

# Ranking the Challenges of the Urban Community in Malaysia

Sotheeswari Somasundram<sup>a</sup>, Murali Sambasivan<sup>b</sup>, Ratneswary Rasiah<sup>c</sup>,  
Tee Pei-Leng<sup>d</sup>

**Abstract:** *The urban community in Malaysia is facing rapid urbanisation and have been the beneficiary of urban development policies. The key purpose of these policies has been to enhance and improve the well-being of the urban community. However, given the diverse nature of urban planning, literature has highlighted the possibility of a mismatch between policy directions and the outcomes desired by society. The aim of this study is therefore, to determine whether urban policy measures currently implemented in Malaysia are in sync with the needs of society. This study applied the relative importance index (RII) method to understand the challenges faced by urban residents in Kuala Lumpur, Selangor, Malacca and Penang. The results revealed five challenges which are of concern to the urban community: prevalence of crime, rising cost of living, lack of employment opportunities, air pollution and traffic congestion. The findings indicate Government policies are addressing these concerns. However, for a more effective outcome, the study recommends designing urban policies in consultation with civil society.*

**Keywords:** Malaysia, quality of urban life, relative importance index, standard of living, urban planning

**JEL classification:** 053, R11, C43, J130, 018

Article received: 20 April 2018; Article accepted: 21 August 2018

## 1. Introduction

Urban issues and challenges have been the subject of study for many years and in fact, these have moved up the policy agenda in many countries. For example, Stegman (1995) provided an account of urban change and policy initiatives in the United State (US), while Carpenter (2006) reported that

---

<sup>a</sup> Corresponding Author. Business School of Taylor's University, Lakeside Campus, Malaysia  
Malaysia Email: [sotheeswari.somasundram@taylors.edu.my](mailto:sotheeswari.somasundram@taylors.edu.my)

<sup>b</sup> Business School of Taylor's University, Lakeside Campus, Malaysia Malaysia Email:  
[Murali.Sambasivan@taylors.edu.my](mailto:Murali.Sambasivan@taylors.edu.my)

<sup>c</sup> Business School of Taylor's University, Lakeside Campus, Malaysia Malaysia Email:  
[Ratneswary.RASIAH@taylors.edu.my](mailto:Ratneswary.RASIAH@taylors.edu.my)

<sup>d</sup> Business School of Taylor's University, Lakeside Campus, Malaysia Malaysia Email:  
[PeiLeng.Tee@taylors.edu.my](mailto:PeiLeng.Tee@taylors.edu.my)

urban issues have been given serious consideration in European Union's policy agenda over many years. Zhu (2017) highlighted the role played by local governments in facing the urban challenges in China, while Chu (2017) showed how communities help build alliances between local institutions in India to handle urban challenges. It is interesting to note the challenges are different from one country to another country and within a country, the challenges can be different from one state to another and from one city to another city.

Malaysia implemented the Malaysia Urban Indicators Network (MURNInet) programme in 2002 (Shamsuddin and Rashid, 2013). This strategy was renamed MURNInet 2.0 in 2017 to reflect the current changes in the urban landscape (Federal Department of Town and Country Planning Peninsular Malaysia, n.d.). In 2006, the Government drew up the National Urbanisation Policy (NUP) within a comprehensive and integrated framework, to deliver quality urban services that would ensure creation of safer, systematic, modern and attractive towns (Federal Department of Town and Country Planning, 2006). However, over the years, given the diverse nature of urban planning, many other policies co-existed with NUP. For example, the National Green Technology Policy, the National Landscape Policy, the National Housing Policy, the National Industrial Policy and the most recent Eleventh Malaysia Plan 2016-2020 (Federal Department of Town and Country Planning, 2016) co-existed with NUP. The Government recognising the need for consolidation, formulated a comprehensive National Development Planning Framework, which horizontally integrated individual policies into National Physical Plan (NPP)(Federal Department of Town and Country Planning, 2016).

A cursory glance of the various policy measures initiated thus far, showed the Government is cognisant of urban planning challenges and hence, has been proactive in designing policies which are geared towards enhancing the quality of urban life in Malaysia. However, on reflection, a pertinent question arises: Are the policies focusing on the areas which are of concern to urban society? Studies have highlighted that there can be a mismatch between policy directions and outcomes desired by the society (Corburn, 2004; Vincent, 2006; Loh, 2012). Giap, Thye and Aw (2014) highlighted the layman will have multi-dimensional sensibilities on the aspects of liveability that contributes towards enhancing his/her quality of life. Is it possible for urban planners and policy makers to accurately decipher the challenges faced by urbanites and thus provide accordingly? With this question in mind, the aim of the present study is to understand the challenges faced by the urban community in Malaysia and whether Government policies are directed towards addressing these concerns.

It is interesting to note that many of the major cities in the world evolved without a blueprint. Kuala Lumpur (capital city of Malaysia), for

instance was a mining settlement before it grew organically into what it is today. As cities grow, planners and policy makers face unenviable task of addressing the numerous problems associated with urban planning and management. This study examines the challenges faced by four states in Malaysia, one of the fast-growing economies in South-East Asia. Critical challenges were compared by ranking the challenges using the concept of Relative Importance Index (RII) (Kometa, Olomolaiye & Harris, 1994). This approach is relatively new in urban studies but a popular approach in the construction industry to rank the delay factors (Sambasivan & Soon, 2007). A comparative study among the various states contributes as follows: (1) helps to compare the specific challenges among states, (2) helps to rank and thereby benchmark and exchange best practices between states and (3) assists the policy makers at the federal and local government levels to understand the challenges at different centres and devise appropriate strategies to improve the standard of living of residents.

