

THE METROPOLIZATION PROCESS OF GREATER KUALA LUMPUR: A HISTORICAL PERSPECTIVE

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ABSTRACT

Originating from a predominantly ethnic Chinese mining town in the mid-19th century, Kuala Lumpur has developed into the national capital since the country's independence in 1957 with metropolizing effect taking place rapidly along the Klang Valley from the 1970s with wealth generated from industrialization, oil boom and higher value-added services. With substantial public resource allocations dedicated towards modernizing the capital city in infrastructure and expansion of the public service, the metropolization of Kuala Lumpur mega-urban region has witnessed vast conversion of rubber estates and ex-mining lands into built-up environment coupled with merger of edge towns along the Klang Valley. This paper examines the ways in which the Klang Valley, that includes Kuala Lumpur, has developed into a thriving conurbation of eight million people with strong internationalization of its financial and industrial services. However, problems have to be dealt with in light of the weaknesses of public sponsored business that has failed to compete internationally and car dependency. problems that form a barrier in earning the metropolitan region a worthy world city status.

Keywords: Kuala Lumpur, tin mining, rubber, urbanization, highway, public transport

[T]he primate cities in Asia are the most important centers of cultural change, especially in those fields which vitally affect economic development: advanced education, new forms of business organizations, new administrative practices... their contact with world markets of commodities and ideas, their lack of many traditional bonds make them into eminently suitable vehicles for the introduction of new ideas and new techniques (Hoselitz, 1957: 43).

INTRODUCTION

Origins of cities are multiple, be it a market place, military garrison, administrative centre or simply crossroads sites of key transportation routes. Indeed, many large cities or mega-urban regions in the world have grown over a considerable period of time from small settlements into their present sizes. How they have evolved is, nevertheless, a historical process of urbanization strongly associated with their politico-economic, social, and migratory movements that have followed thereafter.

Key agents of urban change—in particular, its growth, spatial and mobility patterns—are often those linked to agglomeration effects, sprawling residential system and transport distribution system. This paper examines the case of Kuala Lumpur which started as a mining settlement at the confluence of Sungai Klang and Sungai Gombak, the two major rivers near which rich tin ore deposits were found in abundance around the mid-19th century. Ever since,

as Kuala Lumpur became the Selangor state and later Federal government’s administration centre since independence in 1957, the city has grown in size, and its economic role has risen rapidly when industrialization picked up from the mid-1970s (McGee, 1967; Wong, 1991; Gullick, 1990).

As a rising metropolitan region, Kuala Lumpur’s functionality and linkages should not be studied in isolation, given that its external economies are not restricted to a single urban core. External economies of a large city are shared and linked to nearby cities along the Klang Valley effectively as an agglomerated city network. From the mid-19th century, Kuala Lumpur has developed into the commanding core of the mega-urban region of about eight million people, known as Greater Kuala Lumpur which stretches over 40 kilometres along the Klang River from the east at Gombak to the west at Port Klang (see Figure 1 below).

Figure 1: Klang Valley, Selangor state



Source: Hamid et al., 2017.

In 2012, Greater Kuala Lumpur contributed about 263 billion Ringgit (US\$84.8 billion) or over 37% of gross domestic product (GDP) of Malaysia, the most prosperous core and administrative axis of the country. By 2020, Greater Kuala Lumpur was expected to share 40% of the national GDP (Oxford Business Group, 2022).

From a historical perspective, this paper begins with a brief account of how Britain expanded its colonial interests by introducing cash cropping and privatization of land which released the traditional land control, albeit a rather loose one, from the local sultanate regime. This facilitated and secured henceforth investment of Western capitalist ventures. Two contrasting aspects of Greater Kuala Lumpur’s growth are investigated in the process.

First, we examine the impact of agglomeration effects generated by Malaysia’s close integration with the global capitalist economy together with the rise of primacy of the Kuala Lumpur metropolitan region characterized by influx of Western investment and the local oil boom. Second, attention is turned to the adverse effects of agglomeration which are the

diseconomies caused by an ineffective public transport system associated with a high car dependency in commuting in which the issue of sustainability is questioned.

HISTORICAL GROWTH OF THE KUALA LUMPUR METROPOLITAN REGION

As suggested earlier, from the mid-19th century, tin mining and other resource exploitation potential had motivated British colonizers to move from the ports of Penang and Singapore to the hinterland of Malay Peninsula following a new stage of industrialization in Britain in need of more raw materials. This started with the British intervention of the armed conflicts between two local Chinese factions in Perak that was concluded with the Treaty of Pangkor in 1874 whereby the Perak sultan accepted a British Resident as a “political adviser”, setting the first “indirect rule” with the Malay sultanate in Malaya (Gullick, 1990; Zhang, 2007).

