

## **An exploratory study on the adaptation strategies of longtail boat tour operators to an evolving marine business landscape: a case study of Phuket Island, Thailand**

**Pisit Tuntipisitkul & Sanya Chimphimon**

**To cite this article:** Pisit Tuntipisitkul & Sanya Chimphimon (2025) An exploratory study on the adaptation strategies of longtail boat tour operators to an evolving marine business landscape: a case study of Phuket Island, Thailand, *Journal of Heritage Tourism*, 20:1, 92-106, DOI: [10.1080/1743873X.2024.2376027](https://doi.org/10.1080/1743873X.2024.2376027)

**To link to this article:** <https://doi.org/10.1080/1743873X.2024.2376027>



Published online: 15 Aug 2024.



Submit your article to this journal [↗](#)



Article views: 144



View related articles [↗](#)



View Crossmark data [↗](#)



# An exploratory study on the adaptation strategies of longtail boat tour operators to an evolving marine business landscape: a case study of Phuket Island, Thailand

Pisit Tuntipisitkul<sup>a</sup> and Sanya Chimphimon<sup>b</sup>

<sup>a</sup>Faculty of Hospitality and Tourism, Prince of Songkla University, Phuket, Thailand; <sup>b</sup>Faculty of Management Science, Phuket Rajabhat University, Phuket, Thailand

## ABSTRACT

In Thailand's marine tourism, longtail boat operators play a vital role in local economic growth, cultural heritage preservation. Recognizing their significance, it is important to support these operators by understanding their adaptation to the fast changing business landscape. This study investigates the situation and adaptation strategies of longtail boat tour operators in Phuket, Thailand. Semi-structured interviews were conducted to gather data and discuss the findings' implications. Findings indicate a resurgence in tourism and a corresponding increase in revenue, driven by a sense of optimism and renewed investment among boat operators. Amidst this rebound, operators exhibit different service design strategies, with some retaining traditional business practices. However, the emergence of new domestic and foreign competitors in marine tourism has prompted a shift towards community empowerment. Simultaneously, the study underscores the pressing issue of business succession. The reliance of traditional maritime skills and the transfer of the skills across generations is at risk due to the younger generation's employment preferences. Emerging environmental challenges, such as climate change and unseasonal weather, further complicate the situation, along with increased water traffic. This research enhances understanding of how longtail boat tour operators adapt to business challenges, offering insights for stakeholders and policymakers in marine tourism.

## ARTICLE HISTORY

Received 3 April 2024  
Accepted 30 June 2024

## KEYWORDS

Longtail boat; marine tourism; business challenge; adaptation; Phuket

## Introduction

Marine tourism has continually played a significant role in driving the tourism sector in coastal destinations globally, attracting millions of domestic and international tourists (Gössling, Hall, & Scott, 2018; Leposa, 2020). In the context of Thailand, the presence of longtail boat tour operators holds significant value within the marine tourism industry, largely attributed to their widespread popularity among tourists. Longtail boats, distinguished by their unique design featuring a propeller affixed to an extended 'tail' and powered by an outboard motor, are frequently utilized for short to mid-range maritime journeys. Their high flexibility, even in shallow waters, makes them a suitable choice for activities such as island hopping, snorkeling, and fishing (Kaosol, 2018). These tours offer travelers an authentic way to explore the marine attractions of Thailand. From the past to the present, longtail boat tours have gained popularity as a sought-after experience for travelers amidst the diverse marine tourism activities. Furthermore, longtail boat tourism in Phuket plays an important role in enhancing local well-being. These operators generate income by charging tour fees and employing local guides

**CONTACT** Sanya Chimphimon  [sanyachimk@gmail.com](mailto:sanyachimk@gmail.com)

This article was originally published with errors, which have now been corrected in the online version. Please see Correction (<https://doi.org/10.1080/1743873X.2024.2399884>)

© 2024 Informa UK Limited, trading as Taylor & Francis Group

and crew members. (P2, personal communication, November 24, Phuket, Thailand, 2023). They also contribute to the growth of businesses like hotels, restaurants, and souvenir shops. The earnings generated by longtail boat tour operators have an impact on job creation, income distribution, and overall economic stability in communities. Longtail boats hold value in Thailand as they represent a rich heritage of maritime traditions and skilled craftsmanship. Their distinctive design, decorations, and authentic Thai aesthetics help celebrate local culture and identity. Additionally, longtail boat tours offer visitors an experience and an opportunity to explore Thailand's cultural heritage by providing insights into local customs, traditions, and ways of life. Recognizing the value of this heritage, it becomes evident that adaptation strategies should not only focus on economic resilience but also on preserving cultural and historical practices.

Changing business landscapes presents new challenges to marine tourism in Phuket, particularly in the wake and aftermath of COVID-19 (Tuntipisitkul & Fuchs, 2023). To ensure their survival and sustainability, longtail boat tour operators must adapt to these emerging challenges. This research aims to investigate the adaptation strategies employed by longtail boat tour operators in response to the new marine business landscape. To fulfill the research objectives, this study utilized a qualitative approach, employing semi-structured, in-depth interviews as the primary method of data collection from longtail boat tour operators in Phuket. The gathered data were then analyzed thematically. Limited research exists on the subject of longtail boats in the context of tourism. The findings of this study serve to expand our awareness and understanding of the challenges encountered by this maritime heritage practice.

## Literature review

### *The impact of COVID-19 on marine tourism*

The marine tourism sector is one of the sectors significantly affected by COVID-19, especially by the policy of social restrictions and foreign tourist visits. The literature surrounding the impact of COVID-19 on marine tourism reflects and focuses on a major player or big enterprise in marine industry. For instance, Arumsari and Yosintha (2021) provides valuable insights into the ramifications of the pandemic on souvenir trading within marine tourism, highlighting the economic repercussions and shifting consumer behaviors. Similarly, the works of Lin, Tsai, and Lee (2022), Erdal (2020), Arlı and Ülker (2021) investigate the destabilizing impacts of COVID-19 on the cruise and yacht sectors, shedding light on the difficulties confronted by cruise industry in navigating through unprecedented uncertainties. Simarangkir, Tawang, Utami, and Kodiran (2022) contribute to this body of literature by examining the impact of the pandemic on diving tourism, offering critical perspectives on safety protocols and risk mitigation strategies. Furthermore, Smirnov, Smyaglikova, Smolokurov, and Mazhazhikhov (2022) underscore the systemic implications of COVID-19 on the cruise industry, signaling a paradigm shift in maritime leisure pursuits. However, scholarly investigations examining the strategies adopted by small-scale or local enterprises in the marine tourism sector, whether prior to or following the onset of the COVID-19 pandemic, are notably scarce.