## **2. Literature Review**

### **2.1 *Quality of urban life***

The elements of urban liveability is said to encompass two key elements: first, whether the city is able to fulfil the needs and wants of its dwellers and second, whether the city's environment has the necessary elements to sustain the lives and livelihood of its residents (Ruth & Franklin, 2014). Aligned to this concept of liveability is the on-going debate on the approach to effectively measure quality of life. Balducci and Checchi (2009) highlight both quantitative and qualitative measurements can be applied as instruments, where quantitative measures include, among others, pollution, traffic, availability of public services while qualitative measures include interpersonal relationships and lifestyles. Although Gavrilidis et al., (2016) agree that both measures are complementary, they caution on the use of qualitative methods which they argue can generate biased results as perception of lifestyle and interpersonal relationship are subjective. Taking this into consideration, the following will focus on the quantitative methods of quality of urban life.

Studies have shown a number of quantitative measures that should be considered in gauging the impact of quality of urban life. Sanders, Zuidgeest and Geurs, (2015) highlight transportation concerns in Hanoi, citing congestion, pollution, noise, low levels of traffic safety as negatively impacting well-being. Environmental issues are another key factor in evaluating quality of life (Viglia et al., 2017), where concerns are raised on carbon footprint (Joffe & Smith, 2016) and waste management (Moh &

Abd Manaf, 2014). Rising crime rates in urban areas would also impact quality of life negatively, where Faria, Ogura and Sachside (2013) highlight that type of housing and economic activity influence crime rates in cities. Interestingly, this study also highlights that proper city planning does not necessarily address the issue of crime in cities. This is a relevant point as proper town planning alone would not be sufficient to address crime rates and in all possibilities might require a complementary social policy as well. In addition, studies have highlighted other issues that impact quality of life, such as disable or senior citizen friendly city environment (Hwang & Ziebarth, 2015; Szołtysek & Otręba, 2016), compact cities (Bardhan, Kurisu & Hanaki, 2015) and heritage values (Mostafa, 2012), among others.

Urban planning and policy implementations are crucial as poor urban development can negatively impact on urban quality of life (Balducci & Checchi, 2009; Serag El Din et al., 2013). As highlighted above, there are a wide range of policies on urban development in Malaysia. This raises concern on the difficulties in comprehensively analysing all of these policies. In order to address this problem, we focus on the most current policy directions for urban development, the City Competitiveness Master Plans (CCMP) under the Eleventh Malaysia Plan from 2016 to 2020 (Economic Planning Unit, 2015) as our point of reference.

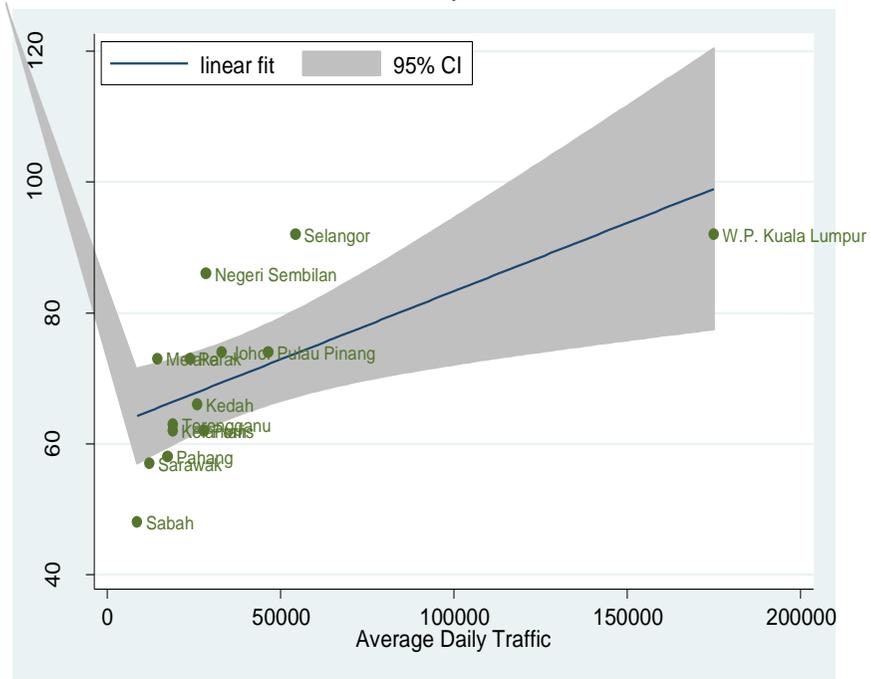
## **2.2 *Urban challenges***

There are six key principles highlighted in the CCMP framework to develop competitive cities in Malaysia (Economic Planning Unit, 2015). The first principle is to enhance economic density. Malaysian cities have lower economic density compared with other Asian cities, such as Bangkok and Jakarta (Baker & Lee, 2015). Enhancing economic density is important as it will create more jobs within a given radius, providing an environment that can better match the talent and skills of the workforce (Glaeser & Gottlieb, 2009).

The second principle of CCMP is to expand transit-oriented development, focusing mainly on reducing the use of private vehicles and increasing the use of public transport. According to TomTom International BV (2016), traffic congestion in Kuala Lumpur is responsible for an additional travel time of 158 hours for 2016. Traffic congestion is attributed to urban sprawl and poor public transportation system (Baker & Lee, 2015). The total cost in terms of wasted fuel, carbon (CO<sub>2</sub>) emissions, delays and vehicle maintenance in Kuala Lumpur is valued approximately at 1.1% to 2.2% of the Gross Domestic Product which translates to over RM3100 per resident annually (Federal Department of Town and Country Planning, 2016). Studies have highlighted a positive relationship between

traffic congestion and environmental degradation (Lee et al., 2014; Shekarrizfard et al., 2015; Shekarrizfard, Faghih-Imani and Hatzopoulou, 2016) which is also the case in the 14 states in Malaysia, as shown in Figure 1.

