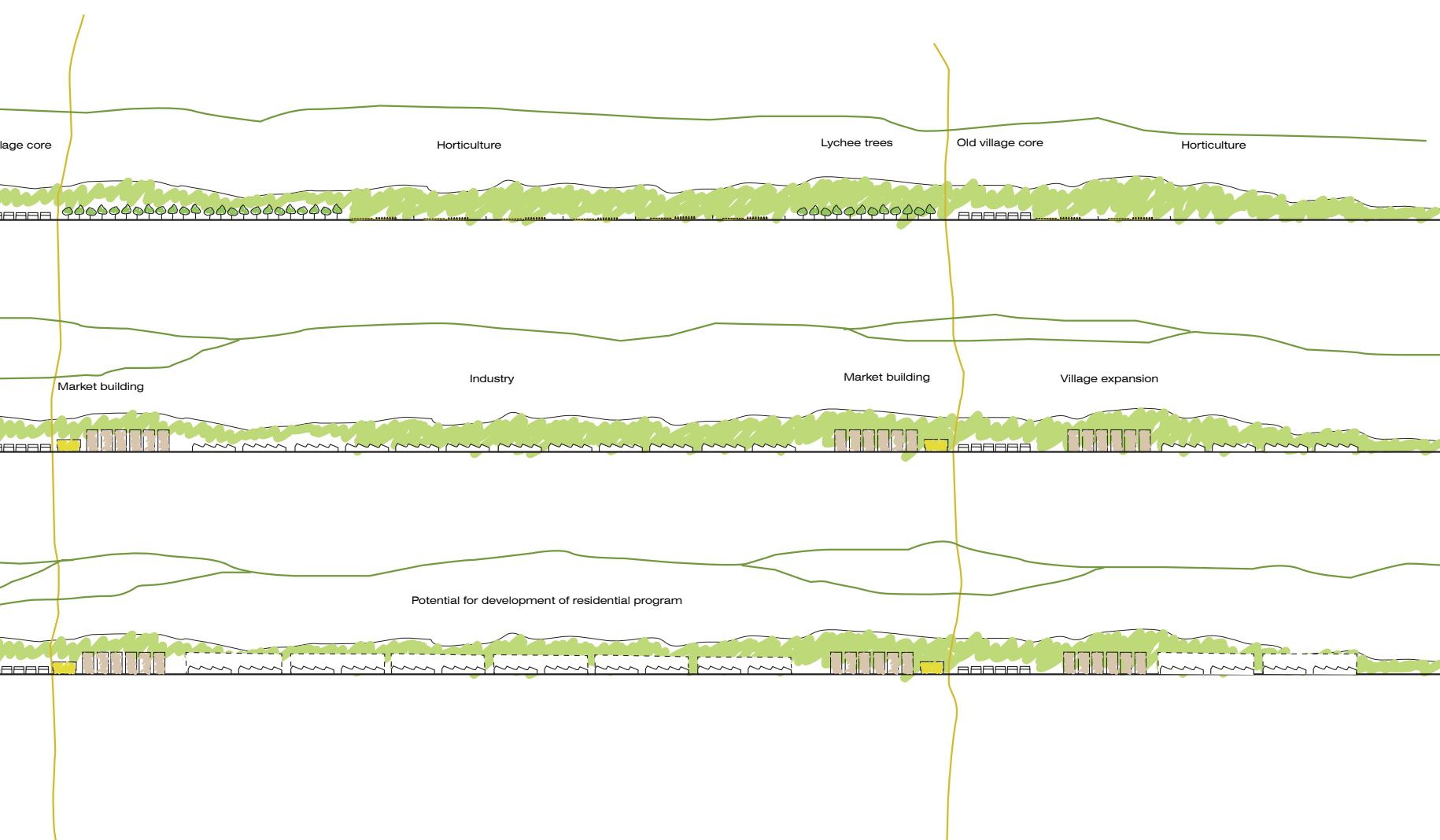
1. Motorway
2. Regional road
3. Highground road
4. Ridge road
5. Perpendicular road



Section of historic situation. The river lies central in the valley. The most fertile lands around the river are used for horticulture. Safe from flooding lies the village. Behind the village lychee trees are cultivated. The higher grounds up the hill are not used for human activity.

Section of current situation. The village is expanded around the old core. The horticultural land along the river is transformed into more profitable industry. The regional road lies inbetween the village expansions and the industrial development. The marketbuilding lies at the centre of the village, along one of the old routes.

Section of potential future situation. The regional road is best suitable for the implementation of the metrosystem. The hilly area's with lychee trees, close to the village centre can be transformed into parcs.



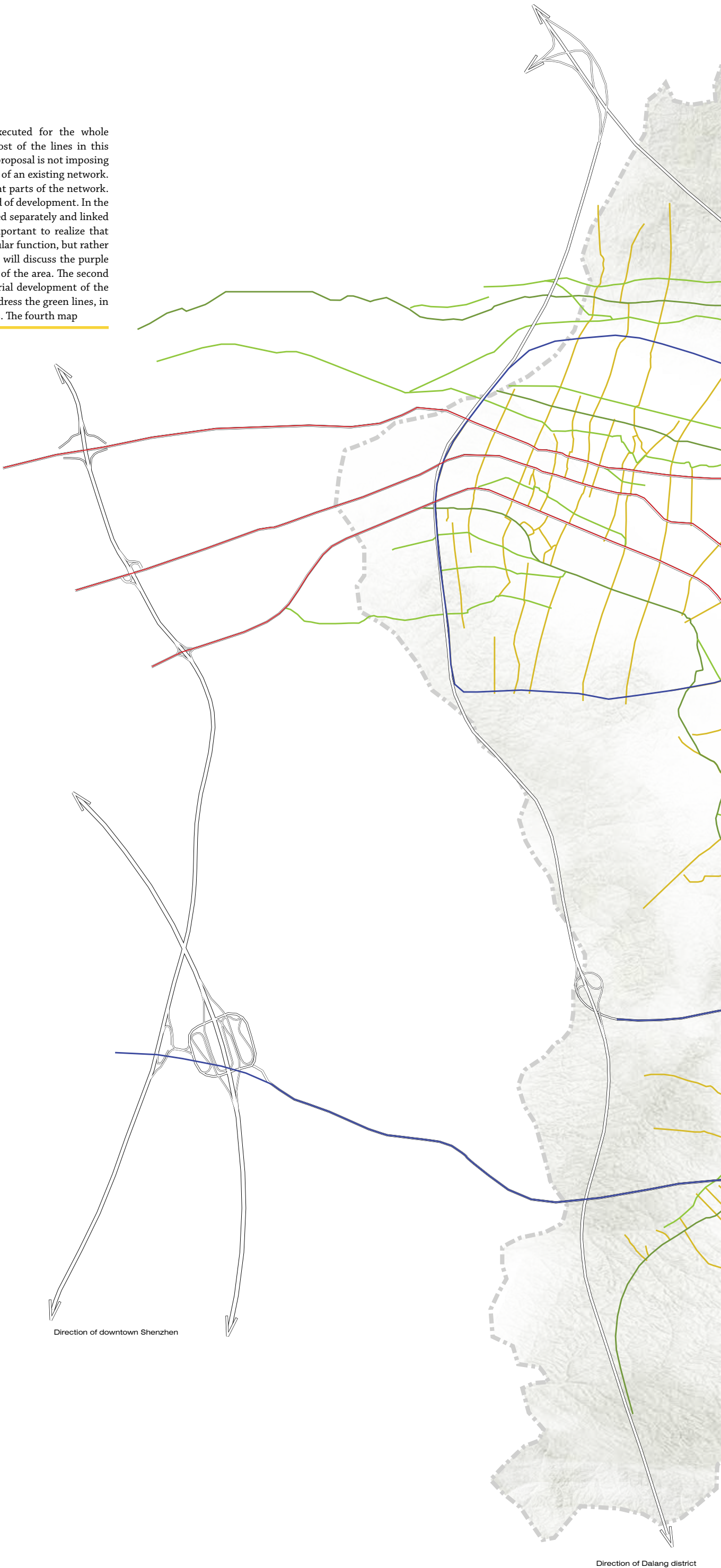
Section of historic situation. Villages are dotted alongside the river. The land inbetween is used for horticulture and lycheetrees.

Section of current situation. The village has expanded along the old routes running parallel to the river. The horticultural lands inbetween are transformed into factories.

Section of potential future situation. The industrial program inbetween the villages can be transformed into residential program, profiting from the location inbetween the village centers.

When the proposed systemization is executed for the whole Guangming district, the following network appears. Most of the lines in this network are existing lines, so it should be clear that this proposal is not imposing a new juxtapositioned network, but the slight adaptation of an existing network. In addition, some crucial links are made between different parts of the network. Each of the lines in the network adheres to a different kind of development. In the next series of maps, each layer in the network is discussed separately and linked to existing functions and future developments. It is important to realize that each line in the network is not be seen as fulfilling a singular function, but rather as having a focus on a particular function. The first map will discuss the purple lines, most strongly related to the horticultural function of the area. The second map is related to the blue lines and focus on the industrial development of the Guangming district. The third map The third map will address the green lines, in which the focus is on public facilities and leisure activities. The fourth map

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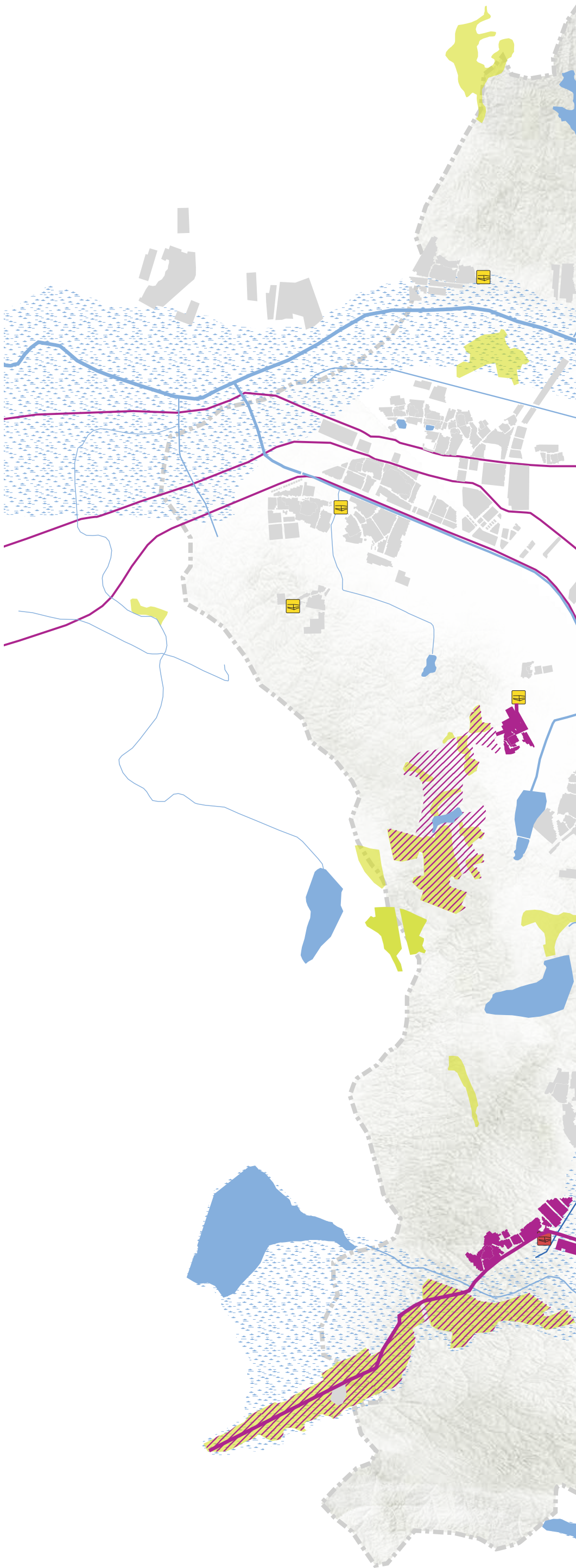
Maintenance of horticulture

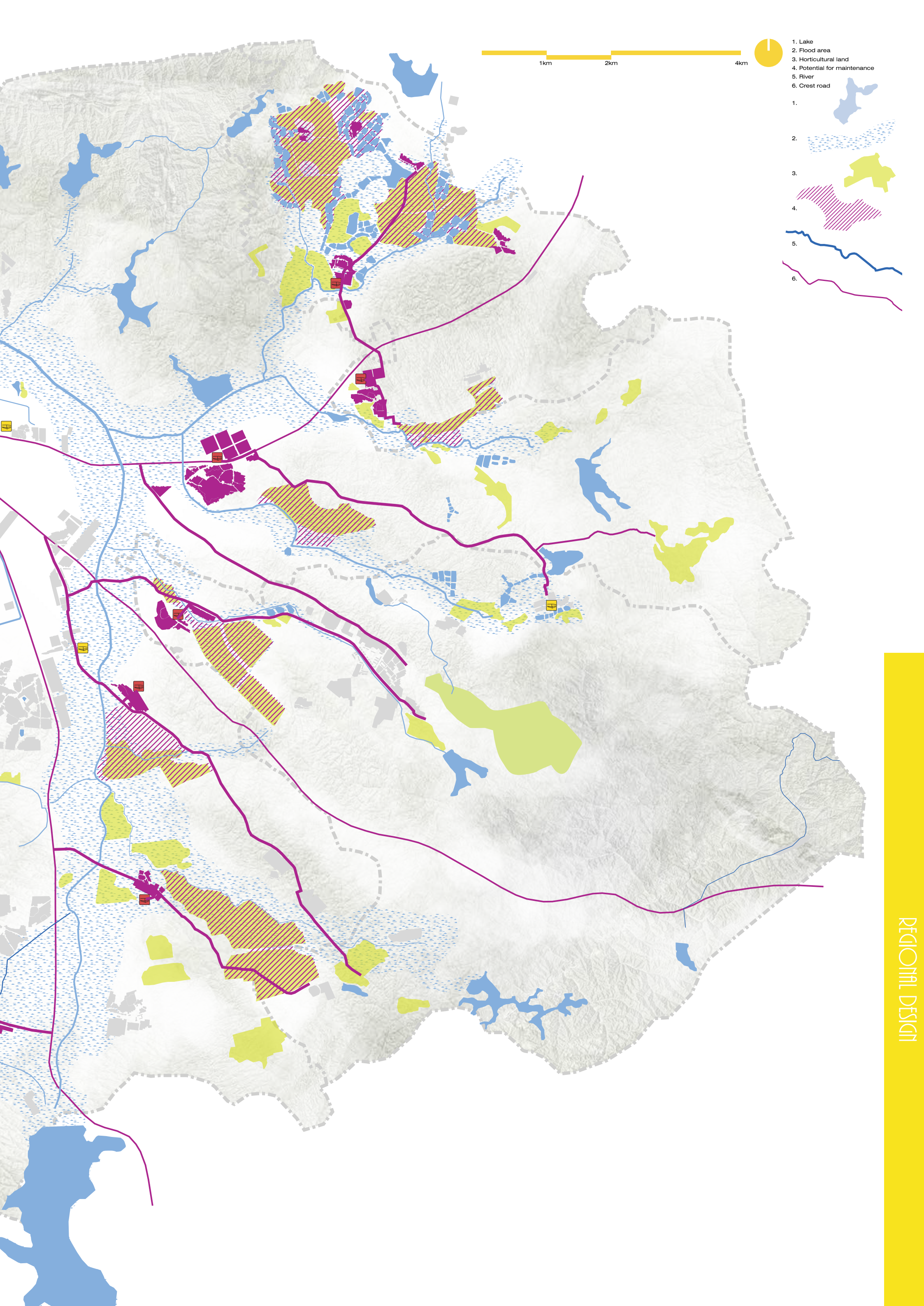
The horticultural areas had a double role in area of Guangming. The local government emphasises on the economic output of these areas, which is very low. But the horticulture in the area has another, more important function. New migrants that arrive in Guangming can continue their current profession as farmer. When migrants are new to the city their skill sets do not allow them to start a business or open a workshop. These skillsets have to do both with knowledge about the profession, as it has to do with knowledge about the area, local regulations and ways to finance a business.

