

Developing Malaysia's Smart Community-Based Tourism Model

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ABSTRACT

Smart tourism is a 21st-century technological phenomenon where tourism suppliers and tourists are interconnected. The Malaysia National Tourism Policy's 2020-2030 concurs that one of the tactical strategies to increase visitor's economy in the rural areas is through 'digitalization'. Parallel to this, community-based tourism's (CBT) homestay programs have long been a government's endeavor in assisting rural tourism's economics. In heading towards smart tourism, CBT must be consistent with the progress. However, current investigation on CBT's readiness to accept smart tourism in Malaysia is still infancy. This is a proposed study with objectives to explore the concept of smart CBT within the Malaysian context, to investigate the readiness of CBT in Malaysia to adopt smart tourism, and to identify the strategies for Malaysia National Tourism Policy. The study will employ qualitative approach where semi-structured interview will be conducted with industry experts associated with tourism and homestays from different regions in Malaysia. The expected findings will establish the current setting of smart tourism in the CBT context, which will derive input for Malaysia National Tourism Policy.

Keywords: Community-Based Tourism (CBT), Homestay, Smart CBT, Smart Tourism

INTRODUCTION

Smart tourism is a 21st-century technological phenomenon where tourism suppliers and tourists are interconnected. Previously started with ICT, the technology has expanded to become 'smart' due to its breakthrough technologies in the field of Internet of Things (IoT), sensors, mobile applications, artificial intelligence (AI), big data and among others. The term 'smart' can be referred to technological, economic, and social development enriched by ICT revolutions that banks on sensors, data, new way of connectivity and exchange information (Gretzel, Sigala, Xiang & Koo, 2015). The application of smart has large influence on the tourism industry. Industrial examples can be seen by Air Asia, a Malaysian-based airline company is currently using artificial intelligent of chatbot name Ava to perform customer service. There also exists modern hotel that can deliver seamless check-in service where electronic key cards are directly sent to guest's smartphone (Ordóñez et al, 2020), and Busan City Tour in South Korea offer automated BUTI smart guide mobile apps where tourist can listen to local stories of attractions around Busan by using the apps. Smart tourism has changed the spectrum of how tourists or visitors manage and arrange their travel, whereas tourism suppliers are given more

choices in delivering information, product and services and shortened the supply chains. Smart tourism is a social phenomenon arising from incorporation of ICT with tourism experience (Hunter, Chung, Gretzel & Koo, 2015). Thus, the overall product of smart tourism is about giving experience to tourists upon visitation to tourism destination with the support of smart devices to co-create customized travel arrangements.

In Malaysia, the government have continually promoted the development of smart in tourism. In 2020, the Malaysian government has released the Malaysia National Tourism Policy 2020-2030 (NTP) as ten-year plan to strengthen the local tourism industry. One of the challenges faced by the tourism industry, which was addressed in the NTP is the over-reliance on traditional marketing. To overcome the challenge, the NTP has introduced transformation strategy to create digitalization and smart tourism. As cited in the NTP (2020), *“embracing whole spectrum of digitalization will provide the necessary tools for the tourism industry to be internationally connected, perform rigorous data analytics of tourism futures, and shorten supply chain”*. To achieve this, four strategic actions were identified in NTP in which one of the strategic actions is the needs to increase visitor economy to rural areas through digitalization.

Rural tourism has long been a Malaysian government’s endeavour in the NTP in which tourism is seen as mechanism to eradicate poverty and improve livelihood of the local people. Since 1995, the government has actively supported community-based tourism (CBT) in the rural areas through the development of homestay programs at various villages around Malaysia. Homestay is one of the most active CBT programs in Malaysia that involves participations of villagers in providing accommodations and programs for stay-in guests. CBT with community’s involvement has received attention by the government as means to alleviate the poor in the rural area (Kayat, Mohd Nor, & Idris, 2006). CBT needs the support and participation of local people and economically benefits the people living at or near the destination (Russel, 2000). Hence, the participation of homestay program operators in rural tourism activities in Malaysia is one of the government’s ongoing efforts to develop rural tourism to achieve the target of reducing economic disparities of rural and urban as well as empowering the village community (Yusof, Muda & Amin, 2013).