**Figure 1:** Impact of Average Daily Traffic on Air Pollution Index among 14 States in Malaysia, 2016

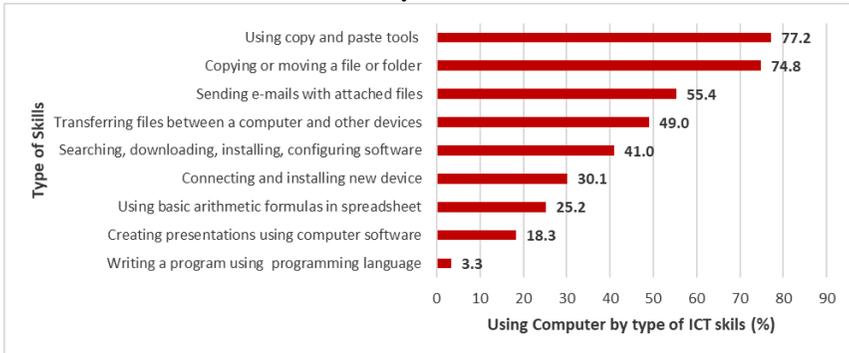


**Source:** Department of Environment, Malaysia and Ministry of Works, Malaysia

Another key principle under the CCMP framework is to strengthen knowledge-based clusters by designing physical hubs that will attract creative industries, Information Communication Technology (ICT) and professional services that will function as knowledge-based clusters (Economic Planning Unit, 2015). The aim is to eventually move all economic sectors towards more knowledge-intensive and high value-added activities leading to greater productivity under the Sustainable Development Goals (Economic Planning Unit, 2017). However, Evers and Gerke (2015) cautions us on focusing too much on the physical infrastructure while neglecting the human capital factor. Figure 2 illustrates the prevalence of ICT skills in Malaysia, where close to 80% of the population are Information and Technology(IT) literate but a large majority are only competent in basic skills such copying and pasting. These

statistics are disturbing as a knowledge-based cluster would require increased knowledge in ICT skills than what is demonstrated by society today.

**Figure 2:** Percentage of Individuals Using Computer based on ICT Skills in Malaysia, 2015



**Source:** Department of Statistics, Malaysia

Another key objective of the CCMP framework is to enhance urban liveability, which includes ensuring quality education and health care, providing affordable and quality housing for those in the middle and low income category (Economic Planning Unit, 2015). According to Demographia International, housing is considered affordable if the property can be financed based on less than three times a household’s median annual income (Baker & Lee, 2015). A report by Khazanah Research Institute (2015) highlights that housing is unaffordable in all states in Malaysia, except Malacca which justifies the policy focus by the Government.

Promoting environmentally-friendly practices within cities have been flagged as another important outcome under the CCMP framework. Proper waste management is a concern as the current practice of open dumping and landfills (Moh and Abd Manaf, 2017) is deemed a problem as many landfill sites have surpassed its operating capacity, raising concerns on its impact on the environment and society (Manaf, Samah & Zukki, 2009). According to Moh and Abd Manaf (2014), up to 80% of the waste composition found in landfills are recyclable materials discarded by Malaysian households. Studies claim that although a host of techniques are employed to educate and create awareness on the importance of recycling, the general perception is that recycling is less important compared with other issues (Zain et al., 2012; Akil, Foziah & Ho, 2015).

The sixth and final principal under the CCMP framework is to ensure inclusivity and social integration by engaging with different stakeholders to create an environment of shared sense of responsibility (Economic

Planning Unit, 2015). Social inclusion and integration are considered vital to contribute towards quality of life (Cambir & Vasile, 2015). A report by World Bank indicated those in the urban areas between the ages of 15 and 30 are likely to be vulnerable to exclusion, citing poverty and rising costs of living as contributing factors (Baker & Lee, 2015). In the context of their study which is focused on a highly urban setting, they noted such stark differences between the poor and rich can result in frustration and compound the feelings of exclusion leading to crime and other costs to society (Baker & Lee, 2015). Studies point towards low education, long-term unemployment (Aaltonen, Kivivuori and Martikainen, 2011), poverty and inequality in income (Bruun, 2016) as instigators of social exclusion, eventually leading to rising crime rates and other social costs in the country.

### **3. Methodology**

#### **3.1 Data**

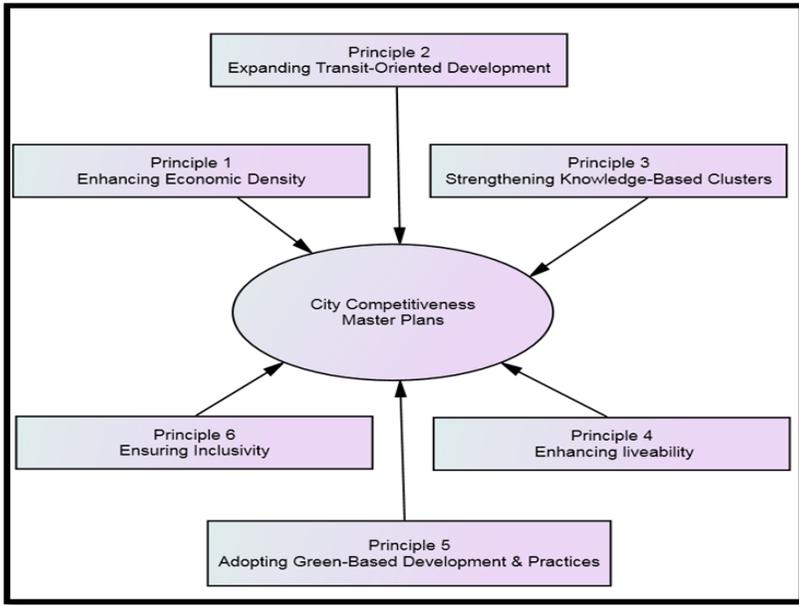
In order to determine the perception of urban community on the challenges faced in Malaysia, the study used data from Global Attitudes Survey (Pew Research Center, 2014). The Global Attitudes Survey sample for Malaysia was divided based on state and urban areas. This stratification allowed for extraction of data of urban dwellers. The present study focused on four states in Malaysia, namely Kuala Lumpur, Selangor, Penang and Malacca. These states were selected as more than 90% of their population live in urban areas (Department of Statistics Malaysia, n.d.). The sample for this study consisted of 358 respondents representing three main races in Malaysia - Malays (52%), Chinese (36.9%) and Indians (10.9%) who reside in urban areas in Malacca (24), Penang (59), Selangor (201) and Kuala Lumpur (74). A profile analysis of the sample showed female (188) outnumbered their male counterparts. The majority (21.2%) of respondents are between 35 and 44 years of age and have completed secondary education (65.1%). Most of the respondents are gainfully employed (62.3%) with the majority (64.8%) falling in the monthly income bracket of between RM1000 to RM5000.