In the early 1880s in Selangor state where lies Kuala Lumpur, Port Klang was founded for its proximity to the tin-rich Kuala Lumpur area, 30 km to its east. Similarly, the Selangor sultanate was coerced to accept the British residency system underlain by British trade interest to develop the economy of the state. It was under Bloomfield Douglas, the Selangor Resident (1876-1882), who paved a “political coalition” pathway to shift the administrative centre from Klang to Kuala Lumpur. In July 1878, Douglas also established a Mining Board to regulate the grant of mining leases (Gullick, 1990; Jackson, 1963).

What came along with the British colonization was the privatization of land for capitalistic development which was seen as the most important agent of change. Land privatization had provided assurance to investors to take up longer term investments, be it in mining or plantation crops, and its potential to raise tax revenues was substantial, part of which was paid to the sultanate as a trade-off for their consent!

Land Privatization and Ownership Formalization

In traditional Malay feudal structure, state land under the control of the sultanate was nominally owned by the sultan who granted parts of it to his close relatives and aids. All his subjects were entitled to use such land for cropping or buildings with verbal or written permissions from the nominated land possessors or their representatives. A nominal fee was chargeable for built structures, and in the case of farmland, a tax normally in kind was imposed on farmers based on their harvest, loosely set at 10% (see Aiken & Leigh, 2011).

The first British measure to systematize land ownership was undertaken in Singapore, adopted in August 1875 which granted all Malay claimable lands a lease of 999 years (Barlow, 1995; Zhang, 2007). When Frank Swettenham replaced Bloomfield Douglas as Resident of Selangor in 1882, he quickly pushed through a land code in the Selangor Council chaired by him, known as “General Land Regulations”, as he stated in the 1883 Selangor Annual Report:

[Land] regulations enacting that all lands must be held by registered title derived from the Government were introduced. I will not say without trouble, but without anything like serious opposition, and with a minimum of inconvenience to occupiers of land. (Zhang, 2007: 64)

Official issuance of land titles had earned for the state a 12-fold increase in land taxation in 1883 as it provided great incentives to land claimants to come up and have their plots registered in exchange for a safeguarded ownership. This registration effort started with Swettenham with the Torrens System taken from Australia which provided land deeds consolidated with surveyed measurements on paper, thus avoiding potential overlapping land claims and ownership conflicts.

Swettenham's successor William Maxwell who, with wide experience across many British colonies, further developed the Torrens System. Maxwell in 1891 adopted the *Mukim* mechanism (Districts) by dividing Kuala Lumpur into four *mukims*, each of which was further subdivided into 71 land plots, thus simplifying the land tax computation method (Zhang, 2007: 66-67). The *Mukim* system has remained valid till today, and it has effectively transferred the nominal land ownership of the sultanate into a privatized commodity, making subsequent land transactions and alienations practical and easy. By the 1890s, another industrial crop, rubber, had emerged, apart from tin, as a key, privatized but predominantly corporatized land-user all around Kuala Lumpur and elsewhere in the Malay Peninsula as the car industry began to bring in great profits across the United States and Europe.

Rubber Estates and Urban Transformation

During the late 1880s, prior to rubber planting, lands much to the north of the Sungai Klang and Sungai Gombak confluence in the north of present-day Kuala Lumpur were zoned and planted sporadically with commercial crops such as gambusia, coffee, and tapioca. By the end of the 19th century, all such crops were gradually replaced by the lucrative rubber which witnessed a massive destruction of fertile tropical forest in favour of rubber cropping in and around Kuala Lumpur. Subsequently, the increase in world demand of rubber and its surging prices attracted strong interests of European firms to Malaya whose company numbers rose from 76 in 1910 to an estimated 2500 in 1940. By 1940, rubber plantations of at least 100 acres stood at 2,113,000 acres while smaller holdings totalled 1,351,000 acres (Kinney, 1975: 61-63; Zhang, 2007: 68).

For European rubber plantations¹, their extensive growth was characterized by formal applications to various state land office. Land grants were generously issued on freehold status, which was highly profitable when land was converted in later stages from agriculture to housing or industries when urbanization expanded from Kuala Lumpur. Smaller plots of land were however opened up by local villagers, both Malay and Chinese communities. Medium-sized holdings were largely owned by non-Malays and would have been situated around the towns. In many cases, forest lands were first cleared by cultivators who subsequently made claims and earned title deeds (Kinney, 1975). Much of small Malay holdings were sold to Chinese and Indians until in 1913 the Malay Reservation Act² was enacted to protect Malay ownership.

Throughout the first three-quarters of the 21st century, rubber became the most important cash crop of Malaysia following the upsurge of automobile industry and demand of rubber-related products, making the country the largest world producer for almost a century until the early 1980s. Much of the urban service sector was also in many ways linked to rubber and tin industries in the country until the industrial take-off in the mid-1970s which saw the expansion of the industrial and higher-level tertiary sectors.