### *Marine tourism business challenges*

The research conducted by Biggs, Hall, and Stoeckl (2012) and Biggs, Hicks, Cinner, and Hall (2015) highlighted that marine tourism businesses, especially in regions like Phuket, Thailand, encounter unique challenges that necessitate robust resilience and adaptive strategies. The resilience of these businesses is shaped by various factors, including tourist behavior, human capital, perceived reef conditions, and the level of government support. Previous research has examined the challenges confronting marine tour operators, encompassing various dimensions. These dimensions include natural disaster, environmental degradation (Biggs et al., 2015) service quality (Fowler, 2012), business adaptation strategy (Tuntipisitkul & Fuchs, 2023), the delicate equilibrium

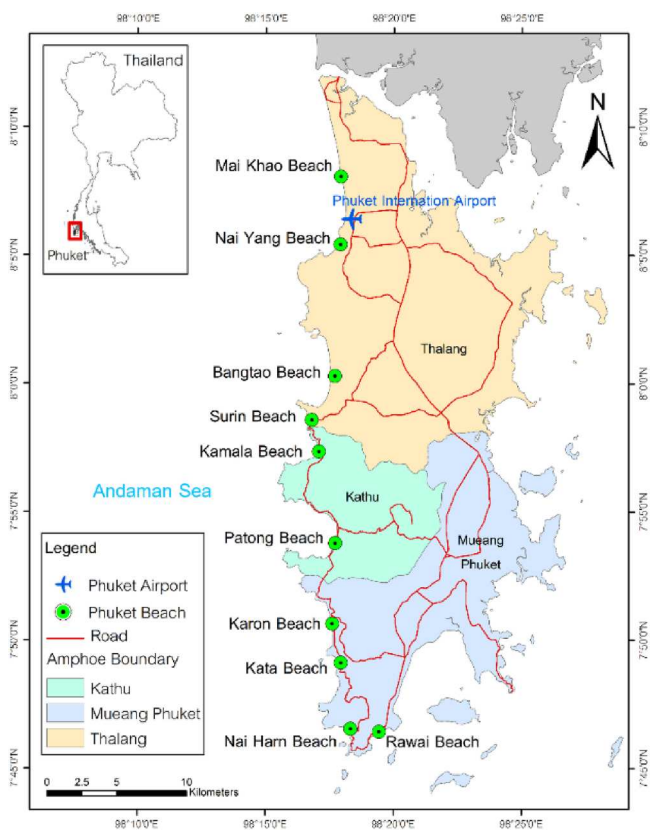
between commercial interests and environmental protection (Catlin, Jones, & Jones, 2012; Williams, Veirs, Veirs, Ashe, & Mastick, 2019), and regulatory compliance (Suryani, Soedarso, Rahmawati, Saifulloh, & Agustin, 2022). Furthermore, sustainability challenges have been documented, such as those highlighted by Umarella, Baiquni, Murti, and Marfai (2021) and Tuntipisitkul and Fuchs (2023). Additionally, the identified challenges encompass a lack of qualified manpower, inadequate infrastructure, varying numbers of seasonal visitors, and heightened competition among boat operators (Shin et al., 2020), along with accessibility issues relating to boat design (Chapman, 1996). These challenges highlight the complex and multifaceted nature of the marine tourism industry. While the current body of research provides crucial insights into the obstacles faced by marine tour operators, there remains a significant lack of understanding in certain areas that necessitates further investigation, particularly in relation to local boat tours, as small local businesses, are crucial in supporting marine tourism, and their development is influenced by various factors such as social, economic, and environmental conditions (Sulaiman, Jamaluddin, Jaini, & Hashim, 2017; Suryani et al., 2022). By addressing these knowledge deficiencies, the outcomes of this study can contribute to a deeper understanding and support the sustainability of local marine tour operators on a broader context.

### ***Longtail boats in Thailand***

Thai longtail boats, also known as ‘Rua hang yao,’ are traditional watercraft native to Southeast Asia, particularly Thailand. They possess several specific characteristics that make them unique and well-suited for various purposes (Kaosol, 2018) (see Figure 1). Generally, longtail boats are classified according to the license services they offer. There are mainly three categories. First, there are longtail boats for transportation. These boats primarily serve as a means of transportation for both locals and visitors. They are often used to transport passengers between islands or coastal areas. Secondly, there are longtail boats for local fishing communities. These boats are used by local fishermen for various fishing activities such as net fishing, line fishing, and shrimp-crab trapping. Thirdly, there are longtail boats for tourism services. These longtail boats are used for various tourism activities in Phuket. These boat designs are specifically aimed at the needs of tourists. They offer experiences such as island tours and snorkeling trips, sightseeing tours and visits to beautiful places. They are usually equipped with amenities such as seating areas, and shade structures and snorkeling equipment are available to enhance the tour experience. In addition to the service-based



**Figure 1.** Longtail boats in Phuket. Source: Author.



**Figure 2.** Map of Phuket Island. Source: Author.

classification, it is important to note that each type of longtail boat in Phuket requires a specific license issued by the relevant authorities. These permits ensure compliance with regulations and safety standards, as well as the proper operation of the vessel within the designated service area.

**Study site description**

The focus of the study is the marine tourism industry in Phuket, Thailand, an island located in the Andaman Sea on the southern part of the country’s west coast, with an approximate area of 543 square kilometers (see [Figure 2](#)). As the largest island in Thailand, Phuket is renowned for its stunning coastal landscapes, clear waters, and diverse marine life, making it a sought-after destination for tourists seeking marine-related activities and experiences.

