

Digital Communication and Community Development of Leading Tourism Areas in Indonesia (Tanjung Lesung Case Study)

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Abstract. This study aims to understand how digital communication could offer benefits to homestay management and tourism development for village people in Tanjung Lesung area that was hit by end of 2018 tsunami, and aggravated by COVID-19 pandemic. Quantitative approach was used with survey through questionnaires, added with qualitative approach through in-depth interviews in Tanjungjaya Village. The research results found that there is a digital divide condition of lacking skills in operating tourism support applications among older village people, although it was discovered that implementing digital communication actually could increase the income of homestays with a gap of 14%. Owners of homestays are still optimistic to rely on tourism which has offered to them the benefits of increasing income to diminish poverty, reduce unemployment and help nature reservation. Thus concluding that digital communication has offered many positive benefits for tourism development, represented by an answer range of 3.7-3.8 (very high).

Keywords: digital communication, digital divide, community development, homestay, tourism development.

1 Introduction

The application of ICT in tourism has brought drastic changes among tourism businesses, tourists, and the government, especially in terms of marketing tourism objects [1]. Through communication and information technology, its wide scale and reach help individuals in society to work more quickly and efficiently. Each is connected to a communication and information network. This is later became the forerunner of the network society. One of the things that distinguishes the mass community from the networked community is the type of communication which is already mediated, one of which uses digital media [2].

In order to increase tourist arrivals to 20 million in 2020, the Ministry of Tourism has launched 10 branding destinations with a priority scale. Destinations included in the development and development priority scale are Tanjung Kelayang, Tanjung Lesung, Mandalika, Morotai, Borobudur, Lake Toba, Thousand Islands, Bromo Tengger Semeru, Wakatobi, and Labuan Bajo [3]. Moreover, the seriousness of the Indonesian government in developing the tourism sector is with the Self-Help Housing Stimulant Assistance Program (BSPS) or renovation of uninhabitable houses that will be carried out in 25 areas and one of them is Tanjung Lesung [4].

Unfortunately, this area was severely hit by tsunami in the end of December 2018 which had decreased number of tourists visiting Tanjung Lesung. When the tourism industry of this area started to recover one year later, it was attacked by another crisis in the end of March 2020: COVID-19 pandemic. Indonesian Government applied Large-Scale Social Restriction in some areas of Indonesia. As the tourists prohibited to visit tourism places, the tourism industry of Tanjung Lesung area was suffering.

Actually, Tanjung Lesung is a tourist destination trend during this pandemic, because it is only 4 hours away from Jakarta. It is a tourist destination with accommodation, open space, 1,500 hectares wide with 14 km of coastline, and all facilities are included all in one place [5].

Previous research [6] found that to develop the creative economy as a driver of the tourism sector requires connectivity, by creating creative product outlets in strategic locations and close to tourist spots.

The problem that is currently occurring in Tanjung Lesung is the lack of optimal use of digital in marketing. There are not many homestay entrepreneurs who have used digital technology in their homestay marketing. Meanwhile, previous research stated that the management system through the homestay application is able to accommodate their interests properly [7]. The website of homestays provides facilities to tourists [8]. The applications could assist in many aspects including administration such as the reservation system [9]. The application for homestay is also very feasible to use [10].

This gives a rise to what is called digital divide. The term digital inequality, starting with the first level digital divide focusing on differences in the distribution of Internet access. More recently, experts have begun to focus on the outcomes of using the Internet or the ways in which people can benefit from the Internet [11]. Inequality can occur not only due to economic problems, but also place of residence, employment status, income, education, ethnicity, age, gender, and family structure [12]. Therefore, digital divide and inequality could affect tourist destinations and modern tourism.

A study from Onitsuka et al. [13] found that there are strong disparities in internet use even among residents in rural areas. The focus should not only on infrastructure development but also on educating young people before the internet is available and popular in the target area. Age also affects motivation, skills and knowledge of the internet among users. The next big challenge for future studies is to cultivate the motivation, skills and knowledge that lead to ideal use of the internet for society. It is a challenge of the program on how to use the internet in a right way for homestay managers.