As the government would like to increase visitor economy to rural areas using smart tourism, few issues need to be address. Studies by Gan, Inversini and Rega (2016) indicated homestay in Malaysia has long marketed its homestay using own websites, Facebook and Agoda as marketing channel but lack in some expertise. One of the challenges faced by homestay owners are barriers to language as some of the websites are in native Malay language only. Hidayah and Suherlan (2020) and Cheuk, Atang, Lo, and Ramayah (2017) denote the problem of homestay owners in operating and maintaining websites of the villages due to lack of digital skills and awareness. There is also problem of digital divide in rural areas (Minghetti & Buhalis, 2010). Digital divides occur due to lack of stable connection and disconnect with non-rural community. This could happen due to geographical location of some of villages that is located at rural areas and possibly lacking in infrastructure.

From research perspective, due to smart tourism discipline that is still in its novelty phase, research on government policy is still limited (Ye & Ye, 2020). Most research are done based on consumer’s perspective on smart tourism rather than stakeholder or supplier’s perspectives. Furthermore, most of the research are concentrated in South Korea, United States and Europe (Ye & Ye, 2020). In the Southeast Asian’s context of smart tourism and CBT, the research area is still scant. Hence, in line with NTP that aims to develop smart tourism in rural destination, this study will fulfill the gap by conducting further research on smart tourism in the context of CBT in Malaysia. The fundamental investigation on CBT and smart tourism is a necessary endeavor as it will help understand the difficulties and needs faced by homestay owners in adopting smart tourism. Furthermore, the lack of policy direction in supporting CBT can become a limitation for development (Zielinski, Jeong, Kim, & Milanes (2020). The expected findings will establish current setting of smart tourism in the CBT context, which will derive input for Malaysia National Tourism Policy.

Therefore, the purpose of the study is:

- i) to explore the concept of smart CBT from the context of Malaysia
- ii) to determine the readiness of CBT towards smart tourism
- iii) to identify strategies for smart CBT that could be as reference for Malaysia National Tourism Policy.

LITERATURE REVIEW

Smart Tourism Definition

The term smart tourism has thoroughly been discussed since 2015. It was continuously defined that smart tourism refers to “*the state-of-the-art technology guaranteeing the sustainable development of tourist areas, accessible to everyone, which facilitates the visitor’s interaction with and integration into his or her surroundings, increase in quality of the experience at the destination, and improve resident’s quality of life*” (Lopez de Avila, 2015; Gretzel, Reino, Kopera & Koo, 2015). Smart tourism ground comes from the use of smart technology to connect, interact, and deliver services to visitor and create destination experience. The smart technologies used should provide valuable and real-time data, connected everywhere such as ubiquitous wi-fi, smart phones connectivity, radio frequency identification (RFID), data mining and other sophisticated technology.

Apart from technology-driven, smart tourism consists of three components that are supported by ICT, which are smart experience, smart business ecosystem and smart destination. Smart destination refers to smart cities located in urban or rural areas that considers the need of residents and tourists to support mobility, resource availability and allocation, sustainability, and quality of life (Gretzel et al, 2015). The crucial aspect of smart destination is to incorporate ICT with physical infrastructure. The smart experience components use technology to facilitates tourist’s experience and using personalization, context awareness and real-time monitoring (Buhalis & Amaranggana, 2015; Gretzel et al, 2015). This means smart tourist uses smart phone to obtain information at destination so that they could receive real-time information and co-create their tourism experience. Whereas smart business is a complex business ecosystem that creates and support touristic resources and the co-creation of tourist experiences (Gretzel et al, 2015). The smart business ecosystem stakeholders would include collaboration between business and government who will work together in creating and delivering infrastructure required in smart tourism. Making the government to be more open towards technological changes. With three components becoming the layers in smart tourism, it is evident that tourism uses technology to mediate experience for tourist. In another word, the overall idea of smart tourism is that it is when “*smart phone replaces printed map, tour guide and visitor’s centre, which greatly augment(s) (tourist) experience at destination*” (Aziz, 2019).