**Methodology**

**Research design**

The authors conducted exploratory site visits to several longtail boat communities in Phuket in 2023 and compiled initial field notes as part of their research strategy. This initial field survey was instrumental in gaining a broad understanding of the subject and its context. Following these investigations, the researchers identified specific participants who would offer valuable data for this research. Subsequently, the researchers utilized semi-structured in-depth interviews to delve into the experiences of longtail boat tour operators and the strategies they employed to adapt to the changing marine tourism business landscape. The exploratory interview methodology,

with its capacity to explore promising areas through probing questions, proved to be of significant value, especially when the specific outcome was uncertain, or the subject matter was in its early stages (Aspers & Corte, 2019).

**Sampling**

The sampling method employed in this study is purposive sampling with the aim to select participants with the essential knowledge and experience required to comprehend the situation and challenges faced by longtail boat tour operators in Phuket. In the study, a total of 30 individuals were approached and consented to participate (see Table 2). Furthermore, during these interviews, contact details were gathered and the researchers subsequently verified the pertinent background of the candidates. The socio-demographic profile comprised of 4 females and 26 males. The study sample consisted entirely of Thai individuals who held positions of either managing owners or managers within their respective businesses. Moreover, the study participants showcased a wide spectrum of experience within the longtail boat tourism industry, spanning from 5 to 35 years, and a median business tenure of 14.7 years (see Table 1).

The inclusion criteria for the study involved identifying potential participants with extensive industry experience. This was achieved through recommendations from industry experts, recommendations from local associations or organizations related to marine tourism, or by conducting preliminary field survey to identify longtail boat tour operators with extensive knowledge. After the potential participants had been identified, the researcher approached them to explain the objectives and significance of the study. They were provided with information about the research objectives, methodology, and expected time commitment. The researcher sought their voluntary participation and willingness to share their experiences and insights.

**Table 1.** Profile of respondents.

Respondents	Gender M = Male F = Female	Age	Experience	Position
1	F	50	20	Longtail Boat Owner
2	F	33	10	Tour Guide
3	M	55	30	Longtail Boat Owner
4	M	62	35	Head Of Longtail Boat Community Enterprise
5	M	48	18	Longtail Boat Owner
6	M	44	20	Tour Guide
7	M	46	17	Longtail Boat Owner
8	M	38	7	Longtail Boat Owner
9	M	27	5	Tour Guide
10	M	30	8	Longtail Boat Driver
11	M	38	10	Longtail Boat Owner
12	M	35	9	Longtail Boat Driver
13	M	44	12	Longtail Boat Owner
14	M	45	15	Longtail Boat Owner
15	M	50	25	Head Of Longtail Boat Community Enterprise
16	M	52	25	Head Of Longtail Boat Community Enterprise
17	M	46	15	Longtail Boat Owner
18	M	39	20	Longtail Boat Owner
19	M	26	6	Longtail Boat Owner
20	F	35	8	Tour Guide
21	F	32	5	Tour Guide
22	M	29	8	Longtail Boat Driver
23	M	45	20	Longtail Boat Owner
24	M	42	15	Longtail Boat Owner
25	M	48	20	Head Of Longtail Boat Community Enterprise
26	M	49	15	Head Of Longtail Boat Community Enterprise
27	M	32	12	Longtail Boat Driver
28	M	27	5	Longtail Boat Driver
29	M	39	15	Longtail Boat Owner
30	M	36	11	Longtail Boat Owner



**Table 2.** Outlines the key characteristics that differentiate traditional longtail boat tours from luxury longtail boat tours in Phuket.

Traditional Longtail Boat Tour (see <a href="#">Figure 3</a> )	Luxury Longtail Boat Tour (see <a href="#">Figure 4</a> )
<i>Boat design</i> – Longtail boats are an important part of Thailand’s southern heritage. These wooden boats are normally built in Krabi province and are known for their unique designs, with long propeller shafts, representing cultural connections to the region’s maritime traditions and often handmade by skilled craftsmen, embodying a sense of craftsmanship and history.	<i>Upgraded amenities</i> – These longtail boat tours distinguish themselves by offering enhanced comfort and amenities compared to traditional longtail boats. These enhancements may include features such as comfortable seating, shaded areas, and onboard facilities like sun decks and minibars. These amenities not only ensure a more enjoyable and comfortable experience for guests but also add an element of luxury and exclusivity.
<i>Authentic local experience</i> – Traditional longtail boat tour normally operated by local boat owners with extensive knowledge of the coastal areas and the surrounding islands, providing insights into local culture, history, and natural features.	<i>Bespoke service</i> – The luxury longtail boat tour provides options for personalized services tailored to meet the specific needs, preferences, and expectations of the customer. Such as private lunches or picnics on remote beaches, wedding honeymoons, sunset cocktail on private beach, and other tailored services.
<i>Flexibility</i> – The tour offers flexible itineraries allowing visitors to customize their trips. Tourists have the freedom to customize their itineraries, choosing specific islands to explore, determining the duration of the tour, and participating in activities such as snorkeling, swimming, fishing, etc.	<i>High-end service</i> – Luxury longtail boat tours place a strong emphasis on providing excellent service that serves the specific needs and preferences of customers. The boat operators often employ guides who are trained in service delivery akin to hostesses on yachts or airlines. These guides are knowledgeable, attentive, and capable of providing a personalized experience for guests, ensuring their comfort and satisfaction throughout the tour.

**Data collection**

From early November 2023 to February 2024, the two lead researchers of the study conducted interviews with participants at their respective local business premises. The interviews were conducted face to face, where the researcher had a list of questions (see [Appendix: Table A1](#)) but also allowed the participants to freely discuss their thoughts in their own words. The focal point of the interviews revolved around delving into the participants’ circumstances and the tactics they utilized for adaptation. The interview durations varied from 30 to 60 minutes, with an average duration of 45 minutes. Furthermore, given the absence of consensus on the specific number of participants required for an exploratory interview study in the social sciences (Guest, Bunce, & Johnson, 2006), the authors undertook the data collection based on the principle of data saturation.

**Data analysis**

The study utilized a thematic analysis approach to analyze the data obtained from the interviews, with the goal of exploring the perspectives among participants. Thematic analysis, as a qualitative data analysis method, involves the identification of patterns and themes within the data (Nowell, Norris, White, & Moules, 2017). The interviews were recorded in audio format, transcribed verbatim, and organized according to the questions posed to the participants, all with their written consent. To ensure the rigor and trustworthiness of the findings, data saturation was considered during the analysis process. Data saturation is reached when additional data ceases to yield novel insights or make further contributions to the emerging themes. By reaching data saturation, the study was able to capture a comprehensive range of perspectives and ensure that a sufficient depth of understanding was attained regarding the research topic.