The new developments regard the agricultural areas as retarded areas that have no real economic output. This reasoning leads them to the decision to plan new development on the current horticultural land. In the current masterplan of the area the horticultural lands are to be either park areas or new industrial developments.

My proposal is to maintain the existing horticultural lands for the local production of vegetables and fruit by new migrants. The existing horticultural areas follow a distinct pattern. Because the informal development of the villages operates from the old core outwards, the existing horticultural lands all lie at the periphery of the urban area. Like the market villages that are located in an arc alongside the two main river arteries, the horticultural areas also lie in an arc, approximately one kilometre away from the two main river arteries. The production of local food, could support the sustainable image the local Guangming government wants to project.

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Transformation of historical areas

The historical areas that have survived the recent development of the Guangming area are the old cores of the villages and the hilly areas that are difficult for construction. The hilly areas have retained their old function as areas of lychee tree cultivation. The historical areas have lost much of their original role, but are still the only historical areas of the city. In a city that is just 40 years old, the history of the villages plays a central role in the identity of the city. The traditional and communist architecture of the villages is of invaluable importance to future generations.

It is only a matter of time before the landprices of the old cores and hills are high enough to make the development of these areas profitable for the landlords and developers. Already, some old cores are slowly being transformed to new buildings. The pressure is especially high in the agglomerated villages, where space is very limited. The condition of the old cores varies strongly per village. In some villages the old core is still a vibrant part of the community. In most villages the old core has lost its role in the village. The maintenance of the buildings in the old core is often not good, which makes the old core look more like a ruin than a neighbourhood. Because of the bad conditions, the old core is the cheapest place in the village to rent a room and this attracts the poorest people of the village. All this adds up to a very problematic area in the centre of the village.

My proposal is to regenerate the historical areas into places which have a new meaning for the area. The hills with lychee trees can be transformed into parks. The historical cores can be transformed into touristic sites, high quality residential areas or creative industries. Because of the informal growth process from the old core outwards, the historical core and the hills have a very central position in the village. The areas can be easily connected to the regional structure. Other amenities should be located in coherence with the structure. Each park should be regarded as a separate design assignment, to be worked out in closer detail.

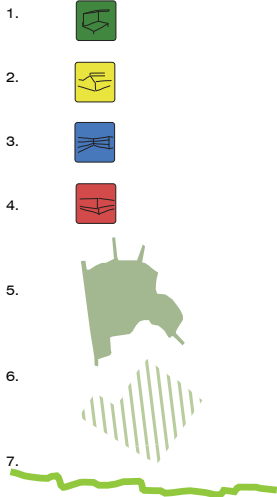
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1km 2km 4km



- 1. Cultural site
- 2. Ancestral hall
- 3. School
- 4. Market hall
- 5. Park area
- 6. Potential residential development
- 7. Ridge roads



New industrial development

Industry is the backbone of the current economy of the Guangming region. Industries provide jobs for most inhabitants of the region. Very important, the legal factory compounds generate tax revenue for the local government, while the informal workshops and commercial activity do not generate any profits for the municipal government. The industry works in close relation with the village. People work in the factories, but sleep, eat and spend their leisure time in the village. Only the bigger private industrial compounds operate more independently.

The new masterplan proposes a large part of the land for industrial developments. The government is trying to attract investors to finance industrial compounds around green industry. These larger compounds will deliver the local government with the necessary funds they need for their own budget. The industry will also provide the necessary jobs for new migrants to gain a regular income. The current plan considers the industrial compounds as isolated places of investment and not as an integrated part of the urban fabric.

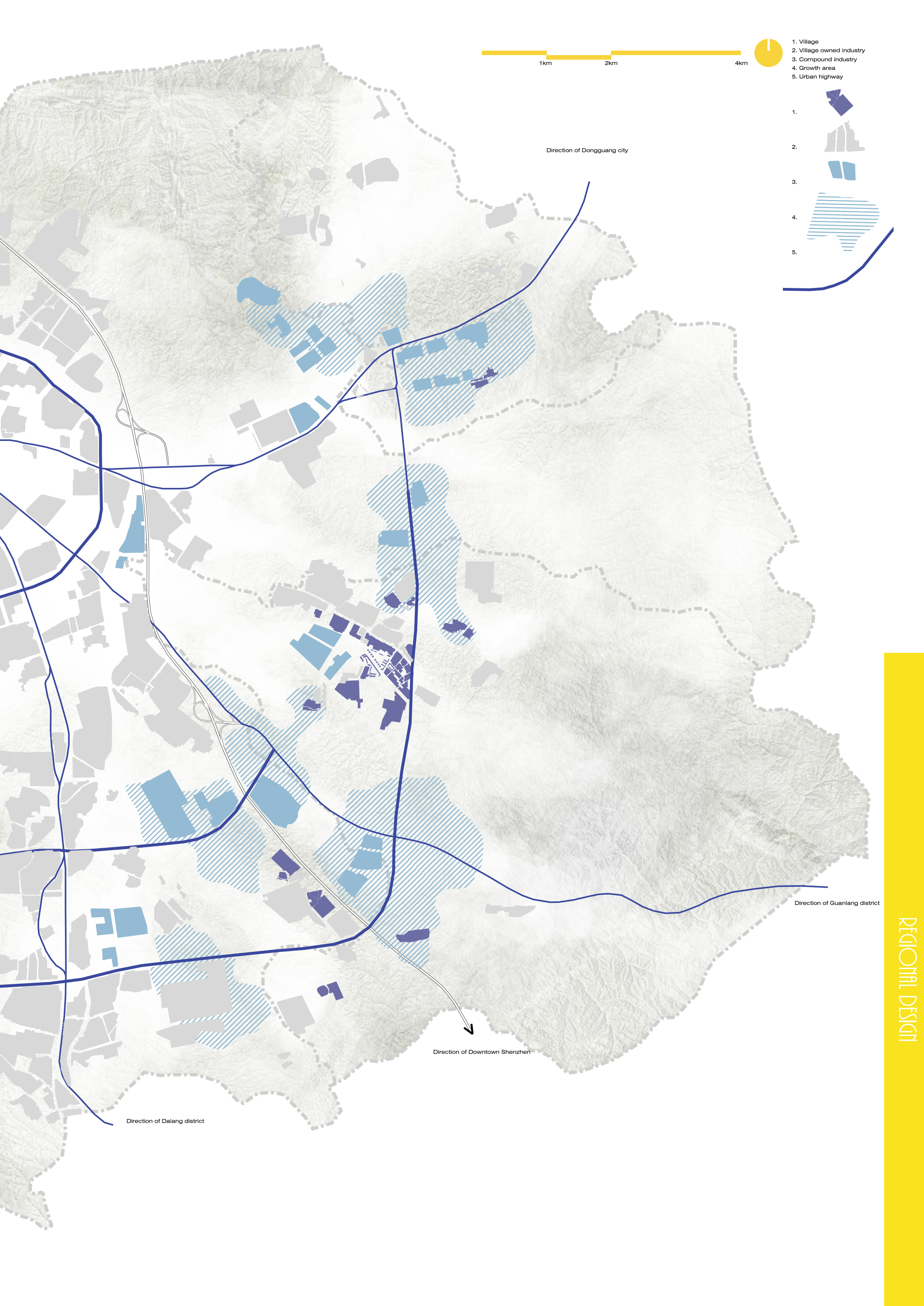
My proposal is to concentrate the industrial developments around the larger traffic arteries and connect the development of the peripheral villages to the development of new industry. The migrant employees of the factories can enjoy leisure in the villages, automatically also creating business opportunities for the migrants living and working in the village. Smaller factories will not provide rooms on the compound, so the villages in the vicinity must develop to provide residences to the new migrants. The focus on green industries can still operate in the plan.

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Direction of Guangzhou city

Direction of downtown Shenzhen

Direction of Dalang district



Direction of Dongguang city

- 1. Village
- 2. Village owned industry
- 3. Compound industry
- 4. Growth area
- 5. Urban highway

1.

2.

3.

4.

5.

Direction of Guanlang district

Direction of Downtown Shenzhen

Direction of Dalang district

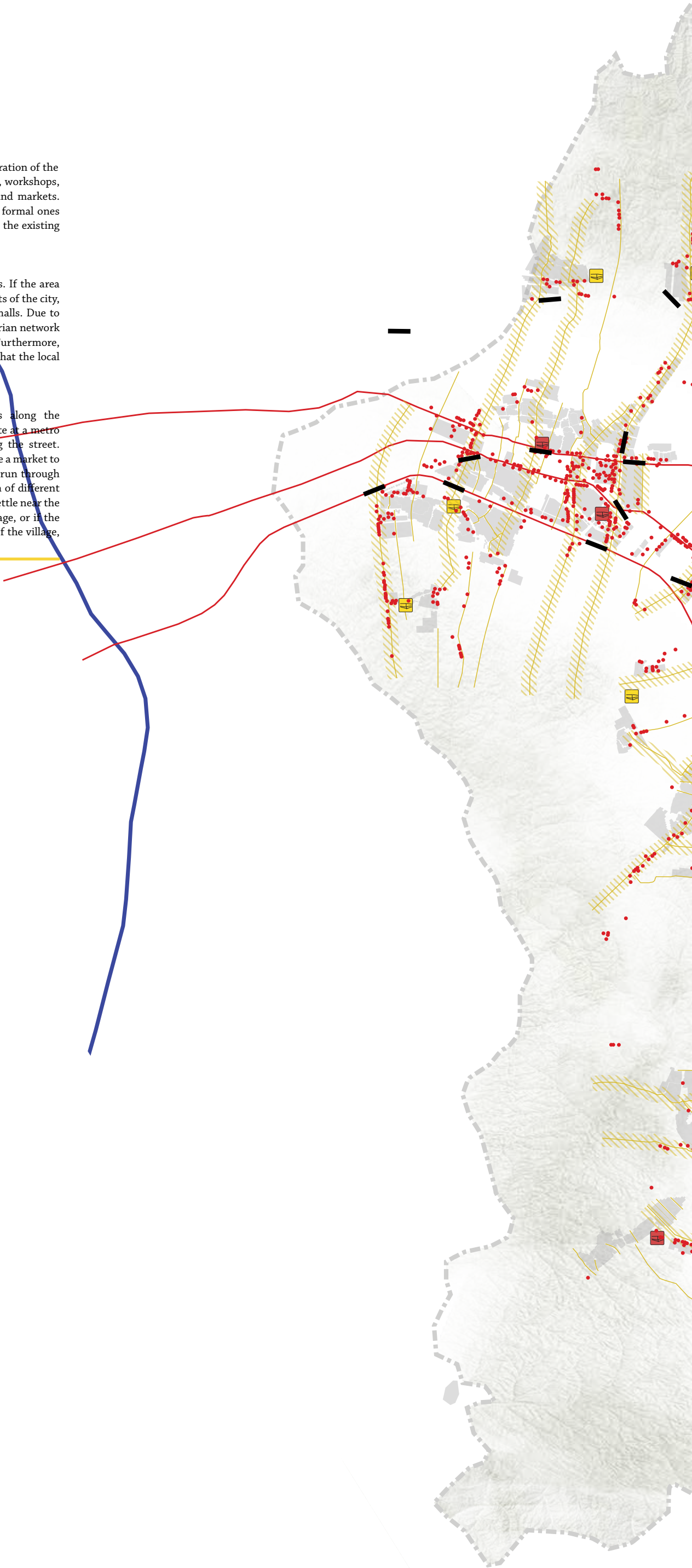
Commercial axes

Informal businesses are a key element in the economic integration of the migrants in Guangming. The businesses can take the form of shops, workshops, restaurants, etc. The businesses in Guangming are organized around markets. Not only the informal businesses react to the market, but also the formal ones are organized around the market. The markets have a pivotal role in the existing commercial system of the villages.

The new masterplan neglects the exiting commercial streets. If the area of Guangming would follow the same development path as other parts of the city, new commercial functions will be concentrated in large shopping malls. Due to the location of these malls, near traffic arteries instead of the pedestrian network it is difficult for informal businesses the gain profit from the mall. Furthermore, the malls focus on higher end goods, instead of the daily groceries that the local markets focus on.