#### **3.2 Framework of analysis**

The constraint of using data from a public domain instead of from a customised questionnaire is pick and choose questions that would be able to reflect and capture the objectives of the study. This concern was

addressed by mapping questions from the Global Attitudes Survey with the six key principles identified under the CCMP framework (Figure 3).

**Figure 3:** CCMP framework as Outlined in the Eleventh Malaysia Plan



Source: Economic Planning Unit, 2015

**Table 1:** Mapping Questions from the Global Attitude Survey to Principles in the CCMP

Principle	Concerns of CCMP	Item	Urban Challenge
Principle 1: enhancing economic density	Improve productivity and provide job opportunities by attracting investment and trade opportunities	Q23B. Do you think lack of employment opportunities is a very big problem, a moderately big problem, a small problem or not a problem at all in our country?	Lack of Employment Opportunities
Principle 2: Expanding transit-oriented development	Less use of public transport and uncontrolled automobile sprawl	Q21E. Please tell me if air pollution is a very big problem, a moderately big problem, a small problem or not a problem at all. Q21I. Please tell me if traffic is a very big problem, a moderately big problem, a small problem or not a problem at all.	Air Pollution Traffic Congestion
Principle 3: Strengthening knowledge-based clusters	Current industries are predominantly labour and space-intensive	NO MATCHING QUESTIONS	

**Table 1:** (Continue)

<b>Principle</b>	<b>Concerns of CCMP</b>	<b>Item</b>	<b>Urban Challenge</b>
Principle 4: Enhancing liveability	Lack of affordable and quality living environment	Q21C. Please tell me if poor quality of schools is a very big problem, a moderately big problem, a small problem or not a problem at all.	Poor Quality of Schools
		Q21H. Please tell me if health care is a very big problem, a moderately big problem, a small problem or not a problem at all.	Poor Health Care
		Q23A. Do you think rising prices is a very big problem, a moderately big problem, a small problem or not a problem at all in our country?	Rising Price
Principle 5: Adopting green-based development and practices	Inefficient waste management and concerns with environmental degradation	Q21F. Please tell me if water pollution is a very big problem, a moderately big problem, a small problem or not a problem at all.	Water Pollution
		Q21G. Please tell me if safety of food is a very big problem, a moderately big problem, a small problem or not a problem at all.	Food Safety
Principle 6: Ensuring inclusivity	Concerns on lack of wealth sharing resulting in homelessness and poverty in cities.	Q21A. Please tell me if you think crime is a very big problem, a moderately big problem, a small problem or not a problem at all.	Crime
		Q23C. Do you think the gap between the rich and the poor is a very big problem, a moderately big problem, a small problem or not a problem at all in our country?	Income Inequality

**Source:** Spring 2014 Global Attitudes Survey, Pew Research Center.

Table 1 shows a mapping of the questions from the Global Attitude Survey to the principles in the CCMP framework. For the first principle of enhance economic density which would lead to creation of more jobs within a given radius (Baker and Lee, 2015) and results in higher economic development (Wang, He and Lin, 2018), the question on the importance of availability or lack of employment opportunities as a potential question was flagged. For the second principle on expanding transit-oriented development which looks at increasing use of public transportation to address the concerns on traffic congestions and air pollution, the question was whether traffic and air pollution are perceived as serious problems. The third principle is on strengthening knowledge-based clusters, however, questions that can be mapped to this construct were not identified. For the fourth principle of enhancing liveability, the questions included are on the perceived quality of education and health care in Malaysia. In order to measure affordable housing, we identified rising price level as a potential

question. For the fifth principle on environmental issues, the questions included are on concerns regarding water pollution and food safety. The final principle is on inclusivity, where concerns were rising on crime attributed to distribution of wealth and inequality in income. The questions included under this category are perceptions on crime and income inequality.

### 3.3 *The scoring method: Relative importance*

The study employed RII method to determine the relative importance of the various challenges faced by urban community in Malaysia. This technique is widely used in the construction management research (Kometa, Olomolaiye & Harris, 1994; Sambasivan & Soon, 2007; Gündüz, Nielsen & Özdemir, 2013). The questions identified for inclusion in the analysis had a four-point scale which were initially coded as ranging from 1 (very big problem) to 4 (not a problem at all). However, the responses were recoded to range from 1 (not a problem) to 4 (a very big problem) for the purpose of better reflecting the importance of each challenge as per the relative importance index approach. The responses from these questions are transformed to relative importance indices (RII) by applying the calculation as shown in equation 1.

$$RII = \frac{\sum W}{A * N} \quad (1)$$

where W is the weighting given to each factor by respondents ranging from either (1 to 4); A is the highest weight, where in this case it takes on a value of 4; and N is the total number of respondents. The weightage is the same for all questions as it is based on the Likert scale of 1 to 4. The RII value has a range of 0 to 1, where the higher the value, the more important is that challenge as perceived by the urban community.

## 4. Empirical Results

The RII was tabulated and a ranking of the challenges was done based on the RII values. Table 2 shows the RII value and ranking for the urban areas in the four states considered in this study. Based on the ranking as shown in Table 2, the five most important challenges as perceived by the urban community were: (1) crime (RII = 0.935); (2) Rising Price Level (RII = 0.931); (3) Lack of Employment Opportunities (RII = 0.869); (4) Air Pollution (RII = 0.844) and (5) Traffic Congestion (RII = 0.817). In order to gauge the perception of urban community in the respective states, the RII

values were computed for the challenges and the top five challenges were ranked for the four states (Table 3).

