

Tourism Industry Supply Chain through Stakeholder Participants: Facing Environment Uncertainty of Post Pandemic COVID-19

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Abstract

The environmental uncertainty due to the COVID-19 pandemic poses severe challenges for all parts of the supply chain in the tourism industry. The focus of the Indonesian government is to improve the condition of the tourism industry, which has experienced a decline in the number of tourists due to the COVID-19 pandemic. A supply chain tourism industry framework was developed through the Support System Facilities (SSF) variable to map the actors in the tourism industry activities in an uncertain environment due to COVID-19. The method in this study uses a qualitative descriptive approach through in-depth interviews, direct observation, and literature study. The results of this study are the tourism industry supply chain conceptual framework which states that there are several stages in distributing services and support systems and facilities to tourists, namely through suppliers, tour operators, tour agencies, and tourists. This finding has practical implications for the government in making a policy strategy.

1. INTRODUCTION

Tourism is an important sector that drives economic development and has a strategic position in increasing foreign exchange in many countries (Fatima *et al.*, 2020; Kaushal *et al.*, 2021; Bojanic and Lo, 2016; Septiningrum *et al.*, 2022; Statistics Indonesia, 2019). Governments in several countries are trying to increase the economic benefits derived from the development of the tourism sector (Drvenkar *et al.*, 2015; Camilleri, 2018), especially Indonesia, which has a lot of tourism potential to support tourism industry activities (Septiningrum *et al.*, 2022; Sulistyadi *et al.*, 2019). In Indonesia, tourism is one of the largest foreign exchange contributor sectors (Statistics Indonesia, 2019). Indonesia has many beautiful natural attractions and a rich diversity of cultures and local wisdom, ranging from traditional cuisine, music and performing arts.

Rembang is one of Indonesia's regions with a lot of tourism potential, both natural, cultural, artificial, and culinary (Septiningrum *et al.*, 2022; DISPORA, 2020). During the COVID-19 pandemic, regional income from the tourism sector has decreased because the number of tourists has dropped dramatically. Based on data from the Rembang Regency Statistics Center, in 2020, the number of domestic tourists decreased by 33% from

2019, and foreign tourists decreased by 75% (Statistics of Rembang Regency, 2021a) which is shown in Table 1.

Tabel 1.
Number of Tourist in Rembang

Year	Tourist	
	Domestic	Foreign
2018	79652	597
2019	79848	313
2020	53456	75

The Government of Rembang Regency has made efforts to develop the potential and restore the existence of tourism during the COVID-19 period by optimizing the digitalization of promotions through the Tourism Information Center and tourism promotion content managed by the Tourism Office (Statistics of Rembang Regency, 2021b). The main goal of tourism development by the government is to restore the regional economy gradually to achieve high population welfare in the present and the future (Dwyer, 2022). However, several problems arise, such as there are still many tourists who do not know the various beautiful nature and tourism potentials in Rembang Regency. In addition, there is no better added value from the facilities and services provided to tourists when visiting tourist destinations in Rembang Regency.

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In fact, the facility system is an important thing that must be fulfilled for tourists because it shows the quality of tourism in an area (Lickorish and Jenkins, 2007; Lohmann and Netto; 2016). All facility systems contained in the tourism industry in Rembang Regency, Central Java, Indonesia, are expected to be conveyed to visiting tourists. Improvement and mapping of service processes to customers can improve the quality of the product (Achmad et al., 2023a; Achmad et al., 2023b), especially products in the tourism industry. Therefore, the surrounding community as service providers need to be more concerned about tourists as consumers, so that they can apply the concept of Tourism Supply Chain (TSC) (Dewi et al., 2019).

The tourism supply chain generally involves business-to-business (B2B) and business-to-consumer (B2C) relationships in the tourism industry (Dewi et al., 2018). The supply chain in the tourism industry involves many different stakeholders. Therefore, it is interesting to trace the supply chain of the tourism industry to uncover supply chain actors in the tourism industry and analyze the role of each of them. By mapping the tourism industry supply chain model, it is expected to provide added value from tourism industry activities (Dewi et al., 2019; Dewi et al., 2018). Thus, aligning demand and services for the better from suppliers to tourists (González-Torres et al., 2021; Sriwana et al., 2022). Research (Palang et al., 2018; Kazandzhieva et al., 2019) has investigated and developed a tourism supply chain management (SCM) performance evaluation framework, but in this study, the focus was on order process management (OPM), supplier relationship management (SRM), service performance management (SPM). This study will focus on each stage by reviewing the support system facilities variables so that tourists can enjoy them. By increasing the added value of activities in the tourism industry, tourists get satisfaction in tourism. If tourists are satisfied with tourism, it will be followed by income and the economy of the community around the tourist area will also increase. In addition, mapping the value chain of the tourism industry helps the government make a policy to improve the performance of the tourism industry in Rembang Regency through related stakeholders.

2. LITERATURE REVIEW

2.1 Supply Chain Tourism

Supply Chain Management (SCM) is the integration of a series of business activities from supplier/primary production, transformation, and marketing to final consumer to the customer (Stadtler, 2008; Gereffi et al., 2003). Meanwhile, Supply Chain Tourism is a network of tourism

organizations integrated into various product or service components that are distributed to tourists through various roles (Zhang et al., 2009; Palang and Tippayawong, 2018). Supply chain has a dynamic nature and involves 3 flows namely, information flow, product/service flow and financial (Chopra & Meindl, 2007). In a dynamic environment, the tourism industry often faces higher fluctuations in demand that are difficult to predict due to competition between other industries (Palang and Tippayawong, 2018). Management that runs well between each level in the supply chain makes the supply chain flow run well and is expected to be cost-effective and foster customer satisfaction. Tourism products are diverse and structured and contain various service components, such as accommodation, dining, transportation, travel, and shopping centers (Palang and Tippayawong, 2018).