My proposal is to extend the existing commercial axes along the perpendicular streets of the regional structure. All the axes terminate at a metro station, which greatly increases the flow of people moving along the street. Perpendicular streets that currently do not have a market should have a market to stimulate the commercial activity. Because the perpendicular roads run through all the different functional areas of the village, it creates a spectrum of different conditions for businesses to settle. Larger, formal businesses could settle near the regional road, while smaller informal business can settle in the village, or in the informal businesses are land-extensive, they can settle at the edge of the village, where the density is lower.

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Embedding of new infrastructure

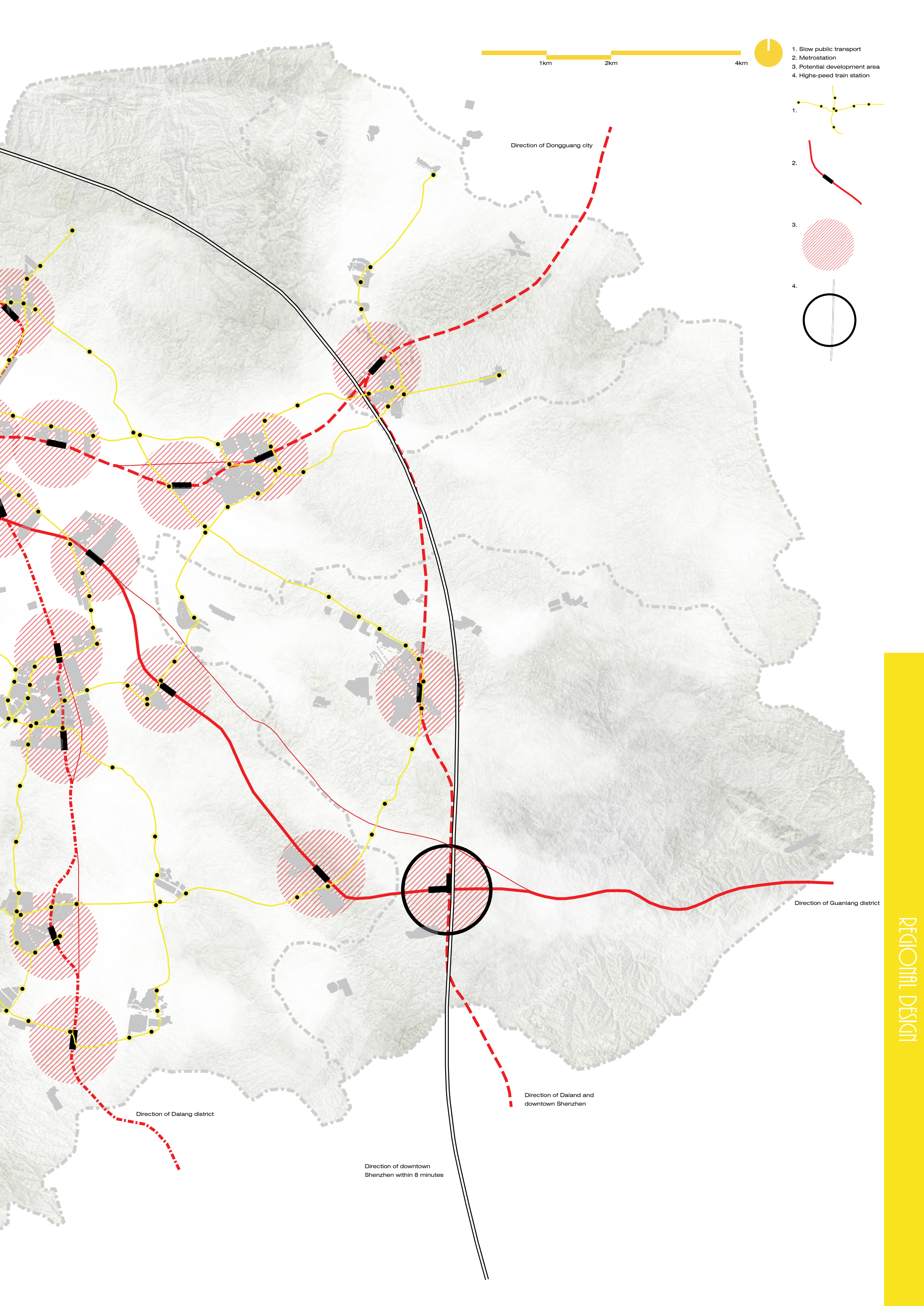
The existing public infrastructure in Guangming is limited to busses. These busses run mostly along the regional road and only 2 lines have a connection to downtown Shenzhen. In contrast to the systems of education and welfare, public infrastructure is accessible and affordable to the migrant population. The daily urban system is thus confined to the Guangming district. Most people do not even leave their village during a normal day. In addition to the direct benefits for public infrastructure, the bigger bus stations in Guangming offer opportunity for informal activity.

The new masterplan for Guangming indicates that new infrastructural connections (especially the metro) and new centres will be located outside the main centres of population. This means that the metro system will be implemented in the new developments, where the people are far more likely to travel by car. In the existing villages people will be forced into the car, since there is no nearby public infrastructure available.

My proposal is to integrate the new metro and formal amenities into the informal structure of the villages. The regional structure that was explained in the first section of this chapter plays an important role in the integration of the metro and amenities. The only feasible place to construct the metro is the wide section of the regional road, in order to prevent large scale demolishment of the urban fabric. Although this practice is common in other parts of Shenzhen, my proposal differs by leading the metro along the old route that exit from the regional road into the old village. In this way, the metro station can be located in the very heart of the village. Another crucial intervention is the connection of the high-speed train station to the metro system. The secondary public infrastructure supports the metro-system. The secondary system in yellow follows the green and yellow lines from the regional structure. Each lines make numerous connections with the metro system.

END OF CHAPTER

Direction of Bao'an district and
Bao'an international Airport



1km

2km

4km

- 1. Slow public transport
- 2. Metrostation
- 3. Potential development area
- 4. High-speed train station

Direction of Dongguan city

Direction of Guanlang district

Direction of Dalang district

Direction of downtown
Shenzhen within 8 minutes

Direction of Dalang and
downtown Shenzhen



PART 1 INTRODUCTION

PART 2 THEORETICAL FRAMEWORK

PART 3 VILLAGE DEVELOPMENT

PART 4 DEVELOPMENT PROPOSAL

PART 5 CONCLUSION

#11

CONCLUSION



Introduction

The conclusion of this project is embodied in the different layers of the regional development proposal. There are five key strategies that need to be implemented in order to maintain and strengthen the system of social mobility in Guangming. In addition, the interventions are related to the specific conditions of the developmental stages of the villages. The strategies are all based on a regional structure that incorporates the sequence of historical networks. The introduction and further development of formal program creates opportunities for the villages in the region. Through the maintenance of existing structures, the transformation of redundant functions and the embedding of new structures a large spectrum of opportunities is created. Through this project I have researched the informal development process of urban villages in Shenzhen. The project has been set up around the question *what spatial conditions create opportunities for slow process economic upgrading in the Shenzhen region and how can interventions in the development process of these villages, both formal and informal, contribute to a more inclusive city?* Informal development in China is distinctly different from other forms of urbanity (desakota). Therefore, it is necessary to formulate a theoretical language to describe and understand the villages in Shenzhen. The theoretical framework consisted of the formulation of a lens through which informal development, the adaptation of that lens in order to understand the changing role of the village for the main stakeholders and the division of those changing roles in a set of development stages.

Dominant perspectives lead to constructs

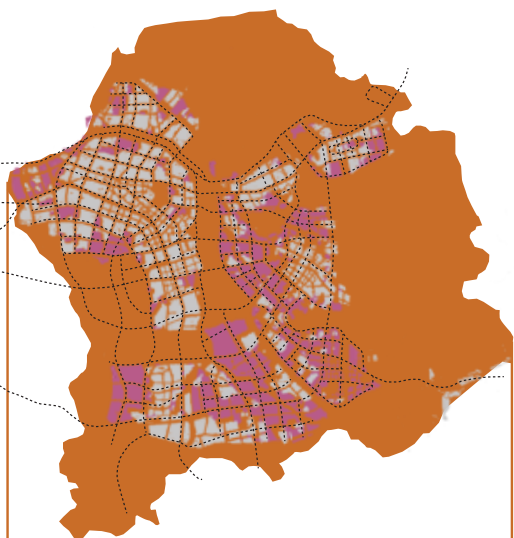
The current development model in Shenzhen is focused on attracting foreign investment to the Shenzhen region, while neglecting the social, cultural and economic role of the informally developed villages. In the assessment of the villages the poverty perspective is the dominant perspective through which the informal development of the villages is viewed. The urban villages present a very complicated issue in the city of Shenzhen. The complexity of the urban

village lies in its omnipresence, its importance and its distinct nature. The urban villages are found throughout the city, often at very strategic locations, which means the villages will be encountered in most planning. The villages house 50% of the population, which makes them an undeniable reality of the city. The villages are informally organized, which means they represent a completely different logic than the formal city. Despite the omnipresence and importance of the villages, the distinct nature of the informally developed villages is not completely understood and not fully recognized. This lack of understanding leads to lack of spatial integration of the village and a lack of social inclusion for the migrant inhabitants of the villages. Although there has been academic attention for the social inclusion of the inhabitants, little is known about the spatial aspects of the village, which makes a successful spatial integrating nearly impossible. Academic research on informally developed villages, perhaps as a reaction to the government focus, has taken on the scope of the cultural perspective, in which is mainly concerned on the cultural and historic value of the villages. An over emphasis on the cultural perspective creates the danger of seeing the dynamic, vibrant communities as a product of their historic artefacts. This would lead to the assumption that a static preservation of the historical artifacts would somehow also automatically preserve the vibrant communities of the villages. Although this research is of valuable meaning, both the academic and governmental focus addresses the village as an urban anomaly. The vibrant urban village is an exception to the otherwise restrictive character of the formal city. The term urban village or village in the city relates to this vibrant character of the rural roots of the village. My research has shown that for the largest part of the development, the formal city was the exception and the informally developed village was the rule. This polarization of the village and the urban village construct, gives rise to another construct, that of the newtown. A newtown only makes sense, if the territory on which it is proposed has no urban development. The demarcation of the villages as un-urban gives the government the opportunity to impose their ideas of urbanization onto the territory, which we have seen, do not make sense in an area that has already urbanized informally. In any other context we would call the villages of Guangming towns or cities, but clearly in China these words carry different meaning. It is clear that our terminology is not suited for the cultural, social, economic and spatial patterns of the villages. The Guangming area represents an opportunity to take a critical look at the current newtown development model. For the research in the informal development in Guangming I adopted the dualistic perspective take focusses on the socio-economic role of the villages.

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Government proposal

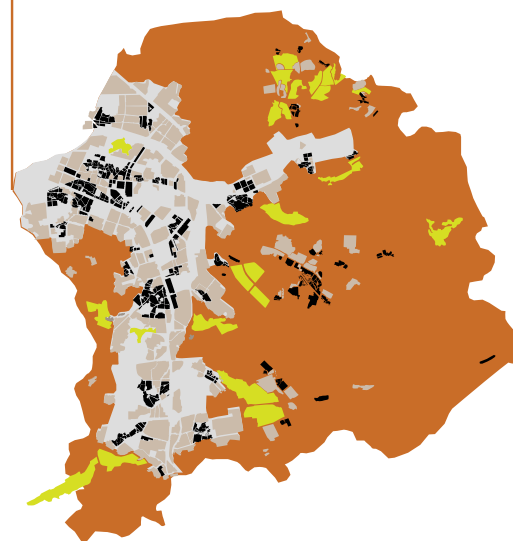
The newtown construct. Because the village are perceived to be isolated non-urban incidents, the government can propose a new superimposed masterplan.



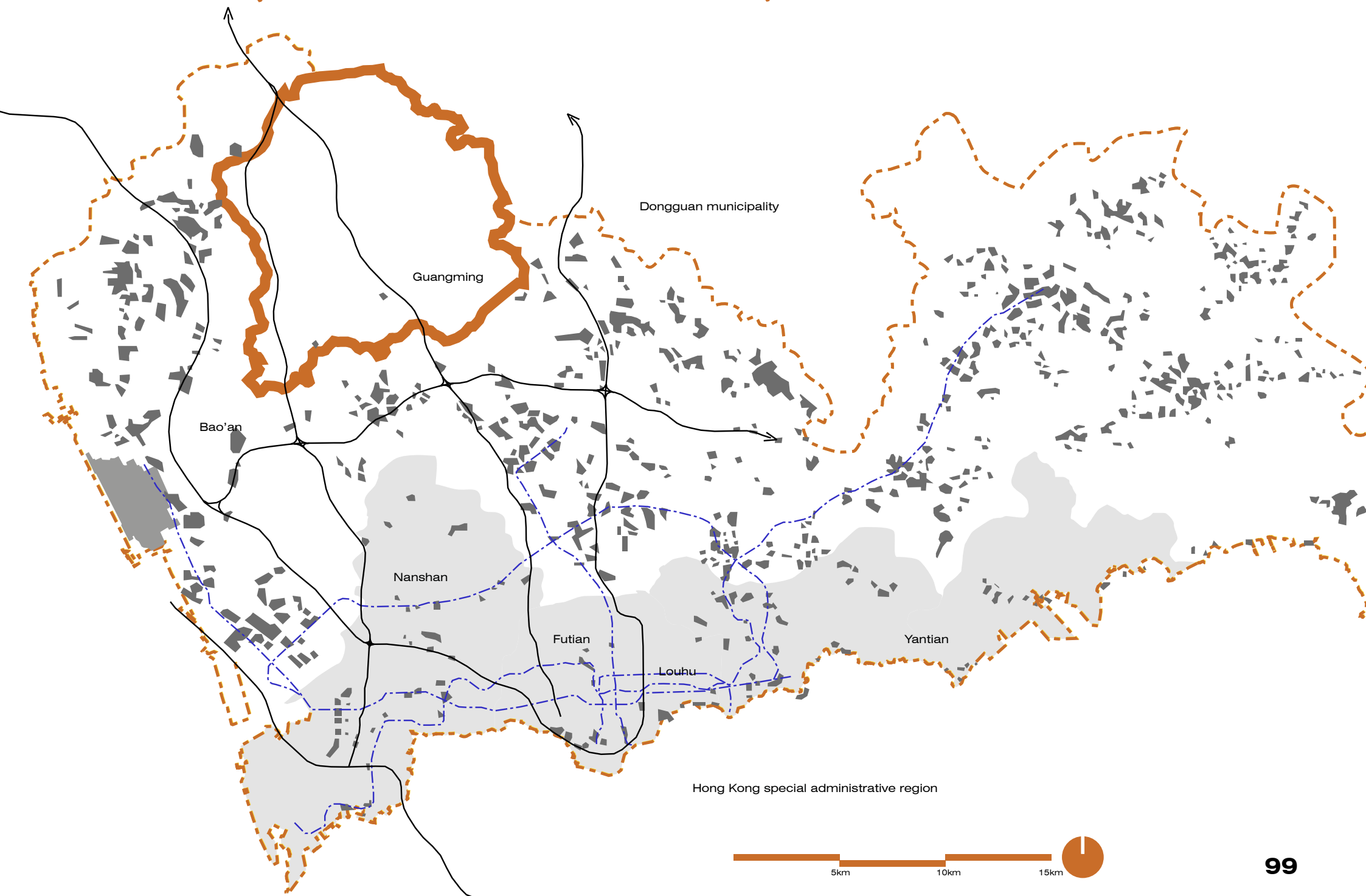
The urban village construct. The settlements in the Guangming district are perceived as isolated incidents and not viewed as part of a socio-economic and spatial system.