The five most important challenges as perceived by urban community in Kuala Lumpur were crime (1), rising price level (2), traffic congestion (3), lack of employment opportunities (4) and air pollution (5). The five most important challenges as perceived by urban community in Selangor were crime (1), rising price level (2), lack of employment opportunities (3), air pollution (4) and traffic congestion (5). The five most important challenges as perceived by urban community in Penang were crime and rising price level as the most important challenge, income inequality (3), poor quality of schools (4) and food safety hazards (5). Finally, the five most important challenges as perceived by urban community in Malacca were rising price level (1), crime (2), lack of employment opportunities (3), income inequality (4) and water pollution (5).

**Table 2: Ranking of Challenges (Overall)**

Challenges	Percentage of respondents scoring				RII	Rank
	1	2	3	4		
Crime	0.0	1.1	23.7	75.1	0.935	1
Rising Price Level	0.3	3.1	20.7	76.0	0.931	2
Lack of Employment Opportunities	1.7	9.3	28.9	60.1	0.869	3
Air Pollution	1.7	12.0	33.2	53.1	0.844	4
Traffic Congestion	3.4	11.2	40.8	44.7	0.817	5
Income Inequality	6.7	12.3	31.0	50.0	0.811	6
Water Pollution	2.5	12.0	46.6	38.8	0.804	7
Poor Quality of Schools	5.0	19.3	33.1	42.6	0.783	8
Food Safety Hazards	5.3	21.6	34.8	38.2	0.765	9
Poor Health Care	7.6	18.2	35.0	39.2	0.765	10

**Table 3: Ranking of the Top Five Challenges by State**

	Biggest Challenge	2 <sup>nd</sup>	3 <sup>rd</sup>	4 <sup>th</sup>	5 <sup>th</sup>
Kuala Lumpur	Crime	Rising Price Level	Traffic Congestion	Lack of Employment Opportunities	Air Pollution
Selangor	Crime	Rising Price Level	Lack of Employment Opportunities	Air Pollution	Traffic Congestion
Penang	Crime and Rising Price Level	-	Income Inequality	Poor Quality of Schools	Food Safety Hazards
Malacca	Rising Price Level	Crime	Lack of Employment Opportunities	Income Inequality	Water Pollution

In order to establish the importance of the strategies structured in the CCMP framework as perceived by the urban community, the average RIIs of the challenges were computed to derive the RIIs for the principles as shown in Table 4. The overall RII value indicates the urban communities identified principle 6, ensuring inclusivity (RII = 0.873) as the most important of the six strategies prioritised by the Government under the CCMP framework. A breakdown by states shows that urban communities in Malacca and Penang identified ensuring inclusivity, as the most important principle. The second most important principle based on the overall RII value was enhancing economic density (RII = 0.869). An analysis by states shows that urban community in Selangor (RII = 0.873), Malacca (RII = 0.932) and Kuala Lumpur (RII =0.848) perceived enhancing economic density as the most important principle. However, the urban community in Penang ranked principle 4, enhancing liveability (RII=0.894), as the second most important principle that needs to be addressed under the CCMP framework.

**Table 4:** Mean RII and Ranking of CCMP Principles linked to Challenges

Principles	Selangor		Melaka		Penang		Kuala Lumpur		Overall	
	RII	Rank	RII	Rank	RII	Rank	RII	Rank	RII	Rank
Principle 1	0.873	1	0.932	1	0.856	3	0.848	1	0.869	2
Principle 2	0.836	3	0.729	5	0.837	5	0.843	3	0.831	3
Principle 4	0.814	4	0.809	3	0.894	2	0.810	4	0.826	4
Principle 5	0.771	5	0.776	4	0.838	4	0.784	5	0.785	5
Principle 6	0.872	2	0.932	1	0.924	1	0.845	2	0.873	1

**Note:** Principle 1 (Enhancing economic density), Principle 2 (Expanding transit-oriented development), Principle 4 (Enhancing liveability), Principle 5 (Adopting green-based development and practices), Principle 6 (Ensuring inclusivity)

## 5. Discussion

The main objective of this study was to determine whether the policies and strategies employed by the Government successfully tackled the issues considered as important by the urban community. The empirical results identified five main challenges. The urban community in Malaysia wants a safe living environment (Crime), where they will be able to secure employment (Lack of Employment Opportunities) that would provide them with sufficient spending power (Rising Price Level). In addition, they aspire for a good public transportation system (Traffic Congestion) that that can reduce CO2 emission (Air Pollution). Having identified the key indicators of urban community, the subsequent discussion focuses on whether the policy measures are aligned to what the urban society perceives as important.

The Government had prioritised six principles under the CCMP framework. Each principle was given due consideration and focus in the Eleventh Malaysian Plan (Economic Planning Unit, 2015), but no indication was given whether one principle was more important compared with the other. In the absence of clear indication of importance, the listing of principles in CCMP framework was used as an expression of priority. Based on Table 4, the key priority of the urban community is social inclusiveness and integration; however, in the CCMP framework, this is listed as the sixth or last principle. This indicates that what is perceived as the biggest challenge by the urban community is given the least importance by policy makers. This also highlights the importance of consulting and engaging with civil society in designing policies on urban liveability. Inputs from the urban community would ensure that important challenges perceived by the urban community are addressed by policy makers.