Previous research [14] showed that the digital divide is not only about infrastructure and access, but also includes digital skills and literacy. Policy intervention, therefore, is arranged

by placing the people as active users who understand, use and construct the meaning of technology from their own space and context. While the state is the most responsible actor to guarantee equal digital infrastructure, access, and literacy, the market and the community should also work together.

The impact of information and communication technology (ICT) in tourism (e-tourism) has changed the way tourism services are accessed and consumed. Highly innovative ICTs provide different channels for consumers to use tourism services. As present tourism has changed, ICT consumption is a must, so if there is a digital divide, it must be anticipated [15].

By relying on digital use, we hope to increase the Self Reliance of homestay entrepreneurs, that is wants as much as possible to use the resources available from within the community itself and minimize the use of external resources. This principle applies to any external resources that may be needed by the community (financial, technological, natural, and human resources) [16].

Based on data sources, Big Data related to tourism falls into three main categories: (1) UGC (user-generated) data, including online textual data and online photo data; (2) device data (by device), including GPS data, mobile roaming data, Bluetooth data, and others; (3) transaction data (with operations), including web search data, web pages, web visits, online order data, and others [17].

Li et al. [18] stated that the future of tourism is smart tourism. Yuan and Medel [19] added the importance of photos and geotags for tourism applications. As for the development of Tanjung Lesung, Kartika [20] emphasizes that social media is a very important tool to master. Chingarande and Saayman [21] mentioned that one of the critical success factors for developing Tourism-Led-Growth (TLG) tourism for a country is technology development. The definition provided by the study of Li et al. [18] emphasizes smart tourism as an individual tourism support system in the context of all-encompassing information and technology services.

Based on the above data, this study aims to understand how digital communication could offer benefits to homestay management and tourism development for village people in Tanjung Lesung area as it would be a potential problem if this problem is not identified thus found its solution.

2 Method

This study uses a quantitative approach through a questionnaire survey to identifying a sample and population, specifying the type of design, collecting and analysing data, presenting the results [22], in addition to strengthened by a qualitative approach through in-depth interviews. The population is the owners or managers of homestays in the village of Tanjungjaya, Panimbang sub-district, Tanjung Lesung tourism area. The population of the Tanjungjaya Village based on its Secretary's data is 40 homestays. As there are only 32 active homestays, with purposive sampling technique they become the sample in this study. Data analysis used statistics descriptive and Mann-Whitney U to test the differences in the digital skills of homestay entrepreneurs. The statements of "yes" and "no" used to measure digital skill and government program in order to explore their experiences. Meanwhile, to measure benefit and

optimism in tourism using likert scale of 1 – 5 from “no benefit” to “very useful” and scale of 1 – 4 from “Disagree” to “Agree”.

3 Result and Discussion

3.1 The digital divide condition in lacking skills to operate tourism support applications among the old age group

In the context of the development of Indonesian tourism to face tourist destinations with contemporary concepts through a digital approach [23]. The digital utilization conditions of Tanjung Lesung homestay entrepreneurs are divided into two parts, namely creating content and managing content. There are four types of content in creating content: (1) text content; (2) photo content; (3) video content; and (4) animation. Based on the results of the processing, it is known that in general the percentage of homestay entrepreneurs among the young age group is greater than among the old age group. This shows that young people are more ready to create digital content, especially photo content that has been done by 75% of respondents (Fig. 1). As there is no homestay entrepreneurs who can create animated content, this should put into consideration. The results of previous studies stated that there are strong disparities in internet use even among residents in rural areas, age also affects motivation, skills and knowledge of the internet among users [13].