**Alternative proposal**

The alternative proposal that is argued for in this research. Not the implementation of a uniform grid, but the slow transformation and adaptation of the existing, informally grown network.



In the existing situation in Guangming an largely informally system has grown to cover the Guangming territory. This system consists of different functional areas and a network that connects these areas. This functioning of the system is essential for the socio-economic integration of the migrant population.

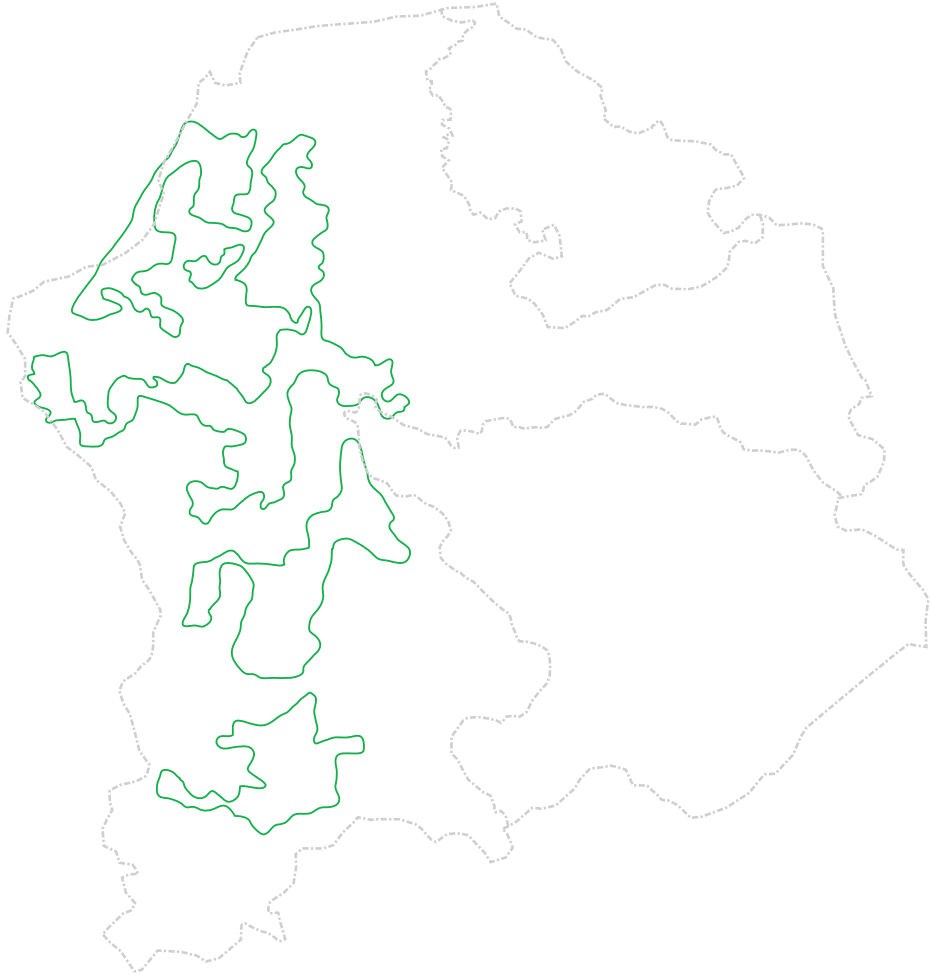
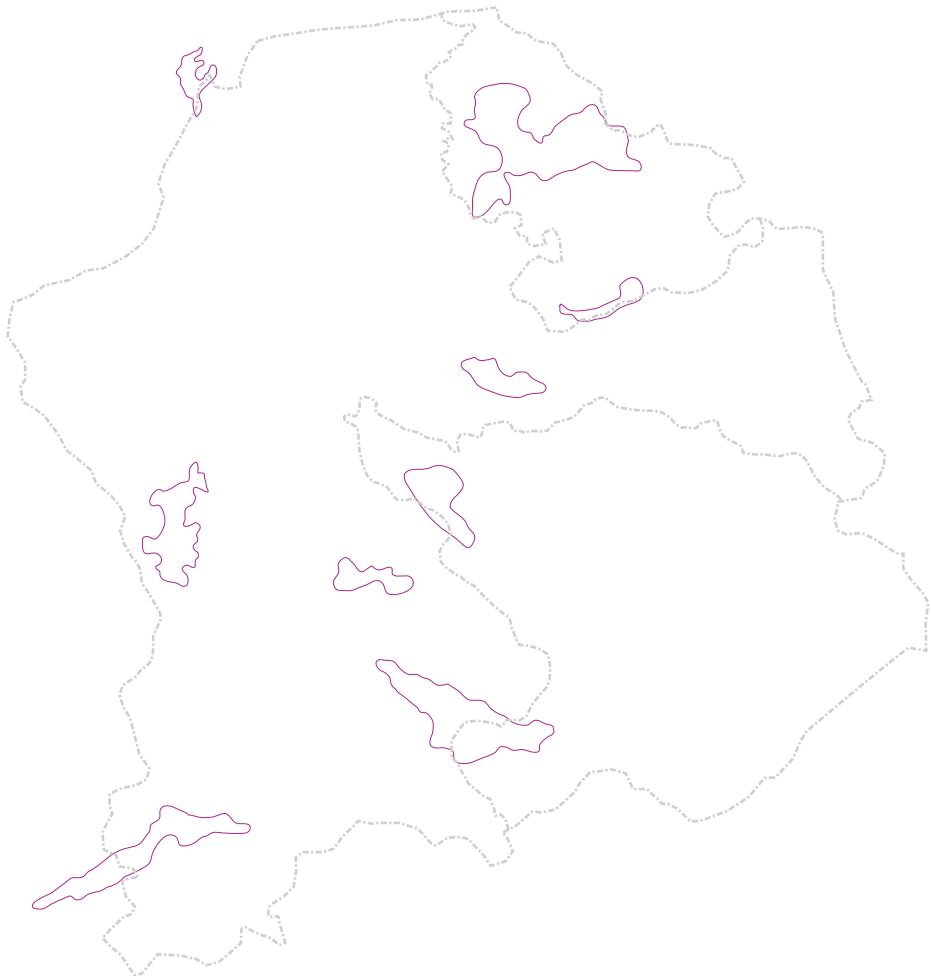
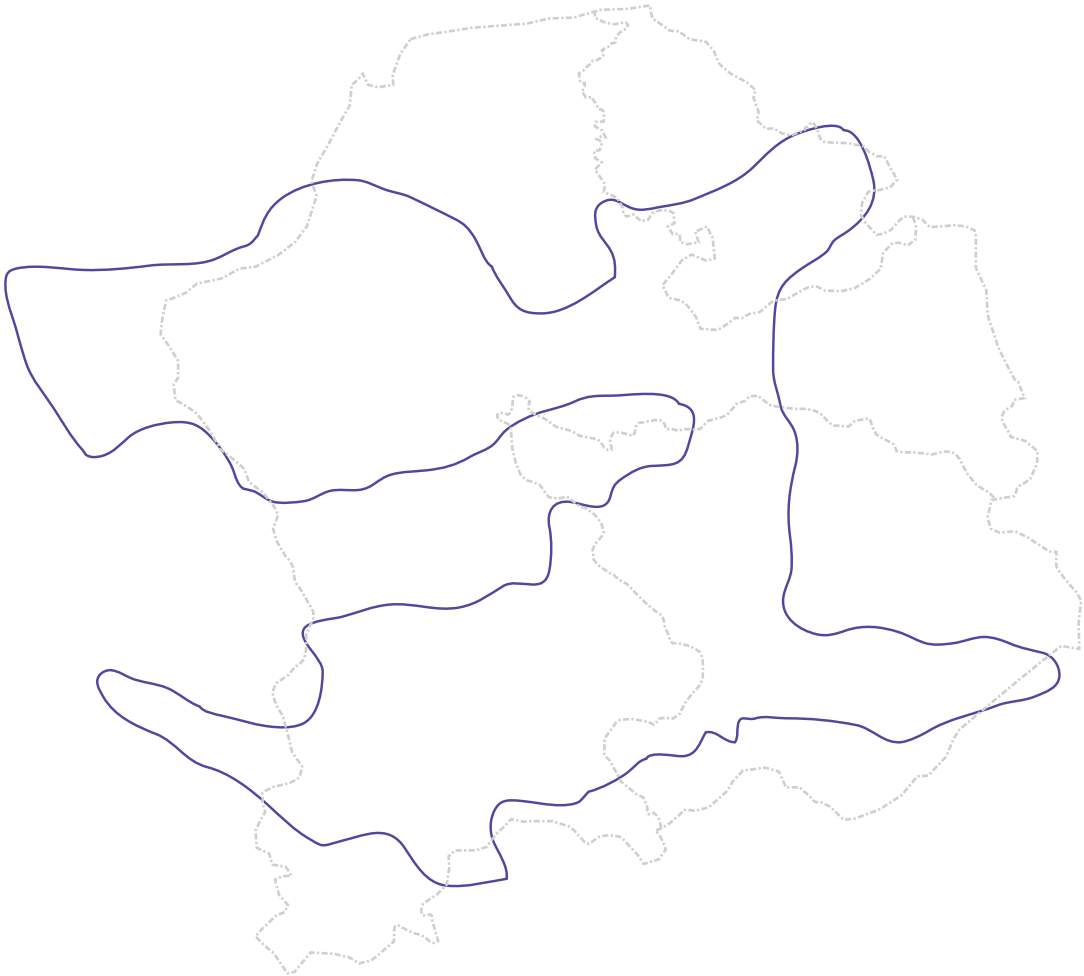