From the mid-1970s, as a result of the industrial global shift in the aftermath of the oil crisis 1973-74 (Dicken, 2007), Malaysia was one of the key choice destinations to benefit from the shift with its comparative advantages. Together with the discovery of oil and gas reserves in the offshore Trengganu state and Sarawak, Malaysia's enriched treasury and the rise of middle classes bolstered the expansion of the Kuala Lumpur urban region enormously in housing and industrial developments. The most rapidly growing urban centres in the Klang Valley were the industrial residential centres of Petaling Jaya (during the 1950s-1960s) and Shah Alam (from the 1970s) (Aiken & Leigh, 1975; Wong, 2018).

This economic injection had set the precondition for the metropolizing to take off in the Greater Kuala Lumpur region in which Kuala Lumpur is the agglomeration core (see Figure 1). Most significant of all, it was the relatively easy land use conversion from rubber plantations and ex-tin mines in and around Kuala Lumpur towards housing and industrial developments when rapid urbanization started to pick up pace. This was expedited by the agglomeration effects, leading to the formation of the Kuala Lumpur urban region.

AGGLOMERATION EFFECTS & METROPOLIZATION OF GREATER KUALA LUMPUR

Apart from agglomeration effects, there was another political factor which was key to assisting growth of Greater Kuala Lumpur. This was the launch of the New Economic Policy by the race-led ruling party (United Malay National Organization) from 1971 with the objective to promote Malay urbanization to balance the predominance of the ethnic Chinese in major Malaysian cities. For Kuala Lumpur, the national capital, such promotion was supported by substantial revenues derived from Malaysia's oil and industrial boom from the mid-1970s (Bunnell & Nah, 2004; Bunnell, 2002).

Rise in public revenues and the Malay-led urbanization policy had bolstered tremendous change in Kuala Lumpur as the national administrative centre. First, it was the expansion of the public sector, manufacturing sector and enlarged tertiary education intake through which large numbers of Malays were employed or recruited. These measures saw the gradual but effectively massive shift of rural Malays to the cities. Secondly, economic prosperity in the cities had also acted as a "pull factor" to hollow out to a great extent Chinese New Villages and Indian rubber estate workforce expedited by the replacement of rubber and oil palm plantations which was much less labour-intensive³.

The economic take-off from the mid-1970s had indeed seen the rise in land demand for industrial and housing expansion as well as physical infrastructure. This was accompanied by amalgamation of smaller edge towns or settlements with larger cities along the Klang Valley, as well as rapid conversion of estates or ex-tin mining lands into urbanized zones. The common phenomenon of low labour productivity characterized by over-supply of unskilled labour of the 1960s in Kuala Lumpur (Sendut, 1966) disappeared and replaced by largely better skilled professionals and semi-skilled workforce. The latter initiated the emergence of middle classes whose stronger purchasing power was typically reflected in their demand for better quality housing (Goldblum, 2017).

Throughout Malaysia, identical feature had taken place in 1980-2010, and the number of towns increased from 72 to 228. The trend in recent years has been increasingly from small and medium-sized towns to large metropolitan agglomerations where agglomeration effects

reinforce the interactive and collaborative outcomes between firms while undergoing competition (Mazlan, 2014; Toh, 2012). What then are the agglomeration effects which have led to the formation of Greater Kuala Lumpur?

Agglomeration Effects

Agglomeration effects or economies of agglomeration are known to have occurred when large proportions of the population are clustered in close proximity to one another where cost savings and shared specialized services can take place. Also, agglomeration facilitates circulation of capital, commodities and labour. Such phenomenon of cost savings is similar to economies of scale whereby the extent of savings and benefits corresponds with the city size until diseconomies of scale such as serious traffic congestion which may occur (see Johnston et al., 2000).

Not all cities in the developing world, however, have benefited from positive agglomeration in their global market-led urbanization processes. In Southeast Asia, for instance, only some cities, notably Singapore and Kuala Lumpur, have benefited for being more strongly integrated with the capitalist metropolises during the colonial period. They became already more Western-like cities after the post-World War II era. Many others, such as Jakarta, Manila or Hanoi, being more traditional, are much less integrated with the global economy characterized by strong market competition (Dick & Rimmer, 1998). Recent trend has even intensified due to globalizing and integrating forces over the last three decades, thus widening the gap between more developed and less developed cities in the region.

Agglomeration effects have operated in Greater Kuala Lumpur or Klang Valley, first of all, by the conversion of rubber or ex-tin mining lands for urban use. In the Federal Territory of Kuala Lumpur during the early 1980s, four major rubber estates (Bukit Jalil, Bukit Kiara, Batu and Segambut) were acquired under the Land Acquisition Act 1960 in the pretext of national interest by the Kuala Lumpur City Hall (DBKL) for urban expansion (Nagarajan & Willford, 2014: 191-193; Bunnell & Nah, 2004).