**Ethical considerations**

The study adhered to the ethical principles governing research involving human participants. Participants were apprised of the study’s objectives and their rights as participants, including the option to withdraw from the study at any point.

## Results and discussion

This section presents the outcomes derived from the thematic analysis of empirical data. The themes stem from thematic coding and have been consolidated into four primary themes. Subsequent sub-sections of the report will explain the empirical findings and expound upon various significant implications with theoretical relevance for the longtail boat tourism business and practical relevance for the marine tourism industry in Thailand, with a particular emphasis on the emerging themes.

### *Service design versus business as usual*

From the data collected, it was found that longtail boat operators unanimously expressed that the business situation for longtail boat tourism in Phuket has improved since the COVID-19 pandemic. The current scenario resembles normalcy before the COVID-19 period, with an increase in the number of tourists and business revenue. This positive view has instilled confidence among longtail boat tour operators to invest in boat operations, with the aim of resuming tourism business activities.

The findings indicate a distinction in service design among longtail boat tour operators in Phuket. Two primary groups emerged based on the interview analysis. The first group shows a lack of adjustments in their overall business strategies. They stick to the traditional way of running the business (business as usual). The subsequent statements, expressed by the participants, encapsulate a sentiment that resonates with the individuals comprising the first group:

‘You know, after Covid, things went back to the way they were. Tourists come back in large numbers as before. We’re still doing things just like we always have. Boats run the same, services are the same – nothing much has changed.’ (P5)

‘Well, I got to say, things are looking up since COVID-19 settled down. It’s almost like we’re back to the good old’ days before the pandemic hit, with more tourists and business picking up, which is a real relief. We’re keeping things traditional, running our operations the same way we always have. It’s what we know best, and it’s paying off for us.’ (P4)

On the other hand, the second group sees the COVID-19 pandemic as presenting both new challenges and opportunities arising from changes in tourism factors, including changes in tourist behavior and travel patterns, as noted by several interviewees. These factors have contributed considerably to the need to modify the design of the service, marketing strategies and customer experience, which led to the emergence of the concept of ‘luxury longtail boat’:

‘Tourists nowadays are looking for more than just a ride; they want an experience. So, we’ve modified our boats, added some amenities, elevated the service standards. It’s about providing more comfort and luxury without losing the authenticity of the longtail boat experience.’ (P2)

‘The tourism business here in Phuket is getting very competitive. These days, tourists are pickier than ever, you know what I mean? They’re diving into online reviews, listening to word of mouth. So, it’s important to offer a good service. Because if tourists aren’t happy with what they get, they won’t be returning, plain and simple. That’s why we’ve got to adapt our service to meet their needs. Design additional services such as pillow cushions, music, or props for taking pictures. To create a better experience for our customers.’ (P12)

The findings revealed that the service design of a longtail boat tour aims to elevate the public image of traditional longtail boat tour services by offering a more refined and upscale experience. These adaptive measures have helped longtail boat tour operators to explore and tap into emerging tourism markets. The idea of transitioning to a luxury model first emerged through the collaborative efforts between the local community and travel agents, with the agents’ knowledge of marketing, service design, customer base, and travel trends playing a crucial role. This sentiment is echoed by one of the longtail boat tour operators, who highlighted the shift in service operation:

‘There have been major changes in how we operate our services. You see, there’s this divide among us longtail boat tour operators. Some have stuck to the traditional ways, while others, including myself, have taken a more

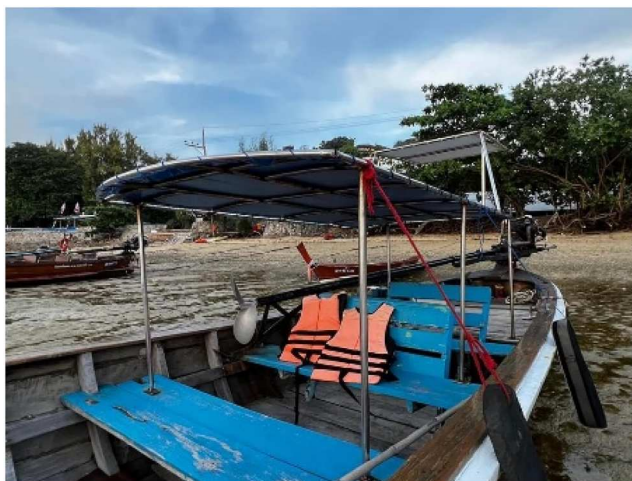


proactive stance. We've been adapting and saw an opportunity in offering a more luxurious service and experience. That's where the 'luxury longtail boat' concept came in.'(P1)

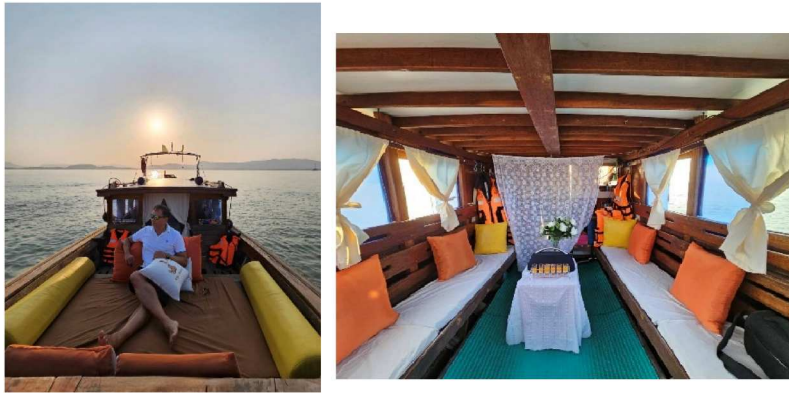
Another operator emphasized how the COVID-19 pandemic accelerated this transition, leading to further service innovations:

'COVID-19 really made us reevaluate everything. Tourists started behaving differently, and travel patterns shifted. It wasn't just about giving rides anymore; it became about ensuring safety, offering exclusive experiences, and catering to a new type of traveler. Some visitors are looking for more private, exclusive experiences due to health concerns, and we've adjusted our services to meet that demand.' (P10)