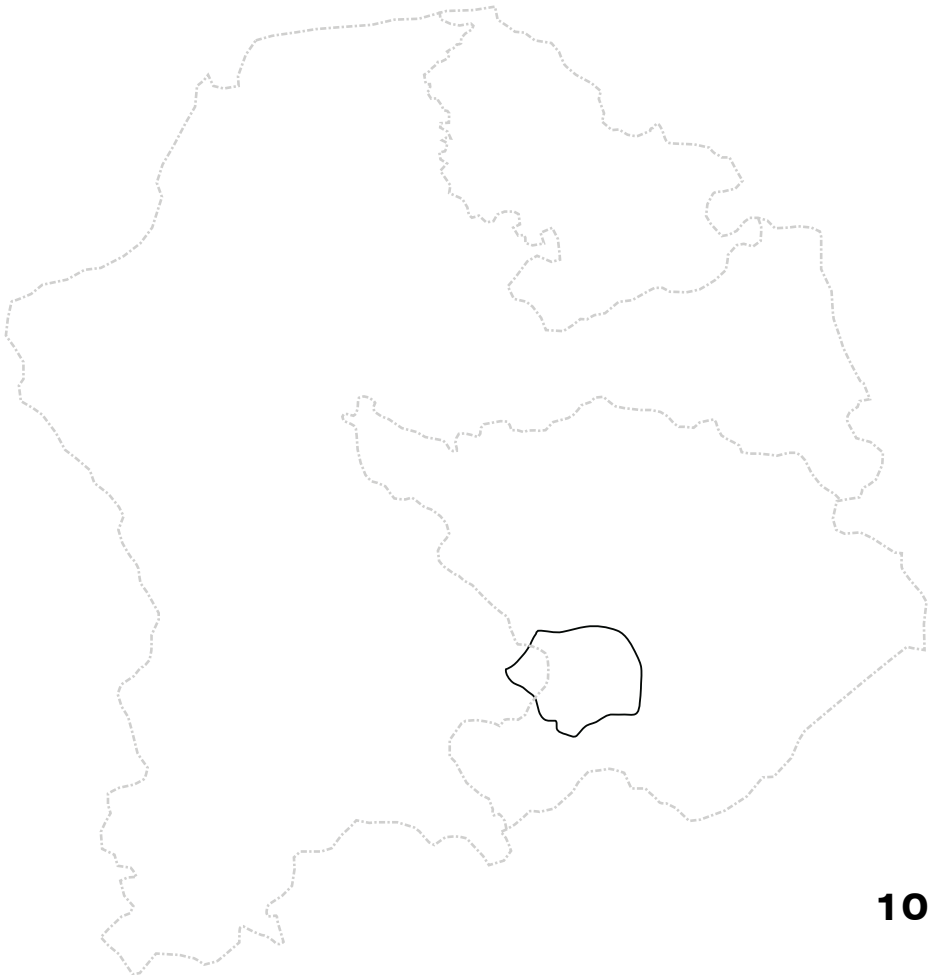
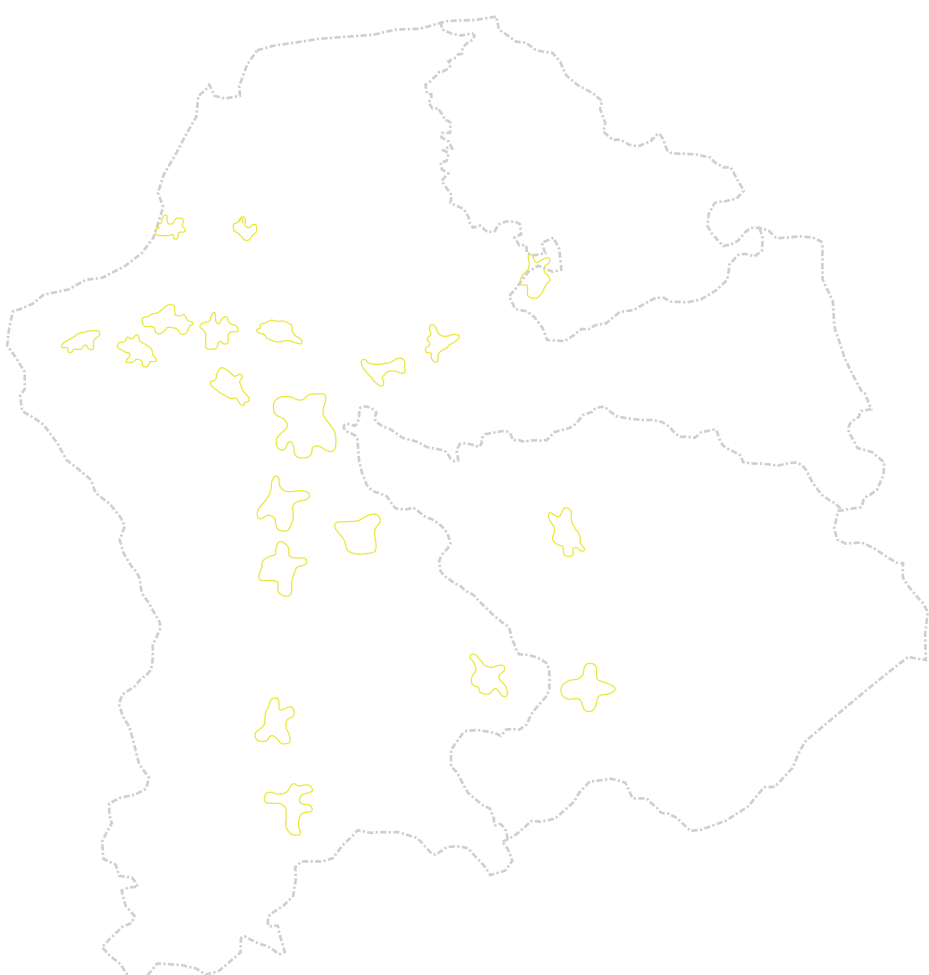
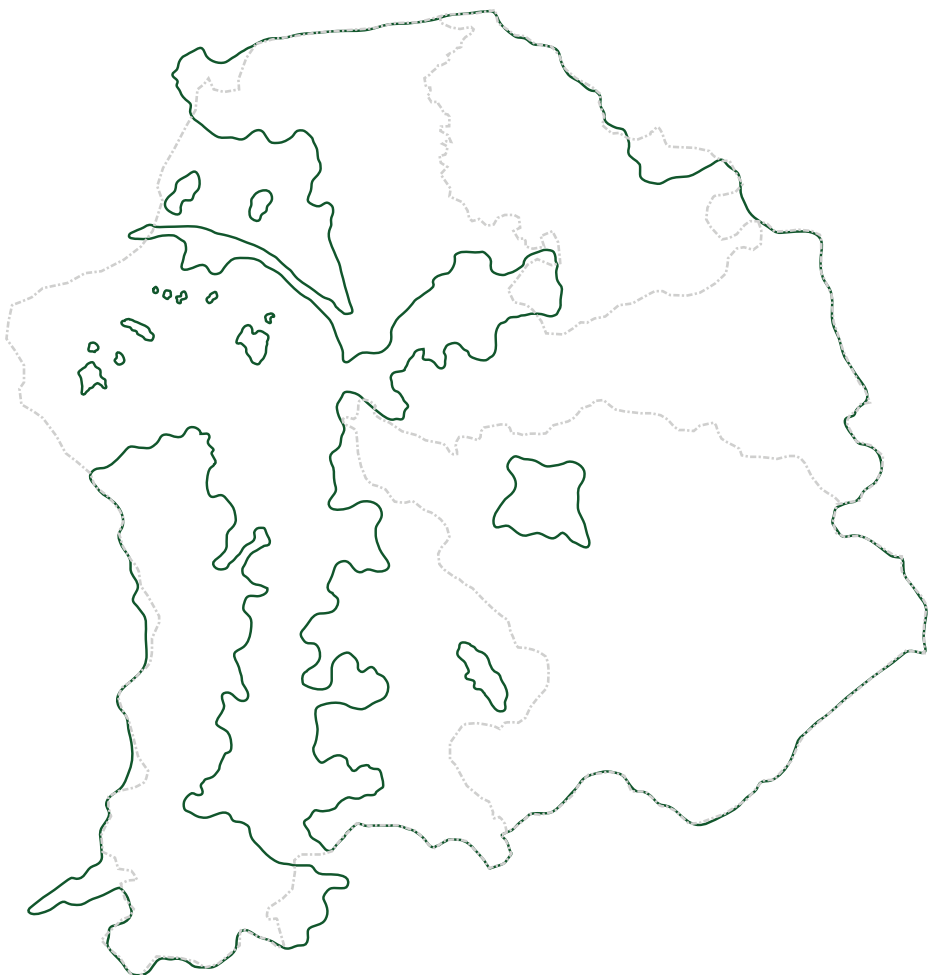
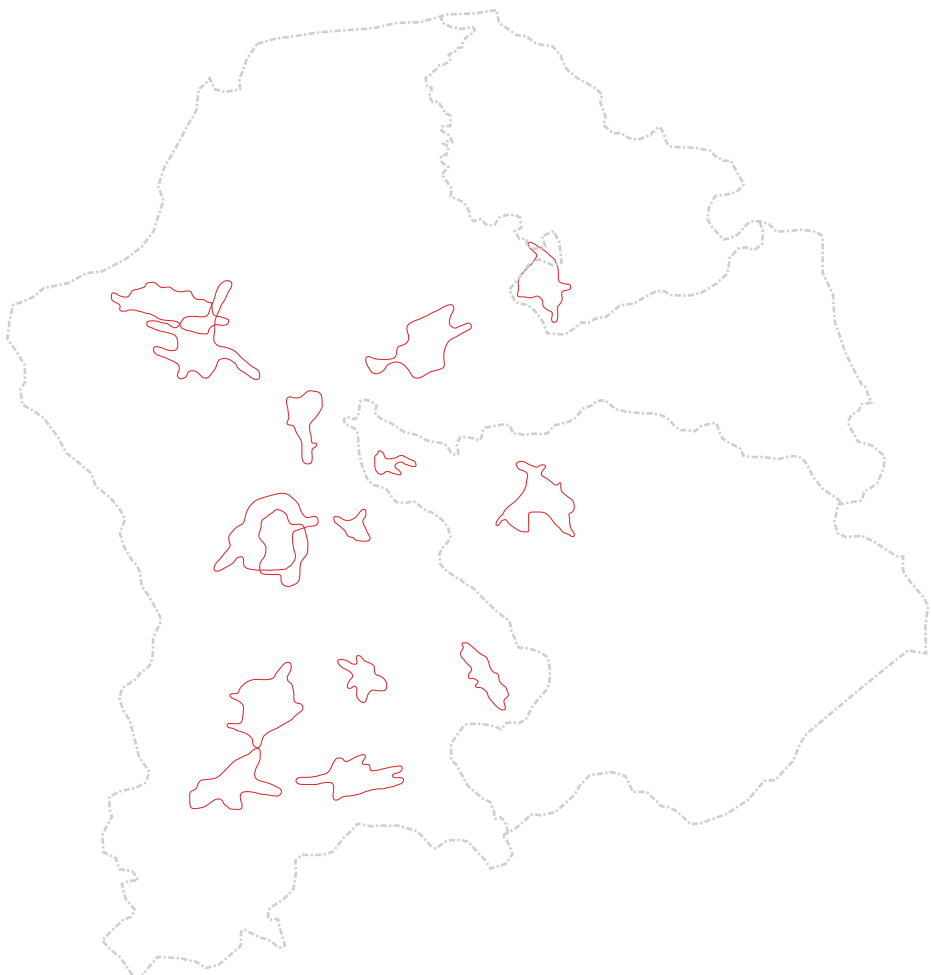
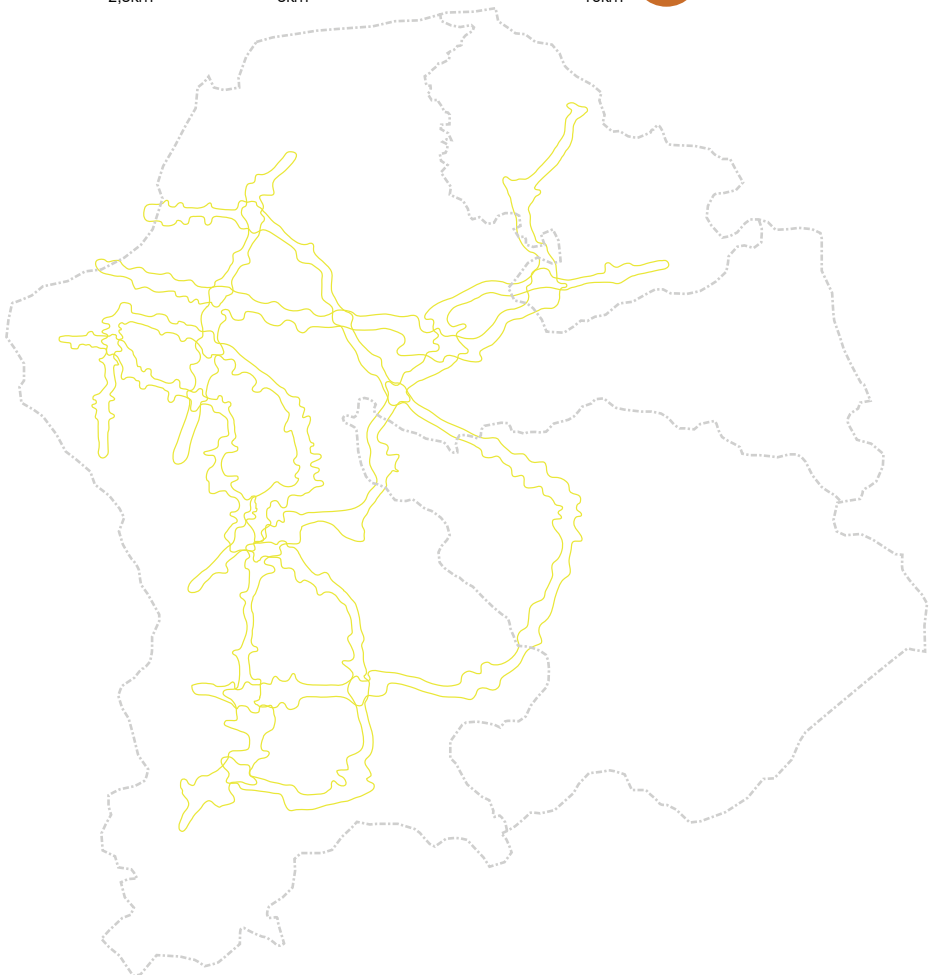
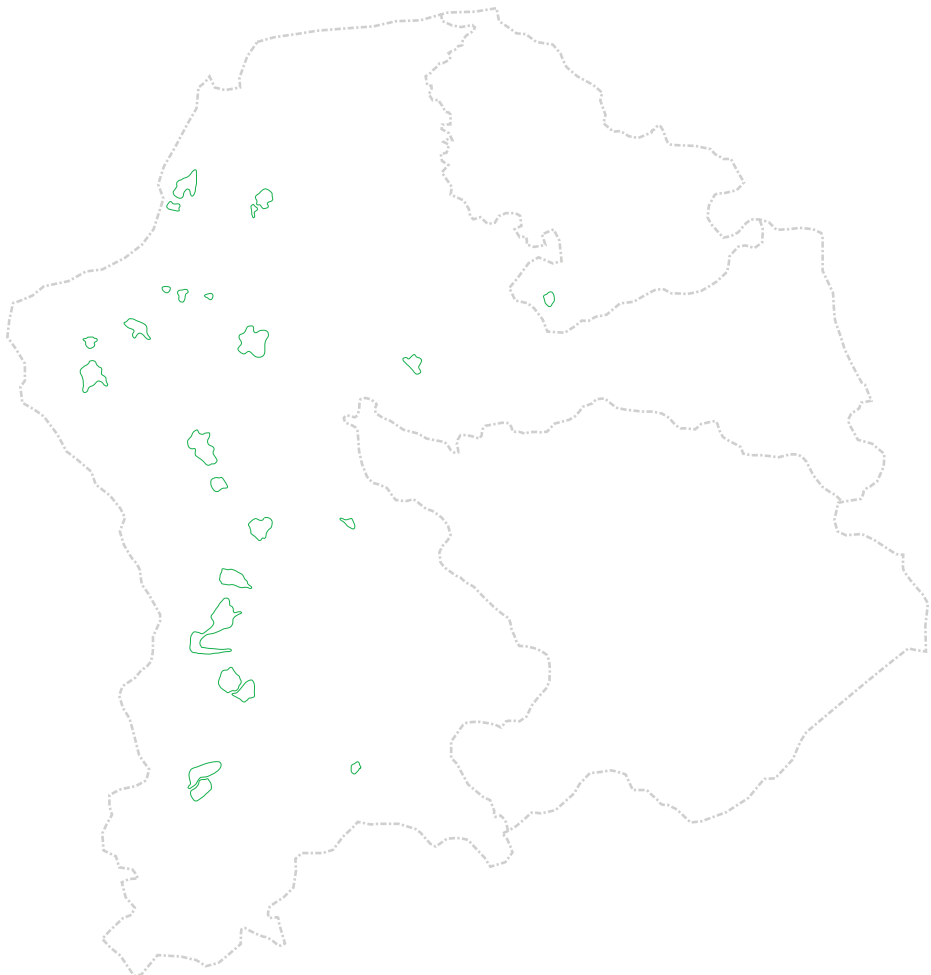
Dualistic perspective reveals new role

Informality and informal development are the central themes of this thesis. These terms invoke many thoughts and images, depending on the actor you speak to. These ideas about informal development are not always completely founded on the basis on facts. Moreover, many people have never been inside a development where informal practices are dominant, which makes any assessment based on second hand information. I would like to address to common misconceptions about informal development. Firstly, informal development is commonly thought to be chaotic, without structure. And secondly, the environment of informal development represents a failure of society. The first assumption about informal development refers very much to the *appearance* of informal settlements and not to the functional system of informal settlements. In my research I have shown that the informal development follows very clear principles and structures. These structures are historically grown from the natural landscape and the traditional rural patterns in the area. The informal development operates under very economic principles. Land and buildings are maximized for profit. Shops concentrate around the busiest hubs in the network. When growing, the networks remain in place because it would be uneconomic to relocate them. The second assumption is strongly influenced by the way the middle class perceives poor neighbourhoods. Looking from the wealthy parts of the city to informal development, these areas appear to be poor. This assumption forgets to take into account the process that the inhabitants are going through. Looking from the countryside, the informal developments in and around cities are much better than their rural hometowns. The informally organized urban villages are essentially incubators for the formation of social networks and economic life and the villages allow its inhabitants to enter a process of slow socio-economic upgrading. The poor urban quality, bad building quality should not be improved. Exactly because these places are illegal and have such a bad appearance they offer rooms with cheap rent and spaces to open a shop or workshop. Without additional supporting policies, physical improvement of the built environment of the informal villages will mean a structural *reduction* of potential of the informal villages to improve the lives of the floating population.