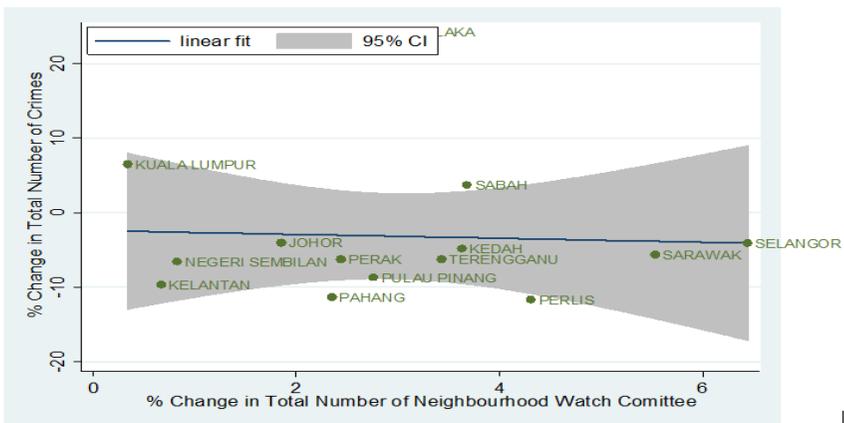
The present study acknowledges that taking the listing of the principles as an indication of priority is not the best approach. An alternative is to look at some of the measures implemented by the Government to see if they addressed the key challenges of the urban community. On top of the list of what is most desired by urban society is a safe living environment. Table 2 highlights crime as the biggest concern. Studies highlight factors, such as economic conditions (Habibullah & Baharom, 2009), inflation rate and unemployment rate (Tang, 2009) as contributing towards rising crime rates in Malaysia. A quick glance at the local media provides ample anecdotes on the perils of crime and criminals in Malaysia, giving the impression of rising crime rates.

In exploring whether there was sufficient focus by policy makers towards crime prevention, the Eleventh Malaysia plan identified specific strategies for crime reduction which includes among others, increasing the presence of police force, focusing on rehabilitation measures and promoting crime awareness among the high-risk groups (Economic Planning Unit, 2015). In addition, initiatives were taken to establish Neighbourhood Watch Committee programmes to enhance social integration, monitoring issues of social conflicts and reporting it to the relevant authorities; and organising night patrol to reduce incidences of crime in the neighbourhood (Department of National Unity and Integration, n.d.). In order to determine if Neighbourhood Watch Committee is effective in crime prevention, Figure 4 shows a negative relationship between Neighbourhood Watch Committees and percentage of total number of crimes between 2015 and 2016 for the 14 states in Malaysia. Based on Figure 4, Neighbourhood Watch Committees have an impact on reducing crime rates but it is not as significant. This indicates the effectiveness of Neighbourhood Watch Committees can be improved. It can be concluded there is a concerted effort on the part of policy makers to

ensure a safe living environment for the urban community based on the latter's expectation.

Another key concern of urban society is rising price level, where this component is ranked second by the overall community, as well as the urbanites in Kuala Lumpur, Selangor and Penang, while the community in Malacca ranked this as their biggest concern. Rising price level impacts standard of living and the purchasing power of communities. The Government is cognisant of the need to improve the standard of living as outlined in the Eleventh Malaysia Plan where households are divided in three broad categories of T20 (Top 20% households income group), M40 (Middle 40% households income group) and the B40 (Bottom 40% households income group) where those categorised as falling under B40 are those with a median monthly income of RM3, 000 (Department of Statistics Malaysia, 2017). The study computed the median monthly income for the 358 respondents in this sample and derived a value of RM2, 500, indicating that a significant proportion of the respondents can be grouped under the B40 category. Specific measures are included in the Eleventh Malaysia Plan to uplift the standard of living of those grouped under the B40 category, which included among others increasing the level of education and skill sets as well creating entrepreneurial opportunities with the aim of increasing income and reducing dependence on government assistance. Here too, there is an alignment between the preferences revealed by the urban community and the policy directions of the Government. However, the policy support is skewed towards B40 group where there is a danger of neglecting the views of the M40 household income group.

**Figure 4:** Effectiveness of Neighbourhood Watch Committees on Crime Prevention among 14 States in Malaysia, 2016



Source: The Public Sector Open Data Portal; Department of National Unity and Integration

## 6. Conclusion

The purpose of this study was to evaluate the challenges faced by the urban community in Malaysia and whether Government policies were successful in addressing these concerns. The challenges based on the perspective of the urban communities were rising crime rates, lack of employment opportunities, air pollution and traffic congestion. The study established policy that measures implemented by the Government were in sync with the concerns revealed by the urban community. However, it would be ideal if the urban community was given an opportunity to participate and provide inputs in designing policies on urban liveability. As data employed by this study was extracted from the public domain, the third principle of CCMP framework could not be analysed. Thus, it is recommended future research design specific survey questions that would be able to capture the finer details on the challenges of urban living.

## Acknowledgement

This research was funded by Taylor's University Research Grant: The Economics of Liveable and Sustainable Cities in the Greater Kuala Lumpur and Klang Valley.

## References

- Aaltonen, M., Kivivuori, J. & Martikainen, P. (2011) 'Social determinants of crime in a welfare state: do they still matter?', *Acta Sociologica*, 54(2), 161–181.
- Akil, A. M., Foziah, J. & Ho, C. S. (2015) 'the effects of socio-economic influences on households recycling behaviour in Iskandar Malaysia', *Procedia - Social and Behavioral Sciences*, 202, 124–134.
- Baker, J. & Lee, M. (2015). *Achieving a system of competitive cities in Malaysia*. Putrajaya: Economic Planning Unit, Prime Minister's Department, Malaysia, p.192. Retrieved February 9, 2018, from <http://documents.worldbank.org/curated/en/709061475743434007/Main-report>.
- Balducci, A. & Checchi, D. (2009) 'Happiness and quality of city life: the case of milan, the richest Italian city', *International Planning Studies*, 14(1), 25–64.
- Bardhan, R., Kurisu, K. & Hanaki, K. (2015) 'Does compact urban forms relate to good quality of life in high density cities of India? case of Kolkata', *Cities*, 48, 55–65.