The introduction of the luxury longtail boat tour service has not only expanded their customer base but also positioned them favorably among the dynamic tourism landscape of Phuket. In particular, the upscale market segment, which can afford to pay a higher price in exchange for a unique experience. While the price of a traditional longtail boat tour service is around 1800–3,500 (THB) the luxury longtail boat tour service can be up to 18k–30k (THB). A luxury longtail boat tour typically must meet certain standards, including a minimum size of 35 feet (21 'Gong' in Thai traditional longtail boat word) and the incorporation of additional amenities. These amenities may encompass sunshades, cushions, audio speakers, portable speakers, picnic sets, prop sets for photography, and the provision of local cuisine. The investment required for such upgrades ranges from approximately 30,000–120,000 baht, depending on factors such as the desired quality, additional equipment installed, and budget considerations. Moreover, expanding into luxury boat services usually requires hiring more staff to ensure optimal guest service and satisfaction onboard while limiting the number of customers to about 1–10 people depending on the boat's size. Those operators strategically position themselves as providers of high-quality and luxurious journeys, emphasizing the exclusivity, comfort, and personalized services that differentiate them from traditional longtail boat tour services. This relevant service design strategy is particularly important in today's tourism industry (Xu, 2019). The luxury trend in tourism has had a significant impact on various sectors, prompting businesses to adapt to the changing demands of travelers. This trend is particularly evident in the hospitality sector, where there has been a shift towards more upscale concepts such as camping to glamping and hostel to poshtel (Brooker & Joppe, 2013). This has been further fueled by digital transformation, which has revolutionized the sector and provided new value propositions to tourists (Vijayabanu & Karthikeyan, 2021).



**Figure 3.** Traditional longtail boat tour.



**Figure 4.** Amenities of luxury longtail boat tour in Phuket (Left to Right). Source: Author.

### ***The key characteristics that define traditional longtail boat tour and luxury longtail boat tour service in Phuket***

The evolution of longtail boat tour services in Phuket reflects the broader shifts in luxury consumption and tourism preferences. Atkinson and Kang (2022), Kauppinen-Räsänen, Gummerus, von Koskull, and Cristini (2019), Chi-Hsien and Nagasawa (2019), Truong (2010), and Hennigs et al. (2012) highlight the shifting dynamics of luxury, emphasizing sustainability, personal fulfillment, and meaningful experiences. The adaptation strategies employed by longtail boat tour operators resonate with these evolving consumer values, showcasing their understanding of market demands and preferences.

### ***Local community empowerment***

The findings suggest that longtail boat tour operators expressed concern regarding the emergence of new competitors from new competitors from outside, both domestic and foreign investment. This concern is notably evident within coastal tourism, where local communities frequently encounter tourists, and where local communities often lack the capacity to compete and gain from development (Sumarja, Hartoyo, & Wahab, 2014). Consequently, the operators have recognized the significance of collaborative efforts and community empowerment, leading to the formation of organizations, such as community enterprises, clubs, or associations to protect their local livelihood and help maintain a competitive edge. Moreover, it serves as platforms for coordinating efforts, sharing resources, and collectively addressing challenges that may arise from external competitors, particularly from outside investors and capitalists attempting to dominate their markets. This situation is similar to many tourist destinations in the world where tourism is developing rapidly (Atmojo & Fridayani, 2020). The following statements summarize the sentiment that was shared among interviewees:

‘You see, our big challenge is when these outside investors come in and buy all the land along the coastline (pointing finger to the private land next to local community pier) thinking they can run things better than us. They might have money, but we’ve got our ways of life. It disrupts our way of life. They might try to take away our spots. But when we come together as a community, we have more chance to protect our livelihood.’ (P3)

‘We’ve formed a community enterprise. It’s like a safety net. We try to protect each other from the threat from outsiders. Through these groups, we negotiate fair rules, protect our spaces, and showcase our unique culture to tourists.’ (P6)

This statement illustrates how longtail boat tour operators have proactively implemented systems and regulations to ensure fair earnings distribution, prevent price wars, and maintain safety standards:

'In our longtail boat group, we've set up a system to manage customer queues and boat assignments. This way, we make sure that everyone gets their fair share of earnings, and we don't need to resort to price wars. We've also established regulations, like no off-site pickups and all boats must be licensed for tour operation. Plus, each vessel must undergo regular inspections to maintain safety standards.' (P7)

In addition, community empowerment also provides a unified voice and a strong representation for the longtail boat tour operators within the local community and in interactions with relevant authorities. By establishing formal structures, they can negotiate and advocate for regulations, policies, and support that favor their industry's sustainability and growth. This proactive approach ensures that the interests of the longtail boat tour operators are protected and that any potential threats from outsiders are effectively managed.

### ***Succession challenges***

According to the interviews, numerous longtail boat tour operators express concern regarding the issue of inheriting the longtail boat business to ensure continuity for future generations. This can be divided into the following main points. First, due to the skills and knowledge required to operate longtail boats take relatively a long time to develop and usually have to start from a young age to form a bond with the local maritime practices. For example, nautical patterns, reading the environment, tides, weather forecasts, which are considered local wisdom passed down from generation to generation. One operator's personal reflection encapsulates this challenge:

'Personally, I want my child to take over, but I can't force them. Because it must come from passion and must also have accumulated experience over a long period of time. Otherwise, you can't do it, because it's a difficult task that not everyone can do.' (P8)

Furthermore, in the contemporary setting, the younger generation is paying more attention to other employment options, especially in tourist destinations such as Phuket, where there is a diversified labor market with relatively higher incomes and more stability compared to making longtail boats tour. The aforementioned issues are considered important factors in the new generation's decision to inherit the longtail boat tour business, as noted by several interviewees:

'Kids these days, choose a job that is comfortable. They have a social face and a more stable salary. Is it hard to predict if they will carry on the longtail boat business? Because there are so many jobs to choose in Phuket.' (P9)

'You know, the young ones these days, they're all about their own thing, aren't they? Can't blame them, really – they love their freedom. Me, well, I've been trying' to keep our longtail boat business alive by getting' my kids to chip in now and then. But let me tell you, it's hard to say if they'll carry it on. The future's uncertain, only time will tell.' (P13)

As noted by past studies, the lack of proper planning by founders, often due to fear of losing control or inheritance issues, is a key factor in the failure of small local businesses after the founder's death (Musa & Semasinghe, 2014). However, in many cases successful family-owned local businesses in some contexts have managed succession without formal planning, relying on family culture and values (Aun, Chung, & Guan, 1993). Prior research has underscored the pivotal role of succession planning in local family businesses, with the lack of well-defined strategy negatively impacting their success (Ugoani, 2014).