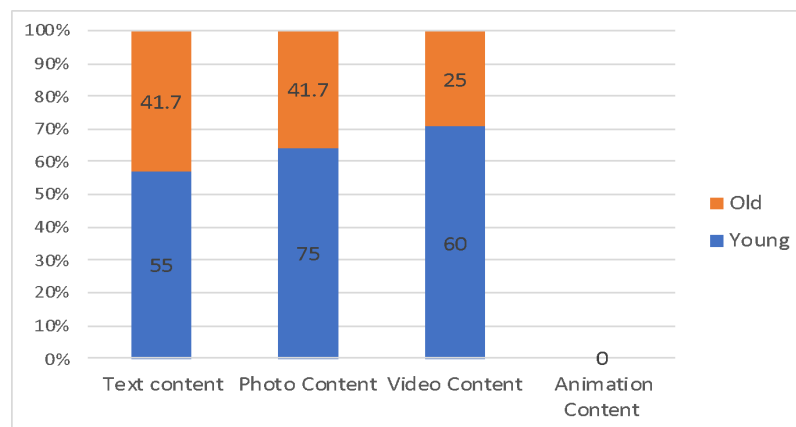


Fig. 1. Skills to create content for homestay entrepreneurs in Tanjung Lesung

Figure 2 below present six types of management methods in managing content: (1) imaging through digital communication; (2) direct digital marketing; (3) digital marketing with other parties; (4) marketing through applications; (5) digital transactions; and (6) receiving suggestions and criticisms through digital. Based on the results of the processing, it is known that in general the percentage of homestay entrepreneurs among the young age group is greater than among the old age group. This shows that young people are more prepared to manage digital content, especially imaging that has been done by 75% of respondents. The important

thing to notice is the percentage of suggestions and criticisms for digital communication usage is not low.

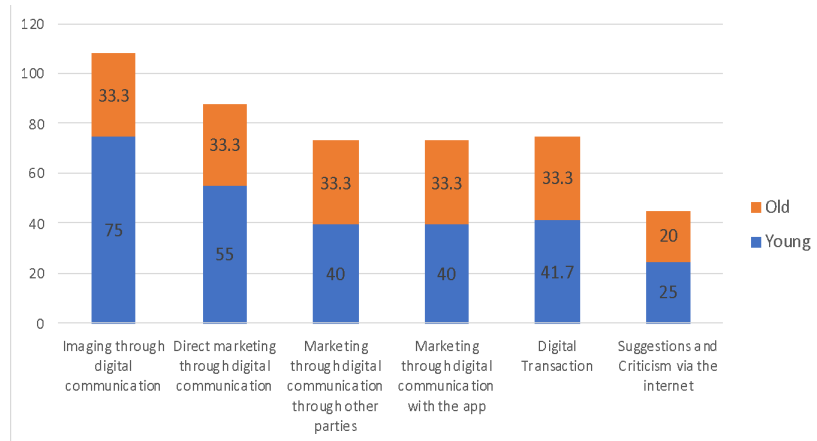


Fig. 2. Tanjung Lesung homestay entrepreneur content management skills

The result of Table 1 and Table 2 can conclude that there is no significant difference in the creation of digital content between the young age group and the old age group (mann-whitney $u=79.5$; $Z = -1.683$; $p>0.05$). Meanwhile, there is a significant difference between the young age group and the old age group in readiness to manage digital communication (mann-whitney $u=51.5$; $Z = -2.683$; $p<0.05$).

Table 1. Rank of creating content and managing content digital

Items	Ranks			
	Age group	N	Mean Rank	Sum of Ranks
Creating content	Young	2	18.53	370.50
	Old	1	13.13	157.50
	Total	3		
		2		
Managing content digital	Young	2	19.93	398.50
	Old	1	10.79	129.50
	Total	3		
		2		

Table 2. statistic test of creating content and managing content digital

Test Statistics ^a	
creating content	managing content digital

Mann-Whitney U	79.500	51.500
Wilcoxon W	157.500	129.500
Z	-1.683	-2.683
Asymp. Sig. (2-tailed)	.092	.007
Exact Sig. [2*(1-tailed Sig.)]	.116 ^b	.006 ^b
a. Grouping Variable: age_group		
b. Not corrected for ties.		

