

# Community Based Tourism and ICT: Insights from Malaysia

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## Abstract

Tourism generally brings positive change to rural tourism communities through economic diversification and heritage preservation. However, these communities are often disconnected and experience digital divide due to unreliable connectivity and detachment from urban realities. This research tracks the development of the types of information and communication technology used by a community based tourism initiative and explores the role of technology in empowering business, highlighting the contribution of technology in strengthening the infrastructure for communication and marketing of the destination. The study concludes by identifying barriers to full adoption of ICTs in the context of this unique tourism product.

**Keywords:** ICTs adoption; community-based tourism; Malaysia.

## 1 Introduction

While tourism brings positive change to rural communities through economic diversification, improvement in infrastructure and preservation of natural and cultural heritage (Herrero & San Martín, 2012), rural economies often experience a digital divide (Minghetti & Buhalis, 2010) - the lack of a stable connection as well as a disconnect with the non-rural realities. The internet can give rural tourism enterprises a global presence by defining their virtual size (Spencer, Buhalis, & Moital, 2012) and by offering selling channels that rely both on third-party distribution partners (Gazzoli, Kim, & Palakurthi, 2008) and websites. It is at a community level that the proper use of the internet can generate a paramount impact through socio-economic development (Inversini, Rega, Pereira, & Bartholo, 2015). This study investigates the process through which information and communication technologies (ICTs) empower a community-based tourism enterprise (CBT) known as Homestays in rural Malaysia to connect at a global scale and enhance its marketing and promotion, resulting in economic development. It also explores the barriers preventing a full-fledged adoption of ICTs in the management of this destination.

## 2 Literature

### 2.1 Community Based Tourism

The seminal work of Murphy (1985) highlighted the importance of community involvement in tourism to generate and sustain socio-economic development. CBT is recognised as a viable rural development strategy (Tolkach & King, 2015), emphasizing active community participation in all tourism activities (hosting tourists

in their homes, managing activities of interest to tourists) to ensure economic and social returns to the locals, alleviate poverty (Zapata, Hall, Lindo, & Vanderschaeghe, 2011) and address the controversial effects of host community exploitation in many rural destinations. However, rural and community based tourism often experience a digital (and sometimes physical) divide (Minghetti and Buhalis, 2010).

## **2.2 ICT adoption in tourism**

What is clear is that the rise of the internet brought unprecedented opportunities at promotional and selling levels for the whole tourism industry (e.g. Gazzoli et al., 2008). Even though it is acknowledged (e.g. Law & Jogaratnam, 2005) that the process of adoption has been slow, tourism and hospitality managers now understand the strategic importance of this communication and selling channel (Card, Chen, & Cole, 2003). For CBT initiatives, ICTs enable them to (i) efficiently manage the ever increasing amount of information needed to effectively run tourism businesses; (ii) be globally present through their 'virtual size' (Spencer et al., 2012), and (iii) enable the marketing and selling of tourism products on the internet (Werthner & Klein, 1999). Additionally, as modern travellers are exigent travellers (Buhalis & Law, 2008) and always connected to the internet (Gretzel, Fesenmaier, & O'Leary, 2006), CBT firms need to be present to maintain their relationship with the customer.

Whilst a large body of literature has focused on the use and adoption of ICT in tourism (e.g. Card et al., 2003) there are few studies to date that investigate the use of technologies by tourism firms in developing economies which focus on community based tourism (Inversini et al., 2015 - socio-economic impact). Studies on local adoption of ICTs in CBT initiatives in developing and emerging economies and its impact at community level have so far not been done. By adopting a case study approach with a socio-technical lens, this research will critically present the development and impact of ICT adoption in a small CBT initiative in Malaysia.

## **3 Research Design and Data Collection**

This exploratory research adopts an interpretive perspective within the tradition of qualitative research in information systems (Orlikowski and Baroudi, 1991), using a descriptive single case study methodology to (i) investigate the development of ICT adoption and its impact on the CBT site, (ii) compare the scenario before and after the proliferation of the internet in terms of technological adoption and (iii) identify the role of technology in changing the infrastructure for communications and marketing. The Homestay was chosen because of its bottom-up approach (Zapata et al., 2011) with a high level of community participation (Murphy, 1985) and its apparent web-presence, to facilitate the study of ICT adoption, a key component of which is the use of the internet. Data was collected through an extended in-depth open-ended elite interview (a term given for interviews with a person of having a unique role and can provide distinctive insight or information covering the whole set of issues and not likely to be obtained from other sources - Yin, 2012) –with the pioneer, champion and manager of the Homestay (P1). This is supplemented by a shorter interview with a Homestay entrepreneur, P2 who has had 10 years of experience. Triangulation with photographic and printed materials, web information and observations of the researcher was done to enhance the robustness of the findings of a case study (Yin,

2012). Data was analysed inductively and coded in a chronological manner whenever a key development in ICT adoption is identified. Data was then categorised and assigned to these codes, which referred to the different stages of ICT access and use as detailed in Figure 1 (Stages 1 to 5) below.