### ***Traditional wisdom in modern waters***

Participants revealed that the practice of longtail boat tours is viewed as a practice rooted in the use of local wisdom such as sea navigation, weather monitoring through natural observation, maintenance of the boat, etc. This is an identity of longtail boat practice that has been passed down for generations. Consequently, a majority of longtail boat tour operators express their lack of necessity to use new technology such as application weather forecasting or various nautical instruments as they display a firm reliance on their traditional expertise. This reliance is evident in the following reflections:

'To drive a longtail boat, you need to know the area really well and have navigation skills gained through extensive experience, like knowing the tides, channels, directions, and winds, because there are a lot of dangers when you're out at sea.' (P3)

'I've spent years getting to know these waters, I trust my instincts, rely on the wisdom passed down from my ancestors, who navigated these waters with nothing but their knowledge and experience. They didn't have GPS or fancy navigational tools, but they knew these waters like the back of their hand. It's a connection to the sea that runs deep in our heritage, and it's something that no modern technology can ever replace.' (P14)

Moreover, participants emphasize the importance of visual observation and experiential knowledge in their daily operations, as demonstrated in the following statements:

'Before we take our longtail boat out, we always make sure to visually check the weather. We keep an eye on the environment, watching the clouds formation and tide levels to see if it's good for operating. Relying on these visual cues is crucial to keeping our journeys safe and sound.' (P11)

'There are occasions when the engine fails, but we're fortunate to have other boats in the vicinity to offer assistance. I have experience knowing the sea in this area very well, so there is no need for modern technology to help on the boat.' (P9)

Nonetheless, a minority segment is beginning to transition towards the adoption of modern maritime technologies such as GPS, weather forecast and tide table application in order to improve safety standards and enhance the customer experience. However, in today's setting, longtail boat tour operators are encountering new challenges, including but not limited to climate change manifesting as heightened storm frequency, turbulent weather patterns, alterations in route conditions, and rising water traffic due to the influx of tour boats in concentrated areas. These factors contribute to complexities in operational planning and exert an influence on navigational safety as noted by several interviewees:

'These days, I've been noticing that the waves and the wind in the sea are pretty unpredictable. There's also a good number of boats doing tourist tours. In a lot of spots, we need to be more careful because we've been seeing more accidents happening on the water and in the news.' (P4)

'Recently, I've noticed a little increase in turbulence in the weather patterns. However, I'm not overly concerned as I'm familiar with the area and operating fairly close to the coast.' (P15)

It is widely recognized that climate change has adverse effects on the marine environment (Gössling, Bredberg, Randow, Sandström, & Svensson, 2006). However, what is not well understood is how it impacts the specific group of marine tourism businesses, particularly the local communities such as longtail boat tour operators.

## Conclusion and recommendations

The study reveals a positive outlook among longtail boat tour operators in Phuket, with a return to pre-COVID-19 business levels and an increase in tourism revenue. This has encouraged investment in boat operations and a resumption of tourism activities. However, the findings also highlight distinct service design approaches, with some operators sticking to traditional business strategies. Amidst this positive outlook, concerns about the rise of new competitors, both domestic and foreign, have prompted longtail boat tour operators to prioritize community empowerment and collaboration. Furthermore, the issue of business succession presents a significant challenge, as the transfer of skills and knowledge required for operating longtail boats traditionally spans generations, while the younger generation increasingly seeks alternative employment opportunities. In addition, the study highlights the emerging challenges such as unseasonal weather patterns, and heightened water traffic.

Based on the findings, it is recommended that the public sector, especially local government agencies should prioritize community collaboration and empowerment initiatives to help longtail boat communities maintain competitiveness in the face of increasing domestic and foreign competition in the marine tourism sector. To facilitate this, the implementation of technology solutions

aligned with the Technology Acceptance Model (TAM) framework could be beneficial. The Technology Acceptance Model (TAM) is a widely recognized theory in the field of information systems that explains how individuals come to accept and use technology (Surendran, 2012). According to TAM, two key factors perceived ease of use and perceived usefulness are critical predictors of technology acceptance (Ma & Liu, 2004). For instance, introducing digital platforms or applications designed to streamline communication, marketing, and customer engagement processes could enhance operational efficiency and foster collaboration among longtail boat communities. Towner (2018) and Asiati and Nawawi (2017) both highlight the potential for technology to enhance collaboration and empowerment in specific community contexts, such as surfing tourism. These technological solutions should be user-friendly, perceived as useful, and supported by adequate training and support mechanisms to ensure successful adoption among longtail boat operators. This collective approach, depending on the nature of organizations, should be fostered, and possibly replicated in other similar contexts. Moreover, longtail boat community enterprises should increase creativity in providing service design that adds value to local identities, rather than simply banding together to prevent or discourage outsiders from competing. Emphasizing the preservation and promotion of local identities through unique service design can differentiate longtail boat tour operators in the competitive marine tourism market.

Furthermore, longtail boat tour operators should consider incorporating modern maritime technologies into their operations to navigate challenges posed by climate change and unseasonal weather patterns. Technology solutions such as weather forecasting apps, GPS navigation systems, and safety monitoring devices can enhance safety standards and mitigate risks associated with adverse weather conditions (Inoue, 2020). These technologies should be evaluated based on their acceptance and effectiveness among boat operators, highlighting the importance of considering factors outlined in the TAM framework, such as perceived usefulness and ease of use. Additionally, in response to the concern of business succession, it might be beneficial to establish formal mentorship programs or initiatives led by the Thai Department of Skill Development or local educational institutions aimed at preserving longtail boat skills among the younger generation. Furthermore, owners of longtail boats should consider implementing a flexible succession plan that prioritizes essential competencies. Within the context of this study, participants highlighted the importance of a successor who possesses proficient longtail boat maritime skills. For future contribution, the study suggests a need to navigate the challenges posed by climate change and unseasonal weather patterns, which could have serious implications for longtail boat tour operations. Research could be directed towards the development and implementation of modern maritime technologies that enhance safety standards and customer experience, while preserving the essence of local wisdom and traditional expertise. An evaluation of the effectiveness and acceptance of these technologies among boat operators using the TAM framework could also be a significant area of study.