Countries like South Korea, China and Finland been developing smart tourism through its chosen smart city (Gretzel & Koo, 2021; Lee, Hunter & Chung, 2020; Sotiriadis, (2022)). South Korea is well known for its smart city project in Seoul, Busan, and Jeju. Some of its initiatives are expanding the Wi-Fi spaces, fibre optics networks around the cities and creating Smart Tour Guides application for its Bukchon Hanok Culture Village attractions (Lee, Hunter & Chung, 2020). For Helsinki, the city has won 2019 European Capitals of Smart Tourism Awards. The city has developed Smart Tourism Roadmap where they collaborate between stakeholder and local community. Some of the initiatives include providing access to local transportation using local apps and the launching digital service of My Helsinki that give access to tourist information about the city. The contents are generated by locals, the information is based on three databases that features activities, locations, and events. Hence, tourist can access information on the city by using the single apps. In the era of IR 4.0 and smart phone, smart tourism is an integral part of destination. It merely changes how tourists connects and experience destinations, making it an important part of development in countries around the world.

Smart Tourism in Malaysia

Malaysian government's official smart tourism initiatives started in 2018 when the government launched the IR Industry 4.0's ten-year roadmap (MEDC, n.d.). Prior to that, the government has always supported digitalization in the tourism industry through development of ICT. However, with the advancement of smart technology, with 20.9 million smart phone users in Malaysia in that year, and the high internet penetrations that covers 90.1% of the population (MEDC, n.d.); the government initiated smart tourism roadmap to transform the industry. A study by Monitor Deloitte states "*smart tourism has the potential to increase Malaysia's tourism revenues from the current USD25 billion to USD100 billion by the year 2030*" (Malaysia Investment Development Authority, 2020). Through this roadmap, several actions will be taken to achieve smart tourism including investment on hard and soft infrastructure such as data acquisition, content creation and online platform. The former Prime Minister of Malaysia, Tan Sri Dr Mahathir Mohamad highlighted that industry stakeholders are venturing more and actively into sharing economy, digital platform, social media integration and big data analytic to customize tourism experience offering to specific demographic across the globe (Borneo Post, 2019).

Before the COVID-19 Pandemic, Tourism Malaysia, a governmental agency of Ministry of Tourism, Art, and Culture (MOTAC) launched the Malaysia Smart Tourism 4.0 platform as means to tap inbound market for 'Visit Malaysia 2020' campaign. Chan Ho Mun, the deputy director for Promotion Division from Tourism Malaysia, posited that smart tourism is a key thrust to increase tourism-based receipt especially from growing independent traveller (Aman, 2019). One of the government's plans in smart tourism is to attract China's market for Malaysia's inbound tourism. China is Malaysia's third biggest inbound market after Indonesia and Singapore (Aman, 2019). Hence, with the launching of Malaysia Smart Tourism 4.0 platform, Tourism Malaysia collaborated with two China-based internet company to create digital marketing to promote Malaysia's tourism industry by reaching out to China's internet users. Tencent Holding, a China-based digital platform, will create marketing where videos of tourism attractions in Malaysia are posted on its platform, giving access to 980 million Chinese users (Vision KL, 2018). Mafengwo, a Chinese travel service and social media platform will assist tourism players by creating rich travel contents and build localized marketing in Malaysia for Chinese travellers (Aman, 2019). The digital collaboration was effort made by the government to increase market share in tackling China's 1.4 billion population. Tourism Malaysia also collaborated with Expedia Group, an online travel agent (OTA) platform to tackle other inbound markets from Australia, Japan, and United States. As part of the collaboration, Expedia Group will promote attractions and accommodations to its 750 million monthly website visitors. The collaboration also sees knowledge transfer from Expedia Group to partnering hotels by organizing workshops on digital innovation and skills for the latter (Puvaneswary, 2019).

In 2021, the government-agency of Tourism Malaysia has revamped its website by releasing "Interactive Digital Brochure". Users can virtually interact and explore destinations in Malaysia from the microsite digital brochure as compared to before. The Minister of Tourism, Culture & Art, Dato Sri Nancy Shukri stated that the new digital brochure is mobile-responsive and has multi compatibility features that can be viewed using various devices from phones, tablet, and laptop (theVibes.com, 2021). The microsite covers five brochure themes including Kuala Lumpur, Langkawi, beach and island, adventure, and nature. The revamp is in conjunction with NTP 2020-2030.

Smart tourism continues to be an important milestone for the Malaysian tourism industry and the world. Furthermore, with the post Covid-19 pandemic, digitalization becomes double importance as where there is increased use of digital tech and apps as more products and services are provided through online (MDEC, n.d.)