The proposed interventions and natural conditions of the Guangming district create a sequence of chances for future development. When these chances are plotted on a map of Guangming a broad spectrum of opportunities arise. The chances should be combined to fit particular development. A private company might look for cheap land and good regional connectivity, while a migrant looking for a business opportunity will look at the presence of market and a small cheap rental space.

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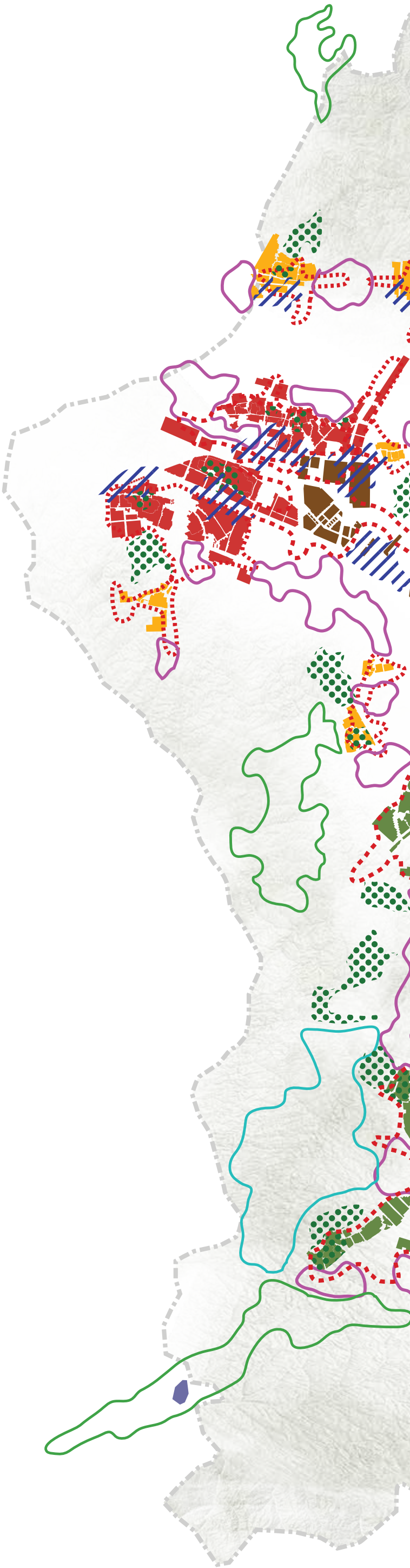


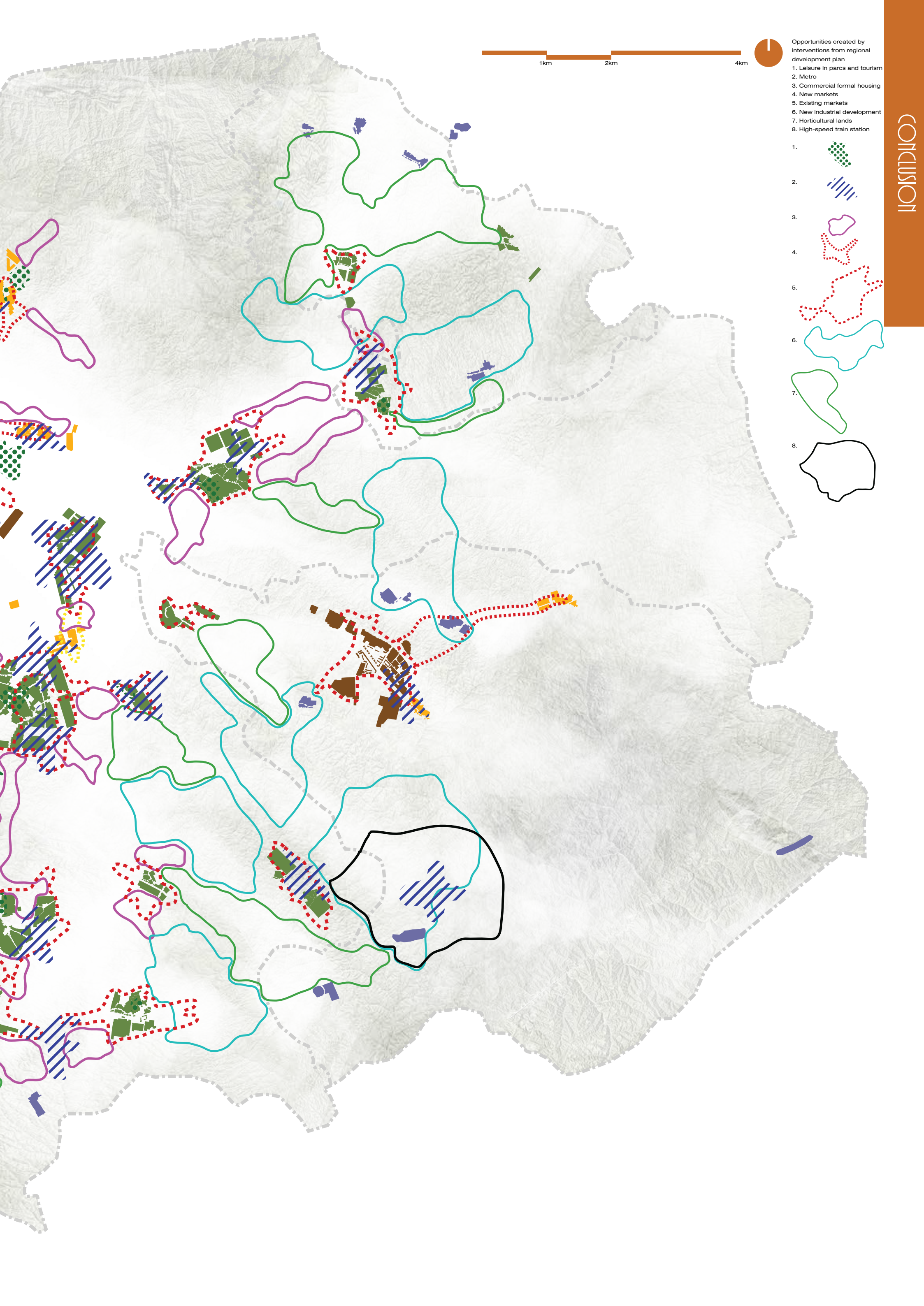


Village specific approach

The adoption of the dualistic perspective on informal development allowed me to distinguish the critical spatial elements for the successful integration of migrants into the city of Shenzhen. The study of the relation between these spatial elements concluded in a new conception of a regional network of village-interior spaces that can be considered as the main structure for informal activity. Because this system came into place through a close interaction between the informal practices of the inhabitants and informally expanding villages, the system has evolved to a very high standard. These informal processes operate under harsh economic rules. Without any form of subsidy, welfare or citizen participation on behalf of the migrant, most informal activities are directed towards making profit. The dominance of small actors in the informal development process means that any transition in the village happens gradually, rather than in big steps. Essential in the socio-economic upgrading of the floating population is the recognition of the condition of transition from rural people to urbanites. The condition of transition means that the floating population group is not uniform; but consists of broad spectrum of migrants, each in a different phase of transition. The different cultures, skills and networks, which is a social condition, are directly related to spatial conditions of the development stage of the village. Interventions in the informal development process of the villages should be fitting to the needs and challenges of the inhabitants of the village. Because of a lack of knowledge in the development process of the villages, interventions approaches have been uniform for all villages in the Shenzhen municipality. In part, this lack of knowledge has come from a focus on the fully embedded urban village. Although this research is of valuable meaning, it also creates a false image of broad spectrum of villages that are present in Shenzhen. All villages go through a number of stages, in which the inhabitants fit the spatial form and economic profile of the village. In the research five development stages are distinguished – the peripheral-, the production-, the market-, the administrative- and the agglomerated village-. Off these stages, the market village showed most opportunity for socio-economic upgrading, because it had a good network and a great variety of functions. Departing from the notion of slow transition, my proposal proposes the careful adaption and modification of existing artefacts and structures, rather than imposing new structures. The next chapter will relate this approach to current approaches to informal development.

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1km

2km

4km

- Opportunities created by interventions from regional development plan
1. Leisure in parcs and tourism
 2. Metro
 3. Commercial formal housing
 4. New markets
 5. Existing markets
 6. New industrial development
 7. Horticultural lands
 8. High-speed train station

- 1.
- 2.
- 3.
- 4.
- 5.
- 6.
- 7.
- 8.

CONCLUSION

#12

RECOMMENDATIONS



This research argues that the current development model lacks a good integration of informal and formal development, which leads to a slow decrease of opportunities for the socio-economic upgrading of the migrant population. Because current development models have showed little recognition of the informal network, this research has been focusing on analysing spatial conditions in the informal development process that support the slow socio-economic upgrading of the migrant population in Shenzhen. The regional design proposal departs from the notion to integrate the informally grown system with new formal interventions. To put this approach in perspective this chapter will review current development strategies for informal areas. Systematic and well documented approaches to informal development have only been developed in the second part of twentieth century. According to Wekesa, at least five different approaches to the problem of inadequate housing for the urban poor have been developed in this period – direct public housing; sites and service schemes; settlement upgrading; housing production and delivery modes; reforming building codes and standard– and this review will use the same categorization. Using the different perspectives on informal development and the overview of current approaches, will allow me to transfer my insights into more general recommendations towards development strategies

Direct public housing aims to solve the issue of inadequate housing by providing public financed housing to the urban poor. This approach is made possible by two economizing measures. The first is to locate the public housing on the periphery of the city, where land for construction is cheap. The second measure is the standardization of the housing stock in order to save on construction costs. The combination of these measures meant that the social housing was generally located away from the main centres of employment and that the housing stock was not suitable for the larger families that were housed in them(Wekesa, Steyn, & Otieno, 2011, p. 241). “Slums were considered ‘relics of traditional villages’ and in the process of being absorbed by the new urban planning scheme inherited from Western societies-with little consideration of local and cultural realities.”(Sietchiping, 2005, p. 6). This approach was especially popular in the 1950’s and 1960’s.

Site and service schemes are indirect public housing schemes in which areas were fitted with basic infrastructure and the land was subdivided for individual owners to construct their own house(Wekesa et al., 2011, p. 241). Centrally located slums were cleared and relocated towards the periphery. The land that was made available for relocation was often not enough to compensate for the demolition(Sietchiping, 2005, p. 6). The indirect public housing schemes attempted to incorporate some of the informal development mechanism into the formal planning. Unfortunately, the schemes only repeated the physical layer, while ignoring the social, economic and political layers that are part of any slum. The schemes were mostly adopted in the 1970’, as a cheaper solution to the direct public housing approach.

Settlement upgrading aims to solve the issue of housing by making physical improvements to the infrastructure of existing slums. The psychical improvement may include the provision of electricity, drinking water, sewage, lighting, paved roads and public facilities such as schools and health clinics. The major difference compared to the direct and indirect public housing schemes is that this approach does not demolish the slums and is considerably less expensive because it does not involve the acquisition of land. According to Sietchiping (2005) there are four drawbacks to this approach. Firstly, these schemes are often financed by foreign agencies, which means they are very dependent. Secondly, because of the psychical improvements land prices in many slums increase, leading to land speculation and gentrification. This issue is amplified by a third problem, the lack of security of tenure and income enhancing activities into the schemes. The lack of these non-physical provisions means that it is very difficult for the original inhabitants to profit from the approach. Finally, the dominance of small scale interventions meant that the approach lacked a clear vision about a city-wide solution to the problem. The approach addressed only few areas and also (under the influence of its own gentrifying mechanisms) did not prevent the emergence of new slums. This approach, that emphasis the local conditions is popular under NGO’s (who are also the biggest financiers) and has become popular from the late 1970’s onwards.