- Bruun, K. (2016) 'Problematising internal security: crime, community and social exclusion', *Cogent Social Sciences*. Edited by J. Halsall, 2(1), 1–14.
- Cambir, A. & Vasile, V. (2015) 'Material dimension of life quality and social inclusion', *Procedia Economics and Finance*, 32, 932–939.
- Carpenter, J. (2006) 'Addressing Europe's urban challenges: lessons from the EU urban community initiative', *Urban Studies*, 43(12), 2145–2162.
- Chu, E. K. (2017) 'Urban climate adaptation and the reshaping of state–society relations: the politics of community knowledge and mobilisation in Indore, India', *Urban Studies*, 55(8), 1766–1782.
- Corburn, J. (2004) 'Confronting the challenges in reconnecting urban planning and public health', *American Journal of Public Health*, 94(4), 541–546.
- Department of National Unity and Integration (n.d.) *Neighbourhood watch (RT)*. Retrieved from <https://www.perpaduan.gov.my/en/community/neighbourhood-watch-rt>.
- Department of Statistics Malaysia (2017). *Report of household income and basic amenities survey 2016*. Retrieved from <https://www.dosm.gov.my/v1/index.php?r=column/pdfPrev&id=RUZ5REWveU1ra1hGL21JWVlPRmU2Zz09>.
- Department of Statistics Malaysia (n.d.). *eStatistik*. Retrieved from <https://newss.statistics.gov.my/newss-portalx/ep/epLogin.seam>.
- Economic Planning Unit (2015). *Eleventh Malaysia plan 2016-2020: anchoring growth on people*. Putrajaya: Economic Planning Unit, Prime Minister's Department, Malaysia, p.370. Retrieved from [https://www.talentcorp.com.my/clients/TalentCorp\\_2016\\_7A6571AE-D9D0-4175-B35D99EC514F2D24/contentms/img/publication/RMK\\_e-11Book.pdf](https://www.talentcorp.com.my/clients/TalentCorp_2016_7A6571AE-D9D0-4175-B35D99EC514F2D24/contentms/img/publication/RMK_e-11Book.pdf).
- Economic Planning Unit (2017). *Malaysia-sustainable development goals voluntary national review 2017: high-level political forum*. Putrajaya: Economic Planning Unit, Prime Minister's Department, Malaysia, p.82. Retrieved from <https://sustainabledevelopment.un.org/content/documents/15881Malaysia.pdf>.
- Evers, H. & Gerke, S. (2015). Knowledge cluster formation as a science policy in Malaysia: lessons learned. *Journal of Current Southeast Asian Affairs*, 34(1), 115–137. Retrieved from <http://www.CurrentSoutheastAsianAffairs.org>.
- Faria, J. R., Ogura, L. M. and Sachsida, A. (2013) 'Crime in a planned city: the case of Brasília', *Cities*, 32, pp. 80–87.
- Federal Department of Town and Country Planning (2006). *National urbanisation policy*. Kuala Lumpur: Jabatan Perancangan Bandar dan Desa, p.108. Retrieved from <http://urbanlex.unhabitat.org/sites/default>

- ault/files/ms\_nup\_national\_urbanisation\_policy\_2006.pdf.
- Federal Department of Town and Country Planning (2016). *Malaysia national report for the 3rd United Nations conference on housing and sustainable urban development (habitat III)*. Putrajaya: Ministry of Urban Wellbeing, Housing and Local Government, p.97. Retrieved from <http://habitat3.org/wp-content/uploads/Malaysia-National-Report-28092016.pdf>.
- Federal Department of Town and Country Planning Peninsular Malaysia. (n.d.). *MURNInets© | Malaysian urban rural national indicators network on sustainable development*. Retrieved from <http://murnin.et.townplan.gov.my/murninetsv2/mys/page/objektifmurninets>.
- Gavrilidis, A. A., Ciocănea, C. M., Niță, M. R., Onose, D. A. & Năstase, I. I. (2016) 'Urban landscape quality index – planning tool for evaluating urban landscapes and improving the quality of life', *Procedia Environmental Sciences*, 32, 155–167.
- Giap, T. K., Thye, W. W. & Aw, G. (2014) 'A new approach to measuring the liveability of cities: the global liveable cities index', *World Review of Science, Technology and Sustainable Development*, 11(2), 176.
- Glaeser, E. & Gottlieb, J. (2009) *The wealth of cities: agglomeration economies and spatial equilibrium in the United States*. Cambridge, MA.
- Gündüz, M., Nielsen, Y. and Özdemir, M. (2013) 'Quantification of delay factors using the relative importance index method for construction projects in Turkey', *Journal of Management in Engineering*, 29(2), pp. 133–139.
- Habibullah, M. S. & Baharom, A. H. (2009) 'Crime and economic conditions in Malaysia', *International Journal of Social Economics*, 36(11), 1071–1081.
- Hwang, E. & Ziebarth, A. (2015) 'Walkability features for seniors in two livable communities: a case study', *Housing and Society*, 42(3), 207–221.
- Joffe, H. & Smith, N. (2016) 'City dweller aspirations for cities of the future: how do environmental and personal wellbeing feature?', *Cities*, 59, 102–112.
- Khazanah Research Institute (2015). *Making housing affordable*. Kuala Lumpur: Khazanah Research Institute, p.134. Retrieved from [http://www.krinstitute.org/assets/contentMS/img/template/editor/\\_FINAL\\_Full\\_Draft\\_KRI\\_Making\\_Housing\\_Affordable\\_\\_with\\_hyperlink\\_220815%20\(1\).pdf](http://www.krinstitute.org/assets/contentMS/img/template/editor/_FINAL_Full_Draft_KRI_Making_Housing_Affordable__with_hyperlink_220815%20(1).pdf).
- Kometa, S. T., Olomolaiye, P. O. & Harris, F. C. (1994) 'Attributes of UK construction clients influencing project consultants' performance', *Construction Management and Economics*, 12(5), 433–443.
- Lee, J.H., Wu, C.F., Hoek, G., de Hoogh, K., Beelen, R., Brunekreef, B. &