Other land acquisitions went through a other ways. One was through acquisition from “squatters” and customary land possessions of *Orang Asli*⁴ who held no formal land titles and their rights had eroded with modern interpretations (Bunnell & Nah, 2004). Jungle areas in the city fringes considered to be no man’s land, tin mining concessions whose lease had expired or continued exploitation had proved to be unprofitable were a real politicized game of business interest allocations. In practice since the 1970s, Malay businesses with strong political links would normally get formal titles released from the land office, and project development works would start with their Chinese business collaborators (Gomez, 2002; 2013).

Having land and capital resources to facilitate physical expansion, the agglomeration forces exerting from the Kuala Lumpur capital city has acted as a magnetic pole to amalgamate smaller adjoining settlements all along Klang Valley from the 1980s. These agglomeration externalities are shared by the geographically proximate smaller cities with the capital city to form an urban region in which they are subordinated to the capital core. Taking advantage of such externalities, smaller adjacent cities help their workforce gain higher incomes which would not have been possible if they stay small and self-contained. As smaller cities have started to grow on their own, we have witnessed a ‘fusion’ of previously relatively independent cities into a large metropolitan area, which could also be called a “regionalized urban entity”.

In such a metropolitan region, its spatial structure is characterized by a series of settlements which are physically separate or virtually inseparable but “functionally networked clustered around one or more larger cities” (see Meijers & Burger, 2010: 1383).

It is largely these agglomeration effects that have reaped the benefits of scale underlying the dynamics of interaction and generating “spatial-functional, political-institutional” and socio-economic integration forces across Klang Valley, known as the metropolization process. The process has transformed those originally fragmented territories into coherent metropolitan systems, and consequently into a city-region (see Ordonhas Viseu Cardoso & Meijers, 2020). One must also take note of the substantial contributions by highly skilled and qualified workforce from all over Malaysia who have clustered into Klang Valley to work.

In the case of the Kuala Lumpur metropolitan region with strong industrial and higher labour productivity outputs, they have formed new urban centres, establishing a polycentric relationship with the capital city such as Klang, Shah Alam, Petaling Jaya, Rawang and Kajang. In this fast-evolving process, the old post-war relationship between Kuala Lumpur as an urban core and a rural hinterland has virtually vanished.

In terms of global influence and effectiveness, the power of agglomeration effects of an urban region is not a matter of size but rather about functionality and its performance within the urban region itself together with its integration and connected network with the leading globalized economic powerhouse (Sassen, 2002). This explains why Manila, Jakarta and Bangkok are ranked lower than Singapore in the global city positioning, despite their larger sizes.

Having examined the agglomeration effects that have contributed to the rapid growth of Greater Kuala Lumpur, we now move on to investigate the adverse impact of the sprawling pattern of the urban region, the diseconomies characterized by a high automobile dependency.

Diseconomies: Urban Sprawl and Commuting Pattern

Rapid urban expansion and amalgamation of smaller settlements nearby to form greater agglomeration metropolitan regions have commonly contributed to transport-related environmental costs, time consuming commuting patterns, pollution, and higher crime rates. These externalities which are negative in city growth “may erode or even overrule agglomeration economies in the city” (Verhoef & Nijkamp, 2008:929). Sprawling growth coupled with low-density land use tends to increase the need to commute longer distance to centralized centres where jobs and services are provided. For example, from 2000 to 2005, the number of commuters entering Beijing’s city centre during rush hours increased by 46.2%. Transport-related air pollution made up 23% of the total greenhouse gases, higher than those from the industrial sector (Zhao, 2010).

Low density sprawl in an ever-expanding metropolitan region suggests an inevitable outcome, one characterized by excess commuting and automobile dependency if public transport is not effectively provided (Horner, 2002). Attention is now focused on factors that have led to the present stage of high car dependency in the Kuala Lumpur mega-urban region.

Origins of the poor public transport in Greater Kuala Lumpur

Since the 1960s, Klang Valley’s adoption of the linear development pattern along the traffic lines following Klang River, with low-rise residential and business districts in response to

urban expansion of Kuala Lumpur, has led to a sprawl. By the mid-1970s, Aiken and Leigh (1975) already observed and expected forthcoming traffic congestion in Klang Valley, especially in the older districts of the Kuala Lumpur capital city where narrow streets were left untouched as car ownership began to rise rapidly. Outside the capital city, expansion of residential-based Petaling Jaya, Sungai Way-Subang and as far as Port Klang had also been accompanied by a significant growth of daily commuters who were increasingly dependent on privately owned vehicles. Residential estates consist typically of single or double-storey terrace houses which are widespread and is symbolic of the middle-class living style in Klang Valley and beyond.

During the early 1980s, there were intensive public discussions on the need to improve public transport in Kuala Lumpur. However, under the Mahathir administration who led the Malaysian government for 23 years (1981-2004) with a strong control of federal budget under his prime minister's office, he adopted an option more towards the construction of highways and major roads, instead of public transport. By analysis, his rationale was backed up by three key factors which served more political-cum-election-based objectives (Gomez, 2013).