## Acknowledgements

The author would like to thank the interview participants for their contributions to the study by sharing their views and experiences.

## Disclosure statement

No potential conflict of interest was reported by the author(s).

## Funding

This work was supported by the Faculty of Hospitality and Tourism, Prince of Songkla University Under grant number FHT 6600008.



## Author contributions

All authors have participated in the conception and design of the study; analysis and interpretation of the data; writing the article and approval of the final version.

## Informed consent

All participants provided written informed consent prior to enrolment and participation in the study.

## Notes on contributors

**Pisit Tuntipisitkul** is a full-time lecturer and researcher at the Faculty of Hospitality and Tourism, Prince of Songkla University, Phuket, Thailand. He teaches courses in sustainable environmental management, natural and cultural heritage tourism, and marine tourism. He has a passion for water activities and a deep appreciation for the islanders' way of life on Phuket Island. Pisit is a multi-disciplinary scholar with research interests in island tourism, coastal and marine tourism, as well as cultural and natural heritage. He is a certified member of Sea Search and Rescue with the Thai Red Cross Society and a certified scuba diver for conservation with the Royal Thai Navy and Chulabhorn Research Institute.

**Sanya Chimpimon** is a full-time lecturer and researcher at the Tourism Business Management Department, Faculty of Management Science, Phuket Rajabhat University, Thailand. He teaches courses on tourist behavior, tour operator management, and community-based tourism management. Sanya's research interests focus on tourist behavior and community-based tourism. He aims to promote sustainable practices that benefit local communities. Sanya serves as a committee member in the Rajabhat University Strategic Project for Local Development and a committee for the Southern Thailand Region-Specific Tour Guide Training Curriculum.

## References

- Arlı, E., & Ülker, D. (2021). An assessment of how the pandemic affected the cruise tourism. *Tourism and Recreation*, 3(1), 18–25.
- Arumsari, I. P., & Yosintha, R. (2021). The impact of COVID-19 on souvenir Industry in marine tourism areas in Indonesia. *Jurnal Kepariwisata Indonesia: Jurnal Penelitian dan Pengembangan Kepariwisata Indonesia*, 15(1), 16–24.
- Asiati, D., & Nawawi, N. (2017). *Kemitraan di sektor perikanan tangkap: strategi untuk kelangsungan usaha dan pekerjaan*.
- Aspers, P., & Corte, U. (2019). What is qualitative in qualitative research. *Qualitative Sociology*, 42(2), 139–160.
- Atkinson, S. D., & Kang, J. (2022). New luxury: Defining and evaluating emerging luxury trends through the lenses of consumption and personal values. *Journal of Product & Brand Management*, 31(3), 377–393.
- Atmojo, M. S., & Fridayani, H. (2020). The local government of Kulon Progo Regency Innovation in subduing capitalism through community empowerment. *Journal of Government Civil Society*, 4(2), 229–247.
- Aun, K. T., Chung, S., & Guan, C. T. (1993). Succession planning in family business. *Journal of Small Business and Entrepreneurship*, 10, 15–32.
- Biggs, D., Hall, C. M., & Stoeckl, N. (2012). The resilience of formal and informal tourism enterprises to disasters: Reef tourism in Phuket, Thailand. *Journal of Sustainable Tourism*, 20, 645–665.
- Biggs, D., Hicks, C. C., Cinner, J. E., & Hall, C. M. (2015). Marine tourism in the face of global change: The resilience of enterprises to crises in Thailand and Australia. *Ocean & Coastal Management*, 105, 65–74.
- Brooker, E., & Joppe, M. (2013). Trends in camping and outdoor hospitality—An international review. *Journal of Outdoor Recreation and Tourism*, 3, 1–6.
- Catlin, J. C., Jones, T., & Jones, R. (2012). Balancing commercial and environmental needs: Licensing as a means of managing whale shark tourism on Ningaloo Reef. *Journal of Sustainable Tourism*, 20(2), 163–178.
- Chapman, D. S. (1996). Passenger vessel design and the ADA—Americans With Disabilities Act. *Marine Technology Society Journal*, 33, 11–13.
- Chi-Hsien, K., & Nagasawa, S. (2019). Applying machine learning to market analysis: Knowing your luxury consumer. *Journal of Management Analytics*, 6(4), 404–419.
- Erdal, A. R. L. I. (2020). Effects of Covid-19 process in marine business: An evaluation on marine tourism enterprises. *The Eurasia Proceedings of Educational and Social Sciences*, 18, 119–123.
- Fowler, P. (2012). *Critical issues affecting the service quality in water-based tour operator: A case study of marine leisure tourist guide in Andaman Cluster, Thailand* [Doctoral dissertation, Prince of Songkla University].