National Tourism Policy 2020-2030 on Smart and Rural Tourism

The NTP 2020-2030 was launched on the 23rd December 2020 to ensure the continuity of the tourism industry during post pandemic and to make Malaysia a preferred destination. Some of the key approaches of NTP is to address tourism recovery based on new norms, strengthening competitiveness, sustainable and inclusive tourism development, and disaster risk management (Malaysia Investment Development Authority, 2020). The NTP has outlined some transformation strategies for the tourism industry. Hence, the theme 'embrace smart tourism' was addressed as the 3rd transformation strategy with four accompanying tactical plans. One of the four tactical plans in the NTP include "*leverage on sharing economy to innovate the informal sector and rural tourism*" and "*increase visitor economy of rural areas through digitalization*". Two of the four tactical plans have continuously directed the necessity for digitalization to reach rural tourism.

In Malaysia, rural tourism has long been government's foray where necessary tourism development was thoroughly addressed in the Ninth and Tenth Malaysia Plan, and the National Tourism Policy. Some of the issues addressed in previous policies include to reduce poverty among rural community and empower rural communities through rural activities (Yusof et al, 2013). Hence, one of the main rural activities in tourism that is supported by the government is the community-based tourism through the activity of providing homestays. The latest NTP transformation strategy in developing smart tourism into rural tourism is a game changer for the rural communities in how the community, especially those involved in homestay will operate and do marketing using smart technology.

Community-Based Tourism in Malaysia and Homestay Program

CBT is an alternative form of tourism development that concentrates on community participation in all processes from idea formulation to planning, implementation, management, monitoring, evaluation, and benefit sharing (Schott & Nhem, 2018). CBT was primarily created as means to alleviate poverty especially in rural community by allowing the members to be collectively involved in tourism enterprises. By utilizing community's resources, the members co-create experiences to the visiting tourists.

In Malaysia, CBT has been associated with homestay programs. According to Tourism Malaysia (2020), Malaysian homestay operators provide tourist to stay at *kampung*-style accommodation where visitors can experience first-hand village living by the homestay owners. Accommodation can generate active participation for local people in the tourism industry. Local communities can foster and share their culture and customs with the tourists by homestay accommodation program (Bhuiyan, Siwar, Ismail & Islam, 2012). Apart from providing accommodation, the villagers are also bound to serve tourists with traditional activities such as serving traditional food, demonstrating traditional songs and dances, visiting orchards and farms, among others.

Homestay program first commenced in 1995 under Malaysia's Rural Tourism Master Plan with aim to increase participation of rural community in tourism, reduce movement of young rural folks to city, and provide source of income. The programs had been successful where it was niched towards group market especially from Japanese school children's exchange program (Razzaq, Hadi, Mustafa, Khalifah & Mohamad, 2011). The program was collectively initiated by four government agencies including Ministry of Rural & Regional Development (MRRD), Ministry of Tourism, Ministry of Agriculture, and Institute for Rural Advancement. However, the main responsibilities of promoting and monitoring of homestay program is under Ministry of Tourism. In 2020, there are about 219 registered homestay programs throughout Malaysia (Ministry of Culture, Art & Tourism, 2020). In Penang state,

despite the Covid-19 pandemics, the Malaysia Homestay Programme was still able to receive RM64,507 in revenue from January to October 2020 (Sharma, 2020). The lucrative economic revenue earned by homestay owners proved the importance of homestay programs towards the local economy and thus, should be deemed continued by the community members.

Smart Community-Based Tourism

The study on smart tourism within the context of CBT in Malaysia is still scant. Amir, Dura, Yusof and Nakamura (2020) studied smart tourism challenges in Malaysia found that not all tourism business and operators provide smart tourism services and applications. However, this study is only limited to tourist perspectives rather than stakeholders. A study conducted by Cheuk et al (2017) on smart CBT only limited towards how homestay owners market their businesses using ICT websites and Facebook. In Malaysia, government has developed physical infrastructure and ICT in rural area to allow the community to reach with outside world (Cheuk et al, 2017). Gan, Inversini and Rega (2016) found problem faced by homestay owners in operating digital marketing include language barriers on website, and the needs to coordinate with villagers before they can cater for tourist that wants to stay at the homestay. Cheuk et al. (2017) posited some of the challenges of ICT faced by community in Ba'kelalan, Sarawak including website that has not been updated, non-utilised website where promotions were mainly from word-of-mouth rather than digital means. In Indonesian setting, similar studies can be found by and Jannah, Chozin and Anggara (2019) and Hidayah and Suherlan, (2020). Hidayah and Suherlan (2020) assert in their studies that readiness of homestay destination depends on the synergistic efforts of all parties including providing access and infrastructures, training, and awareness programs with tourism stakeholders.