The first was the need to support the national car industry, Proton Saga, launched by Mahathir, himself, based on the argument of economies of scale that car sales had to be substantial enough to justify economic return and heavy investment. Second, in the largely widely scattered low-density housing estates, public transport provision was likely a public-financed subsidized programme, as private capital would have no interest to be engaged in non-profit making business. On the contrary, public infrastructure projects such as highway construction including traffic interchanges involved huge public expenses could be used by the ruling party to rally political-supporting companies through closed door negotiations without necessarily calling public tenders (Gomez & Tong, 2017; Wong, 2006a). Consequently, intensive networks of highways have been built in Klang Valley as a political *modus operandi* which continues after Mahathir's retirement from politics in 2004. By April 2017, there were 57 expressways and highways of different lengths in existence across the whole Klang Valley (Wikipedia, 2017).

Massive highway networks with under-provisioned public transit have deepened automobile dependence. Consequently, sharp rise in car ownership was dramatic. From 2000 to 2020, for example, while the Klang Valley population rose from 4.5 million to close to eight million, the number of households with cars increased from 0.84 million to 1.4 million respectively. The number of cars rose from 1.2 million in 2000 to 2.1 million in 2020, giving the car-people ratio of 1 to 3.57, which is extremely high by Southeast Asian standards. From the same token, the modal share of public transport during the period 1995-2005 decreased from 34.3% to 19.7%. High demand in road network had resulted in severe congestion and deterioration of travel comfort, especially during peak hours (Selangor State Government, 2005).

Rise in Primacy of the Kuala Lumpur Metropolitan Region

Despite traffic congestion problems, the high concentration of budget allocations, thanks to the petro-dollars, and private capital investments, both international and local, have bolstered the rise in urban primacy of Greater Kuala Lumpur. Indeed, as a more developed of the developing economies, Malaysia's post-war urbanization rate has been higher than the world's average

rate. From 1950 to 2018, for example, while the world's urban population rose from 30% to 55%, Malaysia experienced a spectacular rise from 20% to 76% during the same period (United Nations, 2019), where demographic growth of Kuala Lumpur city's surrounding areas and fringes was exceptionally high as a persistent peri-urbanization process.

Across Petaling Jaya to Shah Alam, vast industrial premises were constructed as a result of the global shift mentioned above, a linear conurbation morphology has taken shape from the 1980s through the physical expansion from Kuala Lumpur as the core. This process has brought about environmental problems such as floods and pollution to the eco-systems (Yap, 2019; Wong, 2006a).

Table 1 (see next page) clearly shows that the demographic expansion of the metropolitan area of Kuala Lumpur over the past half of a century. This trend of annual growth of between seven and eight percent was exceptionally significant during the period 1975-2000. This was attributable to the sharp rise in oil revenues, global shift of industries from the West, and the Malay urbanization campaign launched by the government, all three taking place from the early to mid-1970s. The climb continued till the 1997-1998 Asian Economic Crisis which hit hard the country's economy as a result of financial abuses and mismanagement (Gomez, 2002; 2013). Interestingly, the economic slowdown from the year 2000 began to see the decline in the Kuala Lumpur metropolitan region's growth rate which began to stabilize to a more acceptable pace (Rimmer & Dick, 2009).

Agglomeration effects and diverse sources of capital investments have contributed towards the rise in urban primacy index of the metropolitan region against the other smaller cities in Malaysia (Goldblum & Wong, 2018). Table 2 (see next page) shows the widening size gap between Kuala Lumpur and the currently second ranking city of Johor Bahru during the post-World War II period. Their size difference had remained around four times until the late 1990s when Malaysia's successful participation in the globalized economy received an important impact. Consequently, from 2000, Kuala Lumpur's size gap began to widen to over 6 times, reaching 7.7 times in 2020. According to the United Nations projection, the gap would continue to rise to 8 times from 2025 to 2035 (United Nations, 2021). Similar rise in primacy has also occurred in other Southeast Asian capital cities such as Jakarta, Manila and Bangkok. Those having higher primacy rates are countries enjoying better performance in export-led industrialization strategies (Douglass & Jones, 2008: 28-29).

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Table1: Population of Kuala Lumpur Metropolitan Region, 1950-2020

Year	Population	Annual Growth Rate (%)	Year	Population	Annual Growth Rate (%)
1950	262,000	--	1990	2,098,000	8.03
1955	300,000	2.74	1995	2,975,000	7.01
1960	344,000	2.99	2000	4,176,000	7.02
1965	394,000	2.87	2005	4,927,000	3.36
1970	451,000	2.73	2010	5,810,000	3.36
1975	661,000	8.01	2015	6,851,000	3.35
1980	971,000	8.01	2019	7,780,000	2.86
1985	1,427,000	7.94	2020	7,997,000	2.79

Source: United Nations (2019). World Population Prospects 2019. New York.

Note: This Metropolitan Area is also known as The Klang Valley, stretching from Gombak to the east of Federal Territory of Kuala Lumpur to Port Klang to the west.