Security of tenure and enabling approach emphasises the importance of a non-volatile land market. The hypothesis is that if slum dwellers have a security of tenure they can upgrade their property without fear of eviction. It also assumes that within this upgrading process, people will gain a sense of belonging. “the regularization of this informal environment will help address the problem of tenure insecurity in already established slums, which otherwise would translate into a vicious cycle of construction, destruction, eviction and reconstruction.”(Sietchiping, 2005, p. 9) As the settlement upgrading approach,

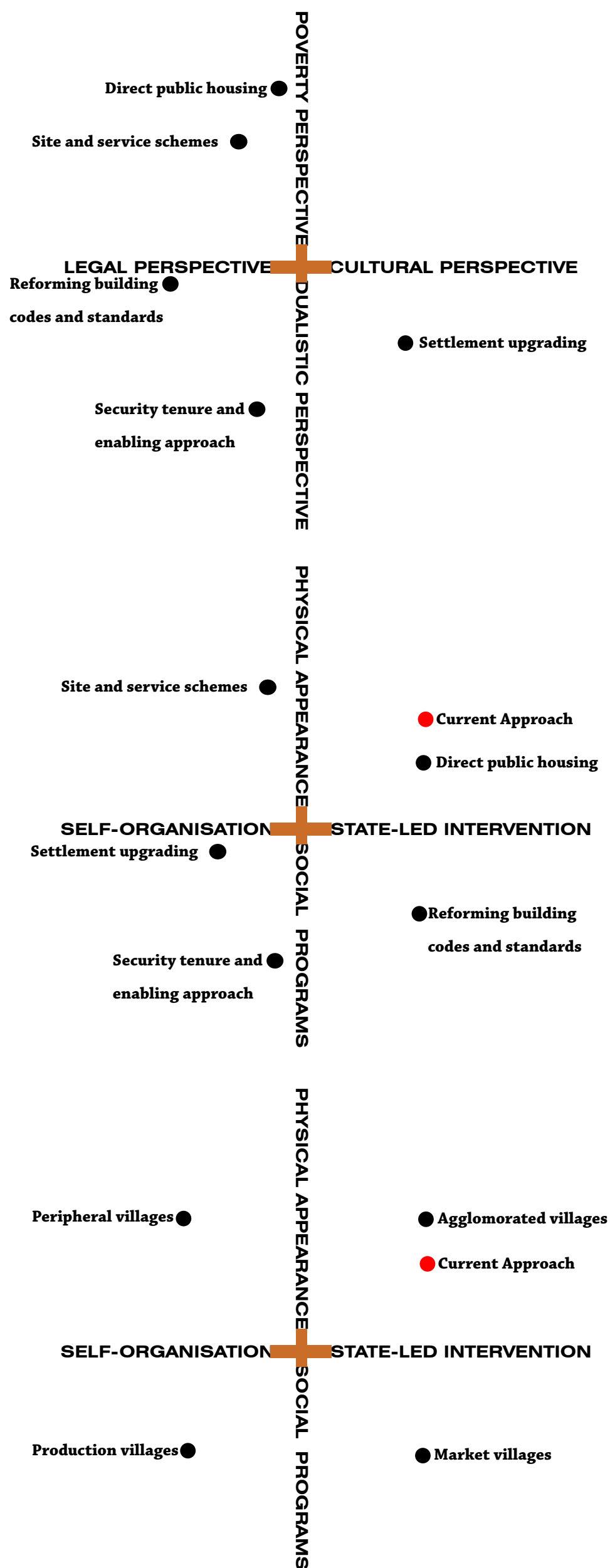
this approach does not address the emergence of new slums. In additions, this approach might be most beneficial to the landlords who own the land, rather than the migrants living in them.

Reform of building codes and standards emphasises the legal aspect of slums. It is believed that a loosening of the regulations would allow for cheaper construction and maintenance of buildings, and a more flexible use of them. This approach deals with one of the core reasons why slums emerge, namely that they try to evade expensive building permits and taxes.

Whether a particular approach is chosen is very dependent on the perspective on informal development. Each approach operates under a particular combination of perspectives of informal development. The scheme to the right illustrates the dominant perspectives in the five approaches that are discussed in this review. The approaches can be roughly divided into two actions; physical interventions, social, educational and financial aid programs. In addition, these actions can be either state-led or self-organized. Some approaches have been more successful than others, but there is no single answer to the issues that informal development poses to their cities. The absence of a single answer, even despite decades of research, has everything to do my first conclusion, namely that informal development goes through different stages, each with their own characteristics and challenges. My own approach embraces the difference of the development stages and seeks village specific development potential, rather than a single unifying answer.

The title of this research is cultivation of the urban villages. Cultivation literally means ‘the promotion or nurturing of growth’. The main point that this research tries to bring across is that the current approach to informal development in Shenzhen is too homogenous and does not take the specific role and characteristics of the villages and their development stages into account. Villages are either given the same treatment, or formal development takes place far away from these centres of population. In the conclusion of this research I argue for a village specific approach, in which the spatial integration of the informally developed village with the formal city leads to better conditions for the socio-economic upgrading of the migrant population. A major part of this research has been devoted to revealing this informally developed system of village-interior spaces and their regional connections between them. In my proposal this system is taken as the basis for steering the development in the Guangming district. This system already works, so my proposal limits itself to the systematization and slight adaptation of the system, rather than the super imposition of new structures. Each of the villages will need a specific approach that deals with the problems and development potential, created by natural conditions and the regional interventions I propose. In order to shed some light on how these approaches might take form, I would like to redeploy the same two axis of categorizing approaches to informal development. The first axis divides the interventions between those that deal with the physical structure on the one hand and with social programs on other hand, while the second axis divides the interventions between self-organized and state-led approaches.

The promotion and nurturing of growth in the villages would involve spatial interventions and social programs, both self-organized and state-led. In this research I have focused on the spatial integration of the self-organized village and the state-led interventions, and left the social programs outside the scope of this research. The two axis of actions towards informal development can be related to the challenges per stage of development as formulated in the atlas of villages. Peripheral villages require physical interventions like basic sewage and electricity, which could be implemented through state-led policy. The villages also need to expand to allow for industrial production and commercial activity. This growth could be more self-organized and follow a similar development as other villages in the region. Production villages have already expanded physically, so they would benefit more with social, educational and financial programs. Courses on topics like business management or administration skills could help people in their socio-economic upgrading process. Financial tools for opening up or expanding a business could fill the villages with activity. These initial programs could be more self-organized by the village committee. In the market villages these kind of programs could be more institutionalized. With basic education and a flourishing informal economy, the state should provide people the tools here for them to truly leave the lower classes. In the agglomerated villages, where some of the informally created system has already degraded, physical interventions are required again. The state, as the main actor of the degradation of this system, should take the initiative to restore the essential components of the physical network. This illustrative description is far from complete, but is starts to formulate a tool that can be used in the development of the villages. This research has not developed this tool completely, but rather prepared an academic base for a more comprehensive approach to informal development.



#13

REFLECTION ON PROJECT



At the basis of this research lies the idea that informal development plays an important role in vastly growing cities in the global south. My research in the Guangming district has shown with great precision how the informal development process works on that specific site and how it related with new formal urban development. In this reflection I will give some thought as to how this research has influenced my understanding on informal development in China specifically and Chinese cities in general. Please note that these are personal reflections loosely based upon my research and do not represent a final answer.

As a student with a western European background, it has been an interesting experience spending a whole year learning and studying a problem with an distinctive Chinese context. Especially the first three months of the graduation project I experienced a struggle to comprehend the city of Shenzhen. Despite the enormous struggle to understand this subcontinent, I have gotten incredible respect for the way China has run its society in recent years. My first experience with China was in the summer of 2012 when I travelled to Beijing, Shanghai and the PRD region. It is difficult to comprehend China, without the actual experience of walking through its streets, eating their food and meeting its people. What struck me most in that visit was the sheer scale in which everything happens. Both here problems, challenges and beauty all come in mass scale. This notion of size has a lot of historical connotation in Chinese history, but I want to focus on the present. In the last 30 years China has elevated more people out of poverty than any nation in the entire human history. It is not easy to underestimate this remarkable achievement. It greatly frustrates me that media coverage of China in the western world focusses the problems and negative externalities of their policies, without putting these issues in the right context. Issues like human rights, poverty and pollution deserve attention, but I feel that it's important to put these issues into the right context. China is a developing nation and development is in any case a process. Western Europe took several hundreds of years to develop from a mercantile society to the post-industrial society we have now, so we can simply not expect China to do so overnight. Rather than the slightly offensive and cynical attitude I sometimes encounter when speaking or reading about China that is fuelled more by fear that anything else, another more supportive and understanding attitude will be much more beneficial to China and the Western world also.

One of the most valuable lessons that I have learned in the project deals with the relation between problem, problem scope and cultural background. As I mentioned above, my own cultural background is different from the Chinese and thus makes it different to be precise on the problem you are trying to solve. Often, the question rises, whether the issue that you are investigating is really a problem, or if it is simply the crystallization of a different cultural understanding. As a Westerner it is easy to assume that the difference must lie in the difference in culture between the east and the west. In my project I discovered that this distinction between eastern and western cultures was not particularly useful, and might even add to the confusion. The customs and ideas that I have are not only a derivative of a generic western culture, but are composed out of many different cultural layers. One of these cultural layers is that I live in a city, in an urban environment. Although I, and many western and non-western people among me, have taken this fact for granted, it is not so apparent in many parts of the world, including China. In comparison to a rural way of life, living and working in an urban environment adds a whole range of new social, economic, cultural and political layers to my norms and values. In a small rural community all people in the community know each other by name, while in a city you might know more people, but not nearly everyone. Similar differences occur when speaking about density, speed of live, commuter patterns, leisure patters, crime and safety, etc. The difference between farmer and urbanite is one of the most important cultural differences for people around the world. I would even argue that this difference is more important than differences between eastern and western culture. I suspect that my norms and values are more similar to an urban citizen in China, than they are to rural citizen in Western Europe. Whether this is true or not, does not change the fact that the issues in Chinese cities are not like those of the established cities of Western Europe. The Chinese cities are for large parts *new* cities, with *new* urbanites. So when I am investigating these issues and questioning myself whether the issues are really a problem, the cultural difference that I must take into account mostly is not that between eastern and western culture, but between urban and rural culture. The migrants arriving in the city are adjusting to their new city life. This process of urbanization has already taken place in Europe a hundred years ago, so our cities do not offer much reference, but the cities of the global south are currently all going through rapid urbanization. Coming back to the relation between problem, problem scope and cultural background, I would like to conclude that the problems in Chinese cities are best understood using a problem scope that focusses on the transition from rural to urban.

Even with a good problem scope it is difficult to pinpoint exactly what the problems in Chinese cities are. On the surface so much seems wrong, traffic congestion, pollution, poverty, empty public space, trash on the street, bad building quality, etc. that one can easily been overwhelmed. Also I experienced the consequences of this overwhelming complexity in the initial attempt to shape my project. In the analysis I decided not to focus on the problems, but on the parts that

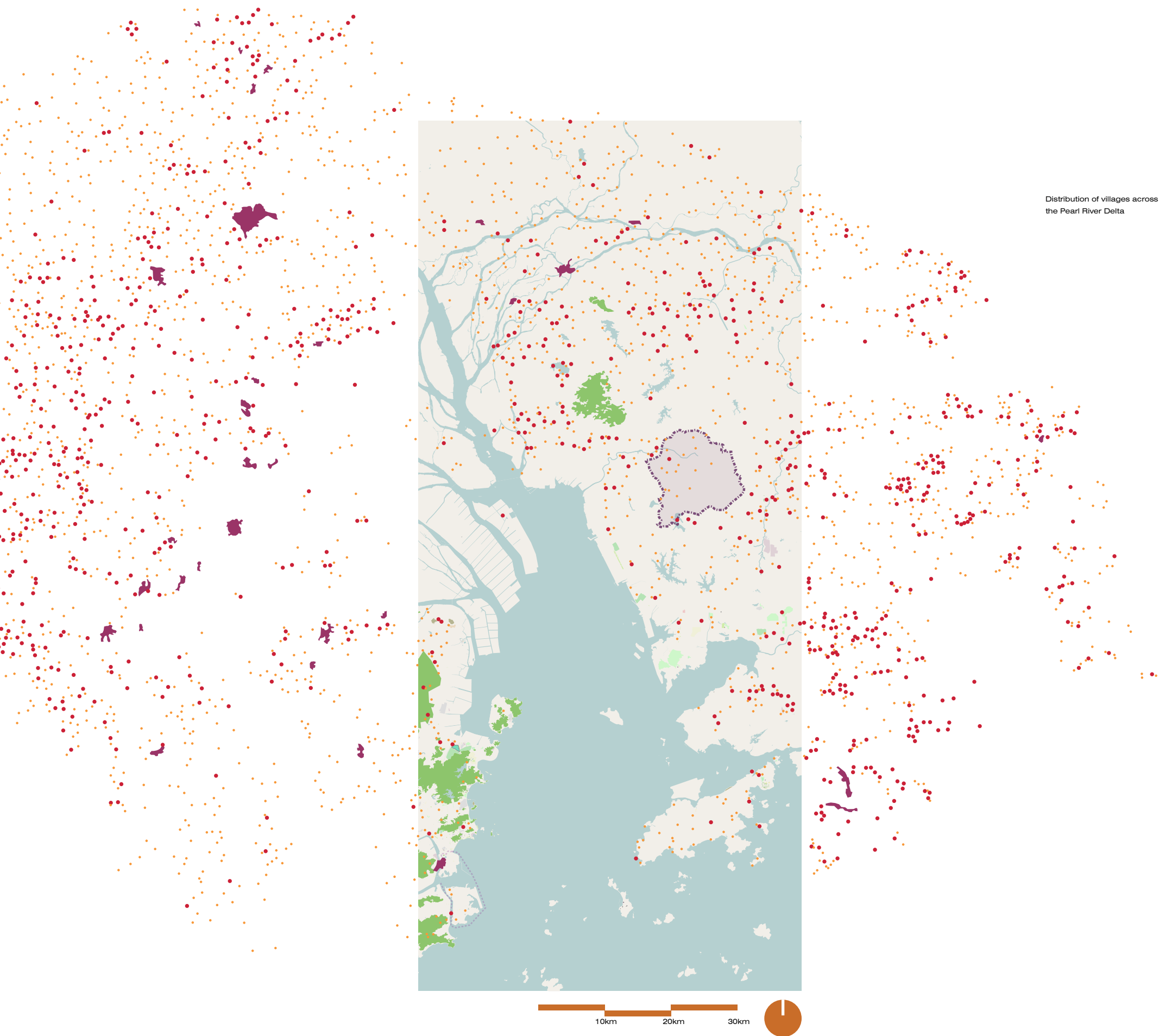
did work and that I could study and understand. As the research of the working parts progressed, more and more of the chaotic issues seems to dissolve as parts of the functional system of the city. A quote by Alfredo Brillembourg illustrates this uncovering nicely “What seemed chaotic is a different kind of rationality that can be uncovered”. Without understanding the complexity and the existing functioning of the system, any proposal is doomed to fail. In the end my project is more about understanding the existing system and its qualities, than it is about proposing innovative new strategies. Most of the interventions that I propose are either maintaining existing systems, expanding these systems or complementing these systems.