Smart tourism involves smart technology that operates on a different level from ICT. With the government's latest policy on leveraging sharing economy to rural areas, and increase visitor to rural areas through digitalization, it poses a new area of study in smart tourism context. Focus should be on the homestay owners on their readiness in implementing smart tourism in their CBT. Understanding on the homestay's perspectives should shed lights on how the policy can be achieved by the year 2030.

METHOD

A qualitative research approach will be adopted for this study. For this study, the researcher will use the personal (one to one) in-depth semi-structured qualitative interview format. This approach involves one to one meeting between the researcher and the respondents in the study area. Researcher has a list of predetermined questions to be asked to the respondents. The questions are open-ended, and the interview is informal and semi-structured in nature. The research samples will include an expert from Malaysia Ministry of Tourism, Culture and Arts (MOTAC), representative from Homestay Association of Malaysia, chairman of homestay program from each state in Malaysia. According to MOTAC, there are 14 homestay chairmen representing each state in Malaysia. Besides that, two active homestay operators from selected states in Malaysia, namely Kedah, Penang, Selangor, Negeri Sembilan, Melaka, Johor, Pahang, Kelantan, Sarawak, and Sabah will be chosen to participate in the interview session. Active operator is referring to the homestay that has been actively receiving tourists over the period. The academic expert and industry practitioners also will be interviewed. Among the main issues that will be explored include the definition of smart tourism from the perspective of tourism community in the rural area and their readiness in adopting such technology. Apart from that, the expert interview from MOTAC and academician will further discuss on what are the strategies and action plan that can be executed to the community-based tourism in Malaysia. They were considered as an expert in their field as they possess a high degree of knowledge about the study areas (Trinczek, 2009).

Even though there is no specific number of samples required for qualitative study, this study attempts to interview at least 46 informants. 14 homestay chairman, 28 active homestay operators, 2

representatives from MOTAC and Homestay Association, and 2 academic experts have been identified as participants. Nevertheless, if there is a new theme emerged, the data will be further collected until it is saturated. The interviews will be audiotaped where the data will be analyzed using Atlas.ti software and MAXQDA analytics pro software. A qualitative expert will be appointed to review the data to ensure the validity of the finding and a member checking procedure will be conducted with the informants to increase trustworthiness. Furthermore, data triangulation, and prolong engagement also will be carried out to determine the reliability of the findings (Creswell & Miller, 2000).

In search for a research problem and research question, the researcher will conduct few initial interviews with the samples. The initial interview will be conducted before the actual interview. There are two actions that need to be taken into consideration when sampling in the qualitative method (Miles & Huberman, 1994). Firstly, the researcher should set boundaries to define aspects of the cases or subjects that the researcher wants to study within the time and resource limits and connect the research directly to the research questions. Secondly, the researcher needs to create a frame to help uncover, confirm, and qualify the basic constructs on which the study is based. The purpose of the study and the research question developed from the initial interview help set the boundaries for sampling decisions and the samples chosen for this study are believed to be the experts in an area or privileged witnesses to the event. It is important to note that in qualitative sampling, the information is the important point and not the number of people. The selection of the sample in this study will be determined by a purposive sampling method and the sample will be approached based on snowballing techniques.

The recruitment of respondents during the initial interview will be initially done by purposive sampling. This technique will be used because it is important to recruit individuals with appropriate knowledge and expertise. Suri (2011) noted that the aim for purposive sampling is to gain a greater understanding or insight into the phenomenon under investigation. This is unlike empirical generalization, which is the aim of studies using randomized samples of study population. In this study, the first sample are the Senior Officer from MOTAC, president of Homestay Association and Homestay's Chairman. They are believed to acknowledged with information on the concept of smart community-based tourism that can lead to the understanding of the strategies and action plan needed. During the initial interview, these representatives will lead the researchers to the subsequent participants in this study for an interview session in Stage 2. Selected active homestay owners and academic expert will be interviewed during Stage 2.