The 2020 figure is based on an estimate. Annual growth rate indicates the rate of increase over the previous year.

Table 2: Rise of Primacy Index of Kuala Lumpur Metropolitan Region over Johor Bahru Urban Region, 1950-2020

Year	Pop. of Kuala Lumpur Metropolitan Region (a)	Pop. of Johor Bahru Urban Region (b) (Second largest)	No. of Times (a) is Greater Than (b)
1950*	262,000	46,800	5.6
1960	344,000	86,000	4.0
1970	451,000	135,800	3.3
1980	971,000	247,100	3.9
1990	1,427,000	416,600	3.4
2000	4,176,000	630,300	6.6
2010	5,810,000	807,000	7.2
2020	7,997,000	1,045,000	7.7

Source: United Nations (2019). World Population Prospects 2019, New York, and UN World Urbanization Prospects 2021.

Note: Including extended urbanized areas beyond the city administrative boundary. The 2020 figure is based on an estimate. All figures are rounded to the nearest 100 or 1000.

* Inclusive of large “new villages” built within Kuala Lumpur which resettled remote villagers during the anti-Communist “Emergency period 1948-1960”.

The gap in Malaysia would have been even larger had there not been the spill-over effect from Singapore which, apart from injecting investment and routine spending in Johor, has been attracting over 100,000 commuting workers daily from Johor Bahru. Johor Bahru has, in turn, drawn in large numbers of migrants from other less prosperous states such as Perak, Pahang, and rural regions north of Johor state itself.

In the globalized exchange of goods and services, land scarce Singapore has generated greater effect for its adjoining city Johor Bahru than Kuala Lumpur. Functionally, Johor Bahru has served as a lower end supplier of labour and skill to Singapore which is the regional hub of Southeast Asia in the flow of goods, capital and knowledge information. With the agglomeration economic effects coming from Singapore, this is executed very effectively in the context of international division of work.

CONCLUSION

The Kuala Lumpur metropolitan region or better known as Greater Kuala Lumpur or Klang Valley has experienced extensive growth in both physical and cultural transformations in landscape over the past 50 years. However, further expansion has to face physical barriers by mountains to its immediate east and the Straits of Melaka 30 km to the west (Wong, 2006b). Endogenously, it is the far-reaching rural-urban cum small-medium sized town migration to the most privileged capital metropolitan region as a result of improved education and the gain of agglomeration economies that have provided advantages in better qualified jobs and investments. Given the privilege of the Kuala Lumpur metropolitan region, its primacy index has risen sharply over the second ranking Johor Bahru Urban Region from 3.9 to 7.7 during the respective period of 1980 and 2020.

With high land values in Kuala Lumpur's inner-city areas, future growth is expected more in the outer zone in the form of corridors and radial trajectories along major arterial roads (Douglass & Jones, 2008). From the 1970s, the state-sponsored Malay urbanization campaign through large-scale public service and corporate recruitment policy, with the support of substantial petro-dollar input derived from oil and gas wells, has similarly played an important role in the expansion of Klang Valley.

Exogenously, the global shift of Western industries to Klang Valley after the mid-1970s has also witnessed the extensive expansion of urban-industrial premises along Klang Valley served by a network of highways and landed housing estates as well as both professional and unskilled workforce linked to the global market.

Building an extensive highway network to serve a fast-expanding Klang Valley population had turned out to be an abusive way of corruption and cronyistic practice in Malaysian politics. In consequence, public funded highways have been built in the metropolitan region much more than needed to generate shared revenues among privileged business participants while public transport has been victimized as it largely does not provide "surplus revenues" but requires, instead, public subsidies. This practice, which has not mitigated traffic congestion in Klang Valley, has colluded with other biases of urban development in the Kuala Lumpur metropolitan region. It has also set constraints to its being advanced to the world city status which must only be earned through authentic entrepreneurship and good governance (see Morshidi, 2000 & 2001).

As a remedial measure, the ruling government should realize that recognition of Malaysia's multi-ethnic and multi-faith society is critical to create an encompassing nation where all races could contribute unity with diversity. Using the pretext of providing help to the poor of just one group who is majority over others will not give forth to full-hearted partnership from all citizens. Furthermore, this could be abused to serve predominantly the vested interests of certain politician-cum-business groups. This is especially true of a city building process in which collective efforts are needed to construct a shared identity that belongs to all.