3.2 Utilization of digital communication to support homestay entrepreneurs' income from homestay management

Based on data processing, it is known that the income of the young age group is greater than the average and maximum age group. The average income of the young age group is Rp. 3,222,727. It is 28.9% greater than the average income of the old age group of Rp. 2,500,000 (Table 3).

Table 3. Income by age group

Age Group	n	Income per month (Rupiah)		
		Average	Min	Max
Young (<45 Years)	20	3,222,727	500,000	20,000,000
Old (\geq 45 Years)	12	2,500,000	500,000	7,000,000
Total/Mean	32	2,967,647	500,000	20,000,000
Gap (%)		28.9	0	185.7

3.3 Government and homestay entrepreneur empowerment program

Figure 3 below shows that homestay management trainings were conducted more often than internet trainings.

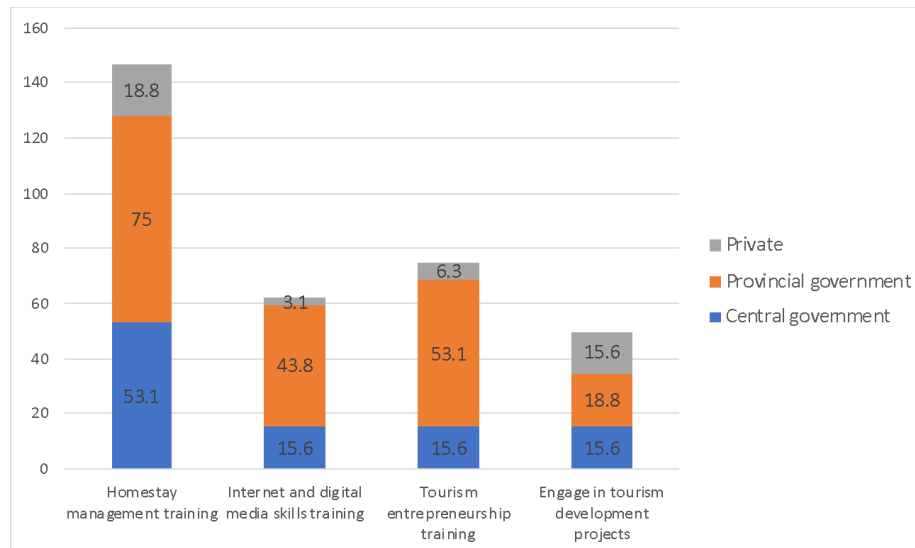


Fig. 3. Tourism development training attended by homestay entrepreneurs

The previous research by Hadi [14] mentioned the intermediaries in a community are indeed the most potential ones to comprehend the rural-urban linkages as well as introducing ICT domestication and appropriation based on their living space and context. In the Tanjung Lesung case, *Pokdarwis* (Tourism Aware Group) could be those intermediaries.

Damanik and Rahdriawan [24] added the importance of supporting organizations such as *Pokdarwis* (Tourism Aware Group) for homestays and tourist activities, especially helping those who are not familiar with internet. Setiawan [25] mentioned that millennial generation in Banten also has a communal character. Therefore, *Pokdarwis* as an also communal group, has an important role to support tourism activities in Tanjung Lesung.

Figure 4 presents that Items Support and Expert Assistance were handed more to tourism actors in Tanjung Lesung are than Cash Support.