The model of smart community-based tourism will be developed based on the data analysis collected. The process of developing the model will be based on interviewed data collected is referred to theoretical sampling, as well as document analysis to support fundamental model. During the initial interview (Stage 1), snowball sampling technique will be used for the study to determine the samples in Stage 2. Snowballing allows for potentially better insights into the issues being investigated. The snowballing process for this research began in the first fieldwork where relevant representatives were identified using strategies such as suggestions from the samples and authorities contacted. The first successful interviews often provided the information and the opportunity to snowball the next persons, either in the same organization or in different one. The stages of the methodology will adhere to the five different stages.

Stage 1: Literature Review, Initial Review and Establish Contact with Sample

An observation will be conducted in several homestay program in Penang, Melaka, Johor, Sarawak, and Sabah as homestay is one of the good examples of community-based tourism application in Malaysia. Initial interview with the samples will guide researcher in identifying the actual problem and research questions. Moving forward, the related literature will be reviewed concurrently using desk research/document review approach. This involves a review of literature related to smart community-

based tourism and homestay program, relevant government policies as well as data based on secondary sources such as reports, publication, and previous related documents.

Stage 2: Development of Interview Guide

A set of interview guide with semi-structured interview questions will be developed based on data obtained from Stage 1.

Stage 3: Data Collection

Sample size will be determined based on Stage 1. An in-depth (one-to-one) interview with semi-structured questions will be asked to the selected samples to ascertain the justification of their view of what smart community-based tourism should be for Malaysia context. In this stage, phenomenology study will be applied as the sample will answer the interview question based on their life's experiences. The data collection for this study is expected to complete within six months.

Stage 4: Data Analysis

Thematic analysis will be applied for this study. The raw qualitative interview data will be transcribing word by word before importing to a qualitative software for coding and theme.

Stage 5: Conclusion, Recommendations and Future Research

A final write up will comprise of finding, overall conclusion, recommendation, and implication of the study and suggestion for future research.

EXPECTED RESULT

The expected result will establish the readiness, potentials and grousers faced by CBT towards smart tourism. It will help to formulate a model for smart CBT in Malaysia. Thus, this is aligned with Malaysian's government vision of 'Shared Prosperity Vision 2030' and restructuring Malaysia's Development Priorities, which are under KEGA 3 (Industrial Revolution 4.0 as move towards smart community) and KEGA 15 (Malaysia Truly Asia, the smart community-based tourism). It is also at par with Sustainable Development Goals 11 on Sustainable Cities and Communities.

IMPLICATION OF THE STUDY

The model developed from the findings will bring practical benefits towards the community, government, and academicians. From the community's perspectives, the study will allow the community to recognize approaches that can be undertaken to adopt smart tourism. The knowledge obtained will provide an understanding on each community's current position (such as their strength and grousers) which can assist them for 'readiness' to apply smart tourism. Thus, the empowerment of the local community on smart tourism knowledge will help leverage their skills in using smart phone to improve their business through smart tourism. It will also allow them to market their community-based tourism business better, and thus contributes to the local economy. The local government can identify the current needs and shortcomings faced by the communities (such as infrastructures, facilities, and

knowledge) in implementing smart tourism into community-based tourism. Finally, the study of smart tourism on community-based tourism is 21st-century knowledge that has not been fully studied. The findings on these two interchangeable areas will significantly contribute towards new academic theories in the field of tourism management and smart technology.

CONCLUSION

The study on smart tourism juxtaposed with CBT in Malaysia is limited as the only few studies can be found in Indonesian and Malaysian context. Hidayah and Suherlan (2020) studied the readiness of homestay where smart tourism is expected to help leverage the homestay business in the village. Studies by Jannah, Chozin and Anggara (2019) investigates how *Pokdarwis*, a tourism conscious group to solve sustainability of Paranghitis Sand Dunes through smartness such as smart economy, smart people, and smart people. In Malaysian context, a study on community-based tourism and ICT was previously conducted by Gan, Inversini and Rega (2016) where it was found conventional online booking via search engine is unsuitable to be used as sales channel due to the unique nature of homestay operations. Furthermore, Ye, Ye and Law (2020) suggested that research on government policy with smart tourism is still scant. In terms of country of reference, Malaysia still requires more studies on smart tourism within the local context as majority of studies are based in Europe, North America, and South Korea. Hence, the current study intends to undertake qualitative research where in-depth knowledge can be gathered on smart CBT. However, the scope of the study will only be limited to active homestay operators that are registered with MOTAC.