REFERENCES

- Aiken, S. R. & Leigh, C. H. (1975). Malaysia's emerging conurbation. *Annals of the Association of American Geographers*, 65(4), 546-563.
- Aiken, S. R. & Leigh, C. H. (2011). In the way of development: Indigenous land-rights issues in Malaysia. *Geographical Review*, 101 (4), 471-496.
- Barlow, H. S. (1995). Swettenham – Schemer and historian. *Journal of the Malaysian Branch of the Royal Asiatic Society*. 69, Part 2.
- Bunnell, T. (2002). Kampung rules: Landscape and the contested government of urban(e) Malayness. *Urban Studies*, 39(9), 1685-1701.
- Bunnell, T. & Nah, A. M. (2004). Counter-global cities for place: Contesting displacement in globalising Kuala Lumpur Metropolitan Area. *Urban Studies*, 41(12), 2447-2467.
- Dick, H. W & Rimmer, P. (1998). Beyond the Third World city: The new urban geography of South-east Asia. *Urban Studies*, 35(12), 2303-2321.
- Dicken, P. (2007). *Global Shift: Managing the Changing Contours of the World Economy*. (5th ed). Sage, London.
- Douglass, M. & Jones, G. (2008). The morphology of mega-urban regions expansion. In Jones, G. & Douglass, M. (eds). *Mega-Urban Regions in Pacific Asia: Urban Dynamics in Global Era* (pp. 19 - 40). NUS Press, Singapore.
- Goldblum, C. (2017). *La transition urbaine dans l'ouverture à l'économie de marché*. In Peyronnie, K., Goldblum, C., & Sisoulath, B. (eds). *Transitions Urbaines en Asie du Sud-Est*. (pp. 331 - 350). IRASEC & IRD Editions, Marseille.
- Goldblum, C. & Wong, T-C.(2018). Extended Metropolitan Development in Southeast Asia: From Primate Cities to Territorial Urban Diffusion. In Rozenblat, C, Pumain, D., & Velasquez, E. (eds). *International and Transnational Perspectives on Urban Systems* (pp. 359 - 383). Springer, Singapore.
- Gomez, E. T. (2002). Political business in Malaysia: Party factionalism, corporate development and economic crisis. In Gomez, E. T. (ed). *Political Business in East Asia*. (pp. 82 – 114). Routledge, London.
- Gomez, E. T. (2013). Nurturing Bumiputra capital: SMEs, entrepreneurship and the New Economic Policy. In Gomez, E. T. (ed). *The New Economic Policy in Malaysia: Affirmative Action, Ethnic Inequalities and Social Justice* (pp. 87 - 115). NUS Press & ISEAS, Singapore,.

- Gomez E. T. & Tong, J. (2017). Financing politics in Malaysia: Reforming the system. *Australian Journal of Asian Law*, 18(2), 119-135.
- Gullick, J. M. (1990). The growth of Kuala Lumpur and the Malay community in Selangor before 1880. *Journal of the Malaysian Branch of the Royal Asiatic Society*, 63(1), 15-38.
- Hamid, Z. A., Foo, C-H., & Rahim, A. H. A. (2017). Retrospective view and future initiatives in industrialised building systems and modernisation, mechanisation and industrialisation. *In book: Modernisation, Mechanisation and Industrialisation of Concrete Structures* (pp. 424-452). Construction Research Institute of Malaysia, Kuala Lumpur.
- Horner, M. W. (2002). Extensions to the concept of excess commuting. *Environment and Planning A*, 34, 543-566.
- Hoselitz, B. F. (1957). Urbanization and economic growth in Asia. *Economic Development and Cultural Change*, 6(1), 42-54.
- Jackson, J. C. (1963). Kuala Lumpur in the 1880's: The contribution of Bloomfield Douglas. *Journal of Southeast Asian History*, 4(2), 117-127.
- Johnston, R., Gregory, D., Pratt, G. & Watts, M. (2000). *The Dictionary of Human Geography* (4th Ed.). Blackwell, Oxford.
- Kinney, W. P. (1975). Aspects of Malayan economic development, 1900-1940. Unpublished PhD thesis presented to University of London.
- Mazlan, M. (2014). Malaysia's new wave of urbanisation. Institute of Strategic and International Studies, Kuala Lumpur.
- McGee, T. G. (1967). *The Southeast Asian City*. G. Bell and Sons, London.
- Meijers, E. J. & Burger, M. J. (2010). Spatial structure and productivity in US metropolitan areas. *Environment and Planning A*, 42,1383-1402.
- Morshidi, S. (2000). Globalising Kuala Lumpur and the strategic role of the producer services sector. *Urban Studies*, 37(12), 2217-2240.
- Morshidi, S. (2001). Globalisation and urban competitiveness: An unfinished agenda? *Built Environment*, 27(2), 96-111.
- Nagarajan, S. & Willford, A. (2014). The last plantations in Kuala Lumpur. In Yeoh, S-G. (ed). *The Other Kuala Lumpur: Living in the Shadows of a Globalising Southeast Asian City* (pp. 191 – 218). Routledge, London.
- Ordonhas Viseu Cardoso, R. & Meijers, E.J. (2020). The process of metropolization in megacity-regions. In Labbe, D. & Sorensen, A. (eds). *Handbook of Megacities and Megacity-Regions*. Edward Elgar, Cheltenham (UK).
- Oxford Business Group. (2022).The economic engine: Greater KL is a leader in regional and national growth. <https://oxfordbusinessgroup.com/analysis/economic-engine-greater-kl-leader-regional-and-national-growth>.
- Rimmer, J. P. & Dick, H. (2009). *The City in Southeast Asia: Patterns, Process and Policy*. NUS Press, Singapore.
- Sassen, S. (2002) (Ed.). *Global Networks, Linked Cities*. Routledge, New York.
- Selangor State Government. (2005). Klang Valley Public Transport Study. Final Report <https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=&cad=rja&uact=8&ved=2ahUKEwiE7bys0v35AhUySmwGHbgKAO4QFnoECAwQAQ&url=https%3A%2F%2Fftp.itc.nl%2Fpub%2Fitctno%2FKlangValley%2FReport%2FA3->