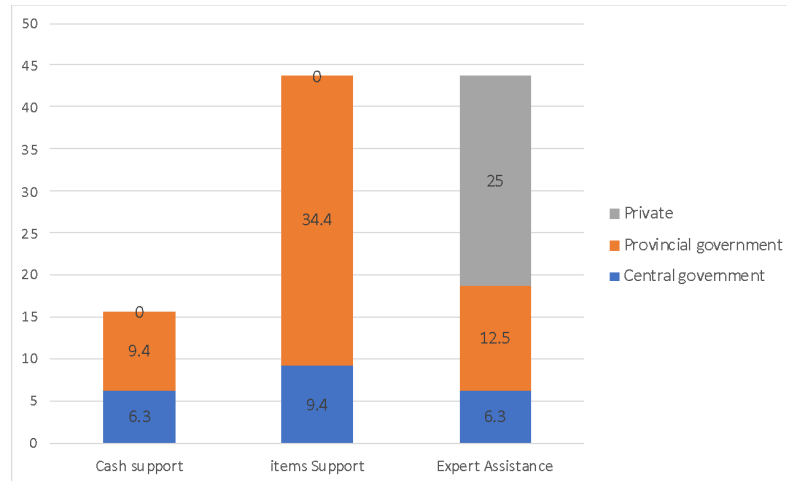


Fig. 4. Type of support for homestay entrepreneurs

The study of Muhammad and Prasetya [26] found that there were problems with technical guidance as governmental empowering program for tourism actors. They found that the program was too difficult, not in accordance with the needs and sustainability of the program. The similar unsuccessful program could also happen at Tanjung Lesung.

3.4 Optimism of homestay entrepreneurs towards tourism through homestay development

Table 4 shows that the assessment of homestay benefits is rated very high (range 4.2 – 4.85). The benefits through the development of homestays are: reducing unemployment, helping nature conservation and increasing the positive image of Tanjung Lesung. In general, the younger age group responded more strongly (4.58) than the old age group (4.56), specifically related to reducing unemployment, helping nature conservation and increasing the positive image of Tanjung Lesung, while the older age group answered more strongly regarding reducing poverty. Furthermore, inequalities in digital skills and technology use are reviewed and connected to the discourse on new forms of work such as the sharing economy or gig economy [27].

Table 4. Homestay benefit

Homestay Benefits	age group		Total
	Young	Old	
reducing unemployment	4.55	4.58	4.56
helping nature conservation	4.70	4.67	4.69

increasing the positive image of Tanjung Lesung	4.85	4.50	4.72
mean	4.58	4.56	4.57

3.5 Digital communication bring`s positive benefits for tourism development goals

Table 5 presents that the assessment of the benefits of digital communication is rated very high (range 3.7 – 3.8). The benefits of digital communication are: to carry out promotions and marketing, to facilitate homestay bookings, to facilitate information about homestay availability and to improve service quality standards. In general, the younger age group answered more (3.79) than the old age group (3.67).

Table 5. Benefit of digital communication

Benefits of Digital Communication	age group		Total
	Young	Old	
to carry out promotions and marketing	3.75	3.75	3.75
to facilitate homestay bookings	3.80	3.75	3.78
to facilitate information about homestay availability	3.75	3.75	3.75
to improve service quality standards	3.85	3.67	3.78
Mean	3.79	3.73	3.77

4 Conclusion

The conclusions of the study are: (1) There is a digital divide condition in the form of lacking skills to operate tourism support applications among the old age group. Therefore, it is necessary to understand innovation diffusion theory in understanding technology; (2) The use of digital communication is able to support homestay entrepreneurs' income from their homestay management; (3) Outside of the infrastructure development program for access roads to tourism areas, empowerment programs from the central government and local governments have not found a pattern that is right on target; (4) Despite repeated disasters (tsunami and pandemic) homestay entrepreneurs remain optimistic to rely on tourism through the development of homestays; and (5) Digital communication brings positive benefits for tourism development goals.

Based on the above conclusions, we recommend that: (1) The private sector should be activated to support the digital divide among the old age group, accompanied by *Pokdarwis* (Tourism Aware Group) and local tourism event organizers; and that (2) The local and national Government must have concerns to create integrated programs after workshops of digital communication.

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