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AUTHORS' CONTRIBUTION

Azmi, A. conceived the research ideas and planned for the methodology and data collection for future research. Ahmad, J. A. took the lead in writing the manuscript. Both authors work together to ensure the ideation for the manuscript are fit for publication.

CONFLICT OF INTEREST DECLARATION

We certify that the article is Azmi, A. and Ahmad, J.A. original work. The article has not been published elsewhere nor it is under consideration for publication for other journals. We testify that both authors have contributed significantly to the manuscript for the submission of Jurnal Intelek. There is no conflict of interest in the subject matter discussed in this manuscript.

REFERENCES

- Aman, A.S. (2019). Tourism Malaysia to promote smart tourism via mafengwo. New Straits Times. <https://www.nst.com.my/business/2019/11/536343/tourism-malaysia-promote-smart-tourism-mafengwo>
- Amir, S., Dura, N.H., Yusof, M.A., Nakamura, H. & Abu Nong, R. (2020). Challenges of smart tourism in Malaysia eco-tourism destinations. *Journal of Malaysian Institute of Planners*, 18 (4), 442-451
- Aziz, S. (2019). Being smart about tourism. Wief Foundation. <https://infocus.wief.org/being-smart-about-tourism/>
- Buhalis, D., & Amaranggana, A. (2013). Information and communication technologies in tourism 2014. Information and Communication Tech
- Bhuiyan, M.A.H., Siwar, C., Ismail, S.M. and Islam, R. (2011). The role of home stays for ecotourism development in East Coast Economic Region. *American Journal of Applied Sciences*, 8, 540-546
- Cheuk, S.C-S., Atang, A., Lo, M-C, & Ramayah, T. (2017). Community perceptions on the usage of digital marketing for homestays: The Case of Ba'Kelalan, Malaysia. *International Journal of Business Society*, 18 (4), 775-782.
- Creswell, J. W., & Miller, D. L. (2000). Determining validity in qualitative inquiry. *Theory into practice*, 39(3), 124-130.
- Gan, S.W., Iversini, A., & Rega, I. (2016). Community-based tourism and ICT: Insights from Malaysia. E-Review of Tourism Research. ENTER 2016 Short Papers, Volume 7
- Gretzel, Reino, Kopera & Koo (2015). Smart tourism challenges. *Journal of Tourism*, XVI (1), 42-47
- Gretzel, U., Sigala, M., Xiang, Z. & Koo, C. (2015). Smart tourism: Foundations & development. *electron markets*. 25, p 179-188.
- Gretzel, U., & Koo, C. (2021). Smart tourism cities: a duality of place where technology supports the convergence of touristic and residential experiences. *Asia Pacific Journal of Tourism Research*, 26(4), 352-364.
- Hidayah, N., & Suherlan, H. (2020). Smart tourism: Aksentuasi Kesiapan Homestay di Kawasan Ekonomi Khusus Tanjung Lesung, Pandeglang. *Media Wisata*, 18 (1).
- Hunter, W.C., Chung, N., Gretzel, U & Koo, C. (2015). Constructivist research in smart tourism. *APJIS* 25, 105-120.
- Interactive Digital Brochures Gives Tourists New Ways to Explore Attractions (2021, April 20). theVibes.com. <https://www.thevibes.com/articles/news/24609/interactive-digital-brochures-gives-tourists-new-ways-to-explore-attractions>
- Janah, M., Chozin, M. N. & Anggara, Z. (2019). Smart community based tourism (SCBT) sebagai upaya optimalisasi pengelolaan wisata gumuk pasir parangtritis. *Jurnal Imiah Penalaran dan Penelitian Mahasiswa*, 3 (1).
- Kayat, K., Mohdnor, N.A. & Idris, M.A. (2006). Kemahiran keusahawanan dan keperluannya dalam pembangunan homestay: Implikasi terhadap polisi pelancongan. *Keusahawanan Pelancongan: Potensi & Isu-Isu Semasa*, Sintok, Penerbit Universiti Utara Malaysia.
- Lee, P., Hunter, W. C., & Chung, N. (2020). Smart tourism city: Developments and transformations. *Sustainability*, 12(10), 3958.
- Lopez D Avila, A. (2015). Smart destination: XXI century tourism. ENTER 2015 Conference on Information and Communication Technologies in Tourism, Lugano, Switzerland, February 4-6, 2015.
- Malaysia Investment Development Authority (2020). Smart Tourism: Future of Tourism in Malaysia. <https://www.mida.gov.my/smart-tourism-future-of-tourism-in-malaysia/>
- Malaysia National Tourism Policy 2020-2030 (2020) https://www.tourism.gov.my/files/uploads/Executive_Summary.pdf
- Malaysia Taps Digital Technology in Tourism Development-Mahathir. (2019, August 26). The Borneo Post. <https://www.theborneopost.com/2019/08/26/malaysia-taps-digital-technology-in-tourism-development-mahathir/>