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Study%2520Context.doc&usg=AOvVaw1P8O7GUImEFCW6zPogri_L

- Sendut, H. (1966). Contemporary urbanization in Malaysia. *Asian Survey*, 6(9), 484-491.
- Toh, M-H. (2012). Competitive cities and urban economic development in Southeast Asia. In Yap, K-S. & Thuzar, M. (eds). *Urbanization in Southeast Asia: Issues and Impacts* (pp. 115 – 138). ISEAS, Singapore.
- United Nations. (2019). *World Population Prospects 2019*, New York.
- United Nations. (2021). *UN World Urbanization Prospects 2021*. <http://worldpopulationreview.com/world-cities/johor-bahru-population>
- Verhoef, E. & Nijkamp, P. (2008). Urban environmental externalities, agglomeration forces, and the technological ‘deus ex machina’. *Environment and Planning A*, 40, 928-947.
- Wikipedia. (2017). Expressways and highways in the Klang Valley. https://en.wikipedia.org/wiki/Category:Expressways_and_highways_in_the_Klang_Valley
- Wong, T-C. (1991). From spontaneous settlement to rational land use planning: The case of Kuala Lumpur. *Sojourn*, 6(2), 240-262.
- Wong, T-C. (2006a). Achieving a sustainable form? An investigation of the Kuala Lumpur mega-urban region. In Wong, T-C, Shaw, B. J. & Goh, K-C. (eds). *Challenging Sustainability: Urban Development and Change in Southeast Asia* (pp. 146 – 171). Marshall Cavendish Academic, Singapore.
- Wong, T-C. (2006b). Edge cities around Kuala Lumpur, Malaysia: From satellite towns to the modern administrative centre Putra Jaya. In Goh, K-C. & Sekson, Y. (eds). *Change and Development in Southeast Asia in an Era of Globalisation* (pp. 67 - 86). Pearson & Prentice Hall, Singapore.
- Wong, T-C. (2018). Lee Shin Cheng: From entrepreneurship to philanthropy. In Mok, S-C. (ed). *Philanthropists in Malaysia and Singapore* (pp. 208 – 223). New Era University College, Kajang (Malaysia).
- Yap, K-S. (2019). Peri-urban transformation in Southeast Asia. Preprint version prepared for Padawangi, R. (ed). *Routledge Handbook of Urbanization in Southeast Asia* (pp. 31 – 42). Routledge, London.
- Zhang, J-Q. (2007). *Kuala Lumpur under British Rule*. Mentor Publishing Sdn Bhd., Batu Caves, Malaysia.
- Zhao, P., Lü, B. & de Roo, G. (2010). Urban expansion and transportation: The impact of urban form on commuting patterns on the city fringe of Beijing. *Environment and Planning A*, 42, 2467-2486.

Notes

¹ To cite a few larger ones, these were Dunlop Rubber Plantation, Société Financière des Caoutchoucs, Malayan American Plantations, Malacca Rubber Plantations, and East Asiatic Rubber Company. Many estates were managed through agency firms such as Harrisons, Crosfield & Company, Sime Darby, Guthrie, Boustead etc (Kinney, 1975: 61-63).

² The Malay Reserve Land Law was first introduced in 1913 in the Federated Malay States of Perak, Selangor, Negeri Sembilan, and Pahang, which forbids the disposal of Malay-owned lands to non-Malays. It was extended to Non-Federated Malay States (Kedah, Trengganu, Kelantan, Perlis, Johor) in the 1930s. The three Straits Settlements (Penang, Malacca, Singapore) were not affected by this law.

³ During the “Emergency period” 1948-1960 where the British colonial government fought the Communist insurgents, over half-a million ethnic Chinese residents who lived at the rural fringes were resettled in 400 “New Villages” with security provided to prevent them from supporting the Communist guerillas (Aiken & Leigh, 1975). As of today, the great majority of oil palm workers are Indonesian migrant workers.

⁴ Original people in Malay are one of the earliest settlers in Peninsular Malaysia with their number in 2010 estimated at 170,000. A small percentage of them who still lead traditional livelihood by hunting and slash and burn farming live in isolated mountainous areas.

⁵ Metropolization should be differentiated from metropolitanization in that the latter involves the change and adaptation in lifestyle to metropolitan character, sharply different from rural lifestyle.