- Chan, C.-C. (2014) 'Land use regression models for estimating individual NO<sub>x</sub> and NO<sub>2</sub> exposures in a metropolis with a high density of traffic roads and population', *Science of The Total Environment*, 472, 1163–1171.
- Loh, C. G. (2012) 'Four potential disconnects in the community planning process', *Journal of Planning Education and Research*, 32(1), 33–47.
- Manaf, L. A., Samah, M. A. A. & Zukki, N. I. M. (2009) 'Municipal solid waste management in Malaysia: practices and challenges', *Waste Management*, 29(11), 2902–2906.
- Moh, Y. & Abd Manaf, L. (2014) 'Overview of household solid waste recycling policy status and challenges in Malaysia', *Resources, Conservation and Recycling*, 82, 50–61.
- Moh, Y. & Abd Manaf, L. (2017) 'Solid waste management transformation and future challenges of source separation and recycling practice in Malaysia', *Resources, Conservation and Recycling*, 116, 1–14.
- Mostafa, A. M. (2012) 'Quality of life indicators in value urban areas: Kasr Elnile Street in Cairo', *Procedia - Social and Behavioral Sciences*, 50, 254–270.
- Pew Research Center (2014) 'Spring 2014 global attitudes survey'. Pew Research Center. Retrieved, from <http://www.pewglobal.org/dataset/2014-spring-global-attitudes>.
- Ruth, M. & Franklin, R. S. (2014) 'Livability for all? conceptual limits and practical implications', *Applied Geography*, 49, 18–23.
- Sambasivan, M. & Soon, Y. W. (2007) 'Causes and effects of delays in Malaysian construction industry', *International Journal of Project Management*, 25(5), 517–526.
- Sanders, P., Zuidgeest, M. & Geurs, K. (2015) 'Liveable streets in Hanoi: a principal component analysis', *Habitat International*, 49, 547–558.
- Serag El Din, H., Shalaby, A., Farouh, H. E. & Elariane, S. A. (2013) 'Principles of urban quality of life for a neighborhood', *HBRC Journal*, 9(1), pp. 86–92.
- Shamsuddin, S. & Rashid, A. (2013). Malaysian urban rural national indicators network on sustainable development (MURNInets). In: *measuring sustainability and urban form across cities*. California: 43rd Annual conference of the urban affairs association, pp.1 -13. Retrieved from [https://s3.amazonaws.com/academia.edu/documents/31172747/murninets\\_edited\\_21\\_mac\\_2013pdf?awsaccesskeyid=akiaiwowyygz2y53ul3a&expires=1534312552&signature=4gy%2bnvaukfdkn9n7cg9emsjmqxu%3d&responsecontentdisposition=inline%3b%20filename%3dmalaysian\\_urban\\_rural\\_national\\_indicator.pdf](https://s3.amazonaws.com/academia.edu/documents/31172747/murninets_edited_21_mac_2013pdf?awsaccesskeyid=akiaiwowyygz2y53ul3a&expires=1534312552&signature=4gy%2bnvaukfdkn9n7cg9emsjmqxu%3d&responsecontentdisposition=inline%3b%20filename%3dmalaysian_urban_rural_national_indicator.pdf).
- Shekarrizfard, M., Faghieh-Imani, A. and Hatzopoulou, M. (2016) 'An examination of population exposure to traffic related air pollution: comparing spatially and temporally resolved estimates against long-

- term average exposures at the home location', *Environmental Research*, 147, 435–444.
- Shekarrizfard, M., Valois, M.-F., Goldberg, M. S., Crouse, D., Ross, N., Parent, M.-E., Yasmin, S. & Hatzopoulou, M. (2015) 'Investigating the role of transportation models in epidemiologic studies of traffic related air pollution and health effects', *Environmental Research*, 140, 282–291.
- Stegman, M. A. (1995) 'Recent US urban change and policy initiatives', *Urban Studies*, 32(10), pp. 1601–1607.
- Szołtysek, J. and Otręba, R. (2016) 'Determinants of quality of life in building city green mobility concept', *Transportation Research Procedia*, 16, 498–509.
- Tang, C. F. (2009) 'The linkages among inflation, unemployment and crime rates in Malaysia', *International Journal of Economics and Management*, 3(1), 50–61. Retrieved from <https://p dfs.semanticsc holar.org/1402/57a9bee42fba9c9aa49c3b7e200027b7b85b.pdf>.
- TomTom International BV (2016). *TomTom traffic index - Kuala Lumpur*. Retrieved from [https://www.tomtom.com/en\\_gb /trafficindex/city/ku ala-lumpur](https://www.tomtom.com/en_gb /trafficindex/city/ku ala-lumpur).
- Viglia, S., Civitillo, D. F., Cacciapuoti, G. & Ulgiati, S. (2017) 'Indicators of environmental loading and sustainability of urban systems. an emery-based environmental footprint', *Ecological Indicators*.
- Vincent, J. M. (2006) 'Public schools as public infrastructure', *Journal of Planning Education and Research*, 25(4), 433–437.
- Wang, J., He, T. & Lin, Y. (2018) 'Changes in ecological, agricultural and urban land space in 1984–2012 in China: land policies and regional social-economical drivers', *Habitat International*, 71, pp. 1–13.
- Zain, S. M., Basri, N. E. A., Basri, H., Zakaria, N., Elfithri, R., Ahmad, M., Ghee, T. K., Shahudin, Z., Yaakub, S. & Khan, I. A. I. (2012) 'Focusing on recycling practice to promote sustainable behavior', *Procedia - Social and Behavioral Sciences*, 60, 546–555.
- Zhu, J. (2017) 'Making urbanisation compact and equal: integrating rural villages into urban communities in Kunshan, China', *Urban Studies*, 54(10), 2268–2284.