- MDEC (n.d). Digital Economy in Tourism Sector in Malaysia. Conference on Future Work of Tourism Sector in Malaysia (Post Covid-19).
<https://www.ilmia.gov.my/images/newsandevents/2020ConferenceFutureOfWork/Pembentang3.pdf>
- Minghetti, V. & Buhalis, D. (2010). Digital divide in tourism. *Journal of Travel Research* 49 (3), 267-281
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook*. Sage.
- Ministry of Tourism, Culture and Art (2020). Laporan Statistik Program Pengalaman Homestay Malaysia. <http://www.motac.gov.my/en/download/category/11-homestay>
- Ordóñez, M., Gómez, A., Ruiz, M., Ortells, J.M., Niemi-Hugaerts, H., Juiz, C., Jara, A. & Butler, T.A. (2020). *IoT Technologies & Applications in Tourism and Travel Industries*. River publishers. https://www.riverpublishers.com/pdf/ebook/chapter/RP_9788770221955C8.pdf
- Puvaneswary, S. (2019, August 22). Tourism Malaysia teams up with expedia in destination promotions. *TTG Asia*. <https://www.ttgasia.com/2019/08/22/tourism-malaysia-teams-up-with-expedia-in-destination-promotion-efforts/>
- Razzaq, A.R.A, Hadi, M. Y, Mustafa, M.Z, Hamzah, A., Khalifah, Z., & Mohamad, N. H. (2011). Local community participation in homestay program development in Malaysia. *Journal of Modern Accounting & Auditing*. 7(12), 1418-1429.
- Russell (2000). Community based tourism. *Travel & Tourism Analyst*, 5, 89-116.
- Schott, C. & Nhem, S. (2018). Path to the market: Analysing tourism distribution channels for community-based tourism. *Tourism Recreation Research*, 43 (3), 356-371.
- Sharma, M.S. (2020). Bright Future for Homestay Programme. *The Star*.
<https://www.thestar.com.my/metro/metro-news/2020/10/22/bright-future-for-homestay-programme>
- Suri, H. (2011). Purposeful sampling in qualitative research synthesis. *Qualitative research journal*.
- Sotiriadis, M. (2022). Smart Tourism in Practice: The EU Initiative “European Capitals of Smart Tourism”. *Études caribéennes*, (51).
- Tourism Malaysia (2020). Homestay. <https://corporate.tourism.gov.my/niche/homestay>
- Tourism Malaysia Launches Smart Tourism 4.0 (2018, April 5) *Vision KL*.
<https://www.visionkl.com/tourism-malaysia-launches-smart-tourism-4-0/>
- Trinczek, R. (2009). How to interview managers? Methodical and methodological aspects of expert interviews as a qualitative method in empirical social research. In *Interviewing experts*, Palgrave Macmillan, London.
- Ye, B., Ye, H. & Law, R. (2020). Systematic Review of Smart Tourism Research. *Sustainability* 2020, (12).
- Yusof, Y., Muda, S. & Amin, W.A. (2013). Rural tourism in Malaysia: A homestay program. *China-USA Business Review*, 12 (3), 300-306.
- Zielinski, Jeong, Kim, & Milanes (2020). Why community-based tourism and rural tourism in developing and developed nations are treated differently? A review. *Sustainability*, 2(5938) 1-20.