This recognition of the complexity of the city ties in will with emphasis of my graduation studio, Complex Cities. The full name of the studio is Complex Cities and Regions in Transformation under Globalisation and deals with “spatial processes related to globalization and the increasing complexity of the built environment and to formulate plans, strategies and designs that will have a positive impact on these processes, aiming at sustainable and socially sensitive development.” What becomes clear from this statement is that the studio deals with processes, rather than projects, with comprehending complexity, rather than ruthless simplification, with achieving socially inclusive development, rather than financial gain. My own project, dealing with the social inclusion of migrants in Shenzhen, takes all remarks above into account. My project deals with the process of urbanization and development, rather than looking at a single moment in time. It deals with the interaction in the Guangming region, rather than isolated villages. And the project tries to reveal the layered complexity of the urban village, rather than proposing a single ubiquitous design strategy.

One of the issues that kept coming back in my project, as well as the projects of my fellow students is the issue of development, the regions that this development takes place in and the uncertainty of the development. Many questions arise when talking about this issue. Is development necessarily always good? What roles have different units of scale in the development? What is the relation between fast, unpredictable development and the quality of life in the city? Especially in the region of the Pearl River Delta, economic growth is of enormous importance to the politicians and planners. In their efforts to pursue economic growth, humane and socially involved behavior is not always their first priority. The studio recognized this and tried to reach out to us to discuss these topics. In the end, no final answer was formulated, but being aware of the consequences of your actions as a designer on the development of a city is at least a good first step toward a more inclusive mode of development. In the context of China, an essential step in the inclusion of the floating population is the change of the hukou system. There is enormous economic and ideological pressure on the hukou system, since it is in principal a system of apartheid. The hukou system does not allow m the floating population to have access to welfare in the city or buy property, and thus prevents a more fluid transition for rural people to urbanites. The transition becomes even further gehindered because of the closed system of village governance. Even though villages are often inhabited by more than 95% migrants, they have no vote in the decisions of the landlords. In general, legalization of the floating population and an opening up of the village governance system would be a good development, but it requires a gradual change and very careful implementation. Sudden and complete legalization of the informal villages and their inhabitants could lead to counterproductive outcomes, in which the existing middle and higher classes profit disproportionately more than the lower class. These counterproductive outcomes could happen through the process of gentrification.

The last point I want to mention in this brief reflection is stays closer to my research and deals with the perspective on urban villages, or slums in general. It is not without reason that the theoretical framework of this thesis starts with discussing several perspectives on informality. Informal development is a topic that is not yet well understood. That questions that I posed about development become even more difficult to answer when talking about informal development. Whether we would like to demolish, preserve, upgrade or leave the informal settlements of this planet, many people share a fascination with them (either positive or negative). These urban environments are able to create all kinds of outputs, both negative and positive. Sometimes ridden with crime, sometimes offering huge job potential, sometimes dirty and dangerous, sometimes creative, sometimes beautiful. In the academic and journalistic world this fascination more than often takes a romanticized form. Slums represent some sort of urban magic that should be contained in a glass bell, without ever changing. In an interview that I did with the director of Urb (research department of Urbanus) for Atlantis magazine we talked about the urban villages of Shenzhen and recommendations for future research. He emphasized the danger of fetishizing the urban villages of Shenzhen. A single minded fascination with the preservation of urban villages is just as unless as the portrayal of the urban village as a crime-ridden scar in the city. The urban villages of Shenzhen, or any other slum for that matter, are dynamic environments that have a lot of knowledge on society to offer. Our lack of understanding should not lead to demolition on the one hand or preservation on the other, but to further research, of which this thesis is a small part.





Distribution of villages across the Pearl River Delta

#15

REPORTS ON SITE VISITS



Sitevisit one 30-12-2012

After a brief meeting with the Chinese students that offered to help us in our fieldwork we took off in the direction of Guangming. We travelled to the final station of the red line and switched there to a local bus that took us towards the Guangming high speed train station. The station was located in a green hilly landscape that lacked any signs of human activity. As we moved in north-western direction the new highrise towers under construction began to appear. For a distance of more than two kilometres we moved through a landscape of oversized streets, solar cell equipped bus stops and scaffolded highrise apartments. The structure seemed to be superimposed on the natural landscape and gave a clear preference to motorized traffic over pedestrian traffic.

At some point we spotted a farmer working the land, camouflaged by the freshly planted trees aligning the new infrastructure. The farmer was not alone on the enormous agricultural field in between the tabula rasa grid of Guangming newtown. In a number of short conversations with the farmers we establishes a clear profile of them. The farmers came from Guangdong province and had arrived in Shenzhen over the last three years. Their motive for leaving the home village was the lack of demand for local produce. Guangming offers a huge market for the farmers, in which they can sell all their food stuff locally. None of the farmers had an urban hukou. What they did have was a kind of residence permit that allowed them to rent the land legally from the local villagers. According to the farmers a lack of the permit endangered them to a confrontation with the police. The farmers lived in the urban villages that surrounded the fields.

From the agricultural field we could already see the neighbouring urban village. Although it was clear that the farmers were making long back breaking hours, the landscape seems very idyllic: bright green fields in front, pastel yellow-orange buildings in the middle and the silhouette of rolling hills in the back. The urban village had an average building height of seven stories on a strict 10 by 10 meter grid. The village was relatively clean, completely paved, and all houses had access to water and electricity. In local shop where we bought some refreshments we spoke to the women managing the shop. She and her family had lived in Guangming for more than ten years. They rented the shop at the groundfloor and lived in a single room in another building. Their children went to a school nearby. This was confirmed by some other children we spoke that told us the local school was quiet busy.

We continued our way through the village. Approximately one out of ten buildings had a shop at the ground floor. Most buildings had a façade of small tiles, which gave the interior of the village the appeal of a giant bathroom. When exiting the village we spotted a local kindergarten, a community centre for the elderly and a community health centre. Here we spoke to a women who was a teacher at the local school. She told us that the area around the village changed a lot over the last two years. New roads were implemented, buildings were constructed and a small park was opened.

From the edge of the urban village we walked towards the next urban village that was only a stone's throw away. The street was busy and gave entrance to a local food market. On the edge of the other village we enjoyed a small snack before we took the bus back to Guangming centre. From here we took a bus to the Guangming train station, only to discover there were no more tickets available for the high speed train. After two more bus rides we managed to get back to downtown Shenzhen.

14.3 Sitevisit two 01-01-2012

The departure of our visit was the Zuzilin metrostation, where we took a regional bus towards Gongming that took little over an hour to reach its destination. We left the bus at the park that was full of people because new year's day is a public holiday in China. The plaza in front of the park was a happy chaos of informal activity, local people selling food and toys. A short walk up the hill brought us to a recently constructed pagoda, that seemed to be the main attraction point for most of the visitors. The view on Gongming from the hill was pretty, but not very clarifying: older housing areas were interrupted by new high-rise developments, some of them under construction. After we went down again, we had lunch at the plaza in front of the park. We spoke shortly with the women selling street food. She had been in Shenzhen for 8 years, of which 5 years selling street food. She said that she lived in the urban village nearby and that business was good. Afterwards we continued our visit towards the urban village. We passed the civic square where

we were surprised by the number of activities that were taking place on the square. Following the main road, that revealed itself as an big barrier, we arrived at the newer parts of the urban village. In front of the village the demolition of an factory was taking place. We zigzagged our way through the urban village, that presented an enormous variety of shops. Almost all the ground floors of the buildings were occupied by shops. Some buildings were owned by one family, signified by a small gated front yard. Some buildings had garages, which mend there was very little activity at the ground floor. The village had also had a primary school.

Hidden behind the newer urban village was the old core of the village. The old core shared many features of a slum. The houses were normally single storied, with very few exceptions. The houses were structured along alleyways in a north-south direction. All houses had access to clean water and electricity. The buildings were generally not well maintained, some even with holes in the walls and roof. A by passer told us that the roofs often break down under heavy winds.

In the old core of the village we spoke to several migrants that were living there. A man said that there were lots of migrants living there from outside Guangdong province. Another women confirmed this saying that there were at least 100 people here from Quanxi province and just as many from Sichuan province. The man had been in Shenzhen for seven years, and had almost never been in the downtown area of Shenzhen. He had two children that he drove to school on his motorcycle every day. He was not unhappy about his live saying that he had little requirements. The women had been living the village for five years, but only recently moved to the old core. She said that because rental costs were lower here, she could live with her whole family in one house. She continued to say that there are mostly old people living in the old core, and that young people move out to the newer parts of the village where conditions are better. The old core was dirty and had piles of trash lying around. She repeated that she never went to the Shenzhen centre and that she could do everything locally. When I asked them about the possibility that their rooms would be demolished if the villagers sold the land to developers they gave us a strange look, responding that they never thought about that before.

As we continued our visit through the village we discovered an old ancestral temple. In later accounts we found that the building was 530 years old and was maintained by the village committee. Inside were lots of elderly people playing games, watching Chinese opera on television, or just drinking tea. When asking about the history of the building and the village we found ourselves lost in a lengthy recalling of 40 years of Chinese history.

After we discussed the past, we talked about the future of the village. The elderly said that the future depends on the leader of China and the leader of the Guangming district. If there is little corruption, they Chinese citizens will all get rich. The elderly emphasized the importance of luck in development of land to residences or factories and said "it was just like a game of mahong." All most all the factories around the village belonged to either one of the two companies running the village. Because they own the land they are not afraid for the rapid urbanization and possible development of the land. Because their position as landowners is strong they can negotiate with the government for a good price for their land and become millionaires. In a response to the question whether they would not miss their home village after moving out, they simply stated: "money talks". When we asked what they think would happen to the migrants renting a room, the elderly said that they can live in another urban village or move away to another factory. Although their initial reaction seemed a bit careless, the villagers seemed to have a very good relation with the migrants. A villager said that "you should treat anyone as equals, no matter if they live on the groundfloor or on the topfloor." The migrants decide to become inhabitants of Shenzhen and if they are willing to join their community they are very welcome. We ended our conversation with a speculative statement around the possibility of tourism in the village. The elderly was very positive of the idea, but did not really seemed to believe in the possibility: "if the government permits a tourist attraction, we like it."

One man joined us as we left the ancestral hall and offered us to show us an house in the old core. In the end we visited two very similar homes, one a 100 years old, another a recent replica of an old home. The man explained that the area was hit by a one meter high flood in 2008, which forced them to rebuild some houses. The houses were tiny, dark and messy. The house was divided in three parts. An entrance area with toilet and kitchen under a flat roof. An living area under the first half of a sloped roof and a sleeping area under the second half of the sloped roof.

14.4 Sitevisit three 01-01-2012

The point of departure for the third site visit was again the Zuzilin metrostation, where we took the regional bus K578 towards Lou village. We exited the bus at a busy main road with lots of restaurants. Still in the confusion of where to go, we decided to speak with one of the restaurant owners. He told us that he paid 1000 yuan a month for the indoor part of his restaurant (apx. 50 m²) and an additional 600 yuan for the outside space on the sidewalk. After discovering the correct direction we walked towards the old part of the village. We crossed a very polluted river with small patches of agriculture between the river and the main road. The edge of the village made room for a municipal sponsored park, playground and basketball court.

The old village had only low-rise buildings, almost all of them in very poor condition, some abandoned, other for storage. In front of an old temple that had been looted during the cultural revolution we spoke to two young migrants that had been living there for almost 2 decades. He said the village was very safe and that they paid a fee to the village committee to maintain a local police force. They did report that the house of a friend was broken into recently. They continued to say that most of the villagers were very rich because of a lucrative deal in land. The lychee orchards that previously surrounded the village were sold to the government, resulting in a payment of 1.000.000 to 10.000.000 yuan per family. Most of the villagers moved out, some even to Hong Kong. At the same spot we spoke to an older man who had been living in the village for more than three decades. He said he built his own two story house after he got a better job. Most of the houses in the old part are for rent between 100 and 200 yuan.

A but further in the village under a row of arcades we spoke to two migrant women, one doing the laundry, the other holding a small child. When asking them about the safety of the village a waterfall of stories poured down on us. The stories went from a neighbour that got everything stolen from to burglaries on the street. They said that the targetgroup were mostly women, burgled by young migrant boys, sometimes on motorcycles. The recitation ended with an story about a man in a car who talked a women to the car with an question about the nearby post office. Simply trying to offer help, the women apparently was brought into a trance so she would answer questions about the amount of money she had. After the told the robbers she had a 1000 yuan in her house, she went back to her house and gave the man in the car all her money. Unsure about the real safety treat in the village, stories about them were clearly very popular.

After the old village we crossed the busy main road and entered a covered market where we got lunch. The owner of the shop, who has been in Shenzhen for more than a decade, told us he paid 800 yuan per month for his place on the market. Although he believed the rent was too high, he made about 3000 yuan per month. Of that amount he had to deduct 450 yuan for his room in the urban village. The remainder of the money he send back to his family in Sichuan province. The main told us that he preferred his current job instead of his old job working in the factory. The new part besides the market was a very typical urban village, with buildings in a strict 10 by 10 grid, all about 8 or 9 stories high. The main streets were wide and had a continues façade of shops.

After making our way through a small village owned factory area we took an illegal taxi to Honghu village. The taxidriver bought his 80.000 yuan car with the owning's of his shop. The village is on the very edge of the Shenzhen municipal boundary. The village was established in 1978 by overseas Chinese returning home from Vietnam after Deng Xiaopeng came to power. In 2005 they started with the replacement of the old houses with new typical urban village buildings. Although the government prevented the construction and expansion in 2006, most of the village consisted of 5 to 7 story buildings. The village was surrounded by agricultural fields and fishponds. The village was a strange mix between rural landscape and rural activities, and urban buildings and government funded facilities such as a basketball court and urban park. The government truly meant it when they said Shenzhen is a 100% urbanized.

After a leisurely walk in the sunshine we took a small bus back to Guangming centre. The Guangming centre has the proportions of a small English town and does not seem to fit the typical growth pattern of villages in the region. The urban village part of the town has many single-family houses which indicates a wealthy population. In the 10 by 10 fabric certain spots had been used for parks, parking, playground and other public facilities. From Guangming centre we took the regional bus back to Shenzhen.

END OF CHAPTER

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