- Gössling, S., Bredberg, M., Randow, A., Sandström, E., & Svensson, P. (2006). Tourist perceptions of climate change: A study of international tourists in Zanzibar. *Current Issues in Tourism*, 9(4–5), 419–435.
- Gössling, S., Hall, C. M., & Scott, D. (2018). *Coastal and ocean tourism*. In M. Salomon & T. Markus (eds.), *Handbook on marine environment protection* (pp. 773–790). Springer.
- Guest, G., Bunce, A., & Johnson, L. (2006). How many interviews are enough? An experiment with data saturation and variability. *Field Methods*, 18(1), 59–82.
- Hennigs, N., Wiedmann, K. P., Klarman, C., Strehlau, S., Godey, B., Pederzoli, D., ... Oh, H. (2012). What is the value of luxury? A cross-cultural consumer perspective. *Psychology & Marketing*, 29(12), 1018–1034.
- Inoue, J. (2020). Review of forecast skills for weather and sea ice in supporting Arctic navigation. *Polar Science*, 27, 100523.
- Kaosal, K. (2018). Thai local wisdom and evolution of boats. *Journal of Chandrakasemsarn*, 24(46), 30–45.
- Kauppinen-Räsänen, H., Gummerus, J., von Koskull, C., & Cristini, H. (2019). The new wave of luxury: The meaning and value of luxury to the contemporary consumer. *Qualitative Market Research: An International Journal*, 22(3), 229–249.
- Leposa, N. (2020). Problematic blue growth: A thematic synthesis of social sustainability problems related to growth in the marine and coastal tourism. *Sustainability Science*, 15, 1233–1244.
- Lin, L., Tsai, C., & Lee, J. (2022). A study on the trends of the global cruise tourism industry, sustainable development, and the impacts of the COVID-19 pandemic. *Sustainability*, 14(11), 6890.
- Ma, Q., & Liu, L. (2004). The technology acceptance model: A meta-analysis of empirical findings. *Journal of Organizational and End User Computing (JOEUC)*, 16(1), 59–72.
- Musa, B. M., & Semasinghe, D. M. (2014). Leadership succession problem: An examination of small family businesses. *European Journal of Business and Management*, 6, 301–306.
- Nowell, L. S., Norris, J. M., White, D. E., & Moules, N. J. (2017). Thematic analysis: Striving to meet the trustworthiness criteria. *International Journal of Qualitative Methods*, 16(1), 1609406917733847.
- Shin, O. K., Weng, C. N., & Dawood, S. R. (2020). Challenges facing small and medium tourism enterprises: A case study in Kuala Sepetang. In *ICH International Conference on Humanities, Penang, Malaysia*. <https://doi.org/10.15405/epsbs.2020.10.02.35>
- Simarankir, O. R., Tawang, F., Utami, P. B., & Kodiran, T. (2022). Carrying capacity studies of marine tourism during COVID-19 pandemic in Derawan Island, Berau, East Kalimantan. In *IOP Conference Series: Earth and Environmental Science* (Vol. 967, No. 1, p. 012030). IOP Publishing. <https://iopscience.iop.org/article/10.1088/1755-1315/967/1/012030/meta>
- Smirnov, A., Smyaglikova, E., Smolokurov, E., & Mazhazhikhov, A. (2022). COVID-19 pandemic impact on maritime cruise industry. In *E3S Web of Conferences* (Vol. 363, p. 01005). EDP Sciences. [https://www.e3s-conferences.org/articles/e3sconf/abs/2022/30/e3sconf\\_interagromash2022\\_01005/e3sconf\\_interagromash2022\\_01005.html](https://www.e3s-conferences.org/articles/e3sconf/abs/2022/30/e3sconf_interagromash2022_01005/e3sconf_interagromash2022_01005.html)
- Sulaiman, F. C., Jamaluddin, E. R., Jaini, N., & Hashim, N. I. (2017). The influence of marine tourism towards the quality of life among local tour operators at Pulau Pangkor, Perak. *Environment-Behaviour Proceedings Journal*, 2(6), 169–176.
- Sumarja, F., Hartoyo, H., & Wahab, O. H. (2014). Local communities empowerment within coastal tourism development in West Coastal District. *Developing Country Studies*, 4(2), 61–67.
- Surendran, P. (2012). Technology acceptance model: A survey of literature. *International Journal of Business and Social Research*, 2(4), 175–178.
- Suryani, A., Soedarso, S., Rahmawati, D., Saifulloh, M., & Agustin, D. S. Y. (2022). A community marine tourism as a business sector: Challenges faced by local community. *International Journal of Business Studies*, 6(2), 198–217.
- Towner, N. (2018). Surfing tourism and local stakeholder collaboration. *Journal of Ecotourism*, 17, 268–286.
- Truong, Y. (2010). Personal aspirations and the consumption of luxury goods. *International Journal of Market Research*, 52(5), 655–673.
- Tuntipisitkul, P., & Fuchs, K. (2023). The development of recreational scuba diving amid COVID-19: An exploratory interview study about how dive tourism is adapting to the new normal. *Tourism in Marine Environments*, 18(1–2), 19–33.
- Ugoani, J. N. (2014). Challenges of succession on family business success – Kitchen model. *Journal of Social Economics*, 14–25. [https://papers.ssrn.com/sol3/papers.cfm?abstract\\_id=2476300](https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2476300)
- Umarella, M. R., Baiquni, M., Murti, S. H., & Marfai, M. A. (2021). Sustainability challenges in developing marine-based adventure tourism in Ambon. In *IOP Conference Series: Earth and Environmental Science*. 744(1), 012093. IOP Publishing.
- Vijayabanu C., & Karthikeyan S. (2021). Digital transformation and the competitive advantage of global tourism. In M. G. Dinis, L. Bonix, S. Lamy, & Z. Breda (Eds.), *Impact of new media in tourism* (308–326). IGI Global.
- Williams, R., Veirs, S., Veirs, V., Ashe, E., & Mastick, N. (2019). Approaches to reduce noise from ships operating in important killer whale habitats. *Marine Pollution Bulletin*, 139, 459–469.
- Xu, Q. (2019, July 24–28). Optimal design of smarter tourism user experience driving by service design. In *International Conference on Applied Human Factors and Ergonomics*, Washington DC, USA.

# Appendix

**Table A1.** Excerpt of questions that were used in the interviews.

No.	Questions
1.	Can you tell us about the overall situation of the longtail boat tour operator’s business in Phuket?
2.	Can you describe the major challenges or problems currently faced by longtail boat tour operators in Phuket?
3.	What adaptation strategies have you observed or implemented to address the challenges posed by the evolving marine business landscape?
4.	Can you provide examples of successful adaptations or transformations made by longtail boat tour operators?
5.	Do you notice any change in customer preferences and expectations?
6.	In what ways have longtail boat tour operators incorporated service design and technology to enhance the operations and improve customer experience?
7.	What marketing and promotional strategies have been effective for longtail boat tour operators in attracting visitors and expanding the customer base?
8.	How have longtail boat tour operators collaborated with other stakeholders, such as local communities and government agencies, to overcome challenges?
9.	What lessons or insights can be shared from your experiences in navigating change as a longtail boat tour operator?
10.	How do you envision the future of longtail boat tour operators in the face of ongoing changes in the marine tourism industry?

Note: These questions can be modified or expanded based on the participants’ responses during the interview.