	ICT Access and Use	Marketing Tools	Key Development
1996-2000 Stage 1	No Internet access, Telephone, fax	Printed brochure Television & Radio Roadshow & MATTA Fair	
2000-2004 Stage 2	Internet to rural area, Telephone, fax	Printed brochure Television & Radio	2000 – promotion through journalists on site, roadshow with Tourism Board
2005-2008 Stage 3	Connection speed up, Telephone, fax, Blog, Computer, e-mail	Blog Roadshow	2005 – Online Presence first established
2009-2010 Stage 4	Broadband, Smartphones, Website	Tourism Board website Destination Website Homestay Association	2009 – Link Tourism Board Website, 2010 – Website
2010-2015 Stage 5	Mobile Broadband, Smartphones, Website, Social Media	Destination & Tourism Board website, Agoda, Facebook Annual Homestay Carnival	2010 – Facebook page, WhatsApp & WeChat, Online booking (some sites)

Fig. 1. Trend of ICTs adoption in the CBT destination

## 4 Results

### 4.1 ICT adoption at the destination

**Before: the pre-internet era.** When the Homestay started in 1996, the internet had not yet penetrated rural Malaysia. The Homestay was managed for about eight years through intermediaries and conventional marketing and promotion activities (Stage 1). P1 stated that, promotion was done “with brochures, exhibition, MATTA Fair (*Malaysian Association of Tour and Travel Agents*), roadshows, through the normal existing channels”. In the early years, the development of tourism was lacklustre. P1 stated that “we started with 500 guests in the first year. From 1996 to 2005 (in 2000 there was already the internet, but very slow, dial-up only) [Stage 2], the tourists were very few because we have only promotion through print media, tv and radio.... One year maximum was 4000”. This shows that while tourism can be an economic driving force in developing countries as opined by Sireyjol (2010), its full potential here has been hampered initially by a lack of access to ICTs (Minghetti & Buhalis, 2010).

**After: the post internet era.** With the increase in the speed of internet connection from 2005, the Homestay established its first online presence with a blog (Stage 3). This, together with information in the Malaysian Tourism Board website from 2009, enabled the Homestay to use the internet “more for promotion. For booking, tourists had to call, email or fax”, according to P1 (Stage 4). Important technologies which helped him manage the homestay were the smartphone and mobile internet, which became prevalent since 2009.

**Current practice.** According to P1, since 2010 the Homestay has advanced its adoption of ICT for tourism by using “Agoda... We use our website, blog, facebook page”. An interesting finding is that online booking (via Agoda) while practiced by

the Homestay, only relate to peripheral accommodation (chalets) set up by the villagers to supplement the Homestay accommodation. In explaining the difference between Homestay accommodation and chalets, P1 stated that: *“Villagers who are unable to do homestays, will built chalets...the 15 homestay operators are not chalet owners. The building of chalets is a result of the development of tourism here. These are not the core Homestay group... If we have additional visitors, we will hand over for them (chalet managers) to manage. But those who live in the chalets can also join the Homestay activities”*.

This small tourism entrepreneur has leveraged digital technologies to create their ‘virtual size’ (Spencer et al., 2012) to reach a much larger market. It is operating beyond its optimal capacity by using the internet for marketing and distribution (Card et al., 2003). As commented by P1: *“the number of tourists then increased. We had to limit it to 5000, but often it goes over the limit, until 7000 pax. We have to look at our capacity”*. It has also fostered socio-economic development of this rural community, as stated by P2: *“Before Homestay, from the paddy field we get about RM4000 to RM5000 per year. Some additional income comes from other work outside the paddy field (before harvest), can reach RM10,000. Now, with the paddy field, and homestay, I don’t do other work outside. A year, estimate...RM20,000”*. It is clear that P1 appreciates the advantages of the internet for he says that *“the internet enables promotion, and communication. Internet is very important. Without the internet, we would have to resort to do many roadshows...”*.

#### **4.2 Barriers to adoption**

While the internet is recognized as a crucial success factor of the Homestay, it is noted that the use of internet to create a global presence (Gretzel et al., 2006) has not been fully achieved by this Homestay because the website is currently in the Malay Language, making it accessible only to a small section of the global market. As such, the arrival of foreign tourists (40% of the total guests) is still reliant on third-party distribution partners as suggested by (Gazzoli et al., 2008). According to P1, *“for those from outside Malaysia, travel agents will call the Homestay and make bookings. Agents will also promote...”*. Another barrier is that the nature of this type of community-based tourism makes online booking rather cumbersome to operationalise. As explained by P1, *“for Homestay, it is not like hotel. If there are visitors wishing to come, we have to discuss with the hosts. Because this is on a voluntary basis, sometimes the hosts agree, when they are available. Sometimes they have to decline if ...they are occupied. .... For me, to book, the internet can play the main part. If we can do like Agoda, then they can book online. We can do like this through internet for some packages. Not all packages can work in this way. Those that need off-line communication like co-ordination with villagers, then, we cannot use this”*.

## **5 Conclusion**

The case study has highlighted the central importance of ICT for CBT to enhance its marketing and distribution reach, enabling it to attract tourists of up to 140% its optimal capacity. With relevant skills training in language, the destination can achieve global presence to fully leverage the potential of the internet. However, due to the

unique nature of its operation, conventional online booking via search engines may not be a suitable sale channel but the internet can facilitate all marketing, communication relating to bookings, social media and use of smartphone applications to achieve a similar objective. Further research is required to investigate how some of these barriers may be removed and whether alternative methods of exploiting the full range of ICTs may be more suitable for this unique tourism product.

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