2.2 Tourism Industry

The tourism industry is one of the largest industries that integrate various sectors of tourism activities and supports more complex tourism activities (Theobald, 2005). The tourism industry will continue to develop complexly. According to (Lohmann & Netto; 2016), the tourism industry is an activity that involves many agents and sectors and requires complex integration among those responsible for its development. Meanwhile, according to the Government Regulation concerning the National Tourism Development Master Plan for 2010 – 2025 the Tourism Industry is a collection of Tourism Businesses that are interrelated to produce goods and/or services to meet the needs of tourists in implementing tourism.

2.3 Stakeholder in Tourism Industry

The tourism sector is supported by regulators or facilitators, supporters, or owners of tourism capital, as well as local communities (Hartati et al., 2020). The government's role in tourism development oversees making systematic policies and planning. More and more stakeholders are involved in the decision-making process for resource integrators who will jointly create ecosystem value in tourist attractions and attractions (Birendra et al., 2021; Serravalle et al, 2019).

3. METHODOLOGY

This research was conducted with a descriptive qualitative approach. This approach can help researchers identify and explore phenomena in more depth to design a tourism supply chain model. The case study reviewed in this research is the Rembang Regency, Central Java, Indonesia tourism industry. Rembang Regency has a lot of tourism potential that supports tourism industry activities. The steps in this research start from the

phenomenon of tourism potential in Rembang Regency, which cannot be conveyed to tourists. Then a literature study was carried out from articles that examined supply chain research in the tourism industry. In addition, observations and in-depth interviews were carried out regarding relevant stakeholders. The end of the research is the conceptual framework for mapping the tourism industry supply chain.

A supply chain management model for the tourism industry was developed to analyze the role of each stakeholder at each stage. The development

of supply chain model for the tourism industry was developed based on important variables in developing tourism potential in an area, namely the Support System Facilities variables (Lickorish and Jenkins, 2007; Septiningrum *et al.*, 2022; Mahaputra, 2018; Wulung, 2021; Mulwa *et al.*, 2018). Support systems and facilities are services developed either directly or indirectly to support and encourage tourism potential (Lickorish and Jenkins, 2007; Septiningrum *et al.*, 2022; Achmad *et al.*, 2023a). Figure 1 shows the conceptual model of the Support System Facilities variable.

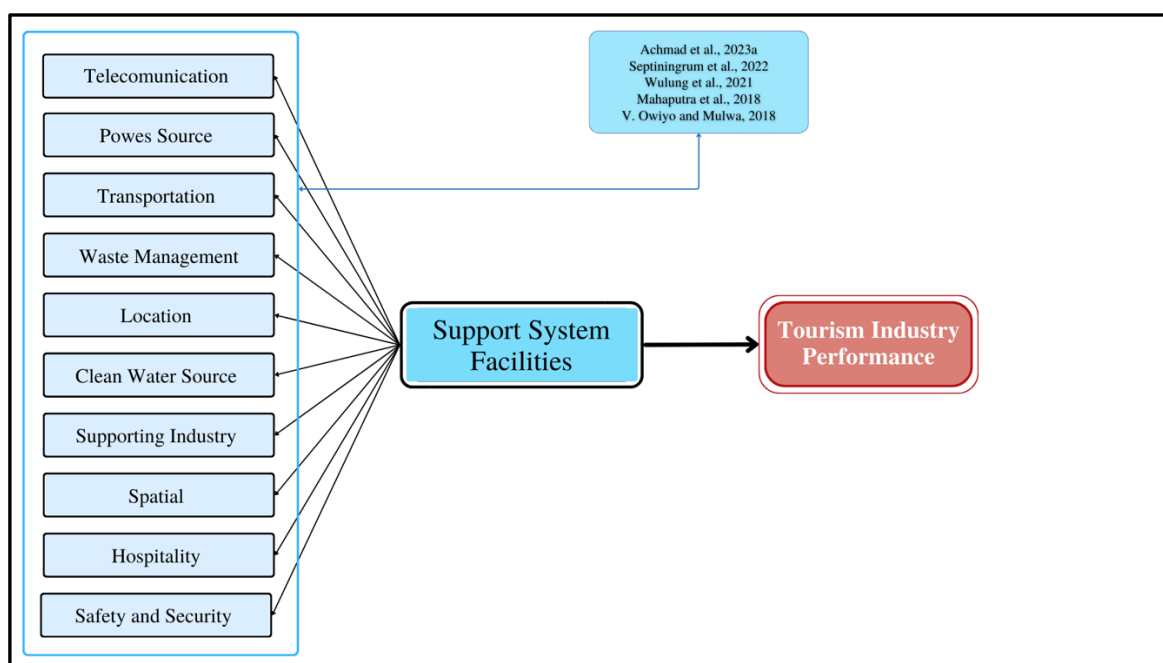


Figure 1.
Variable of Support System Facilities

Several data collection techniques were used, namely in-depth interviews with relevant stakeholders and direct observation of the object of research. Determination of informants in interviews using a purposive sampling technique that meets several criteria (Sugiyono, 2013). The selected respondents are those related to the research topic, namely village leaders, tourism sector coordinators, SMI sector coordinators, business owners, tourists, travel agents, and tour operators.

4. RESULT AND DISCUSSION

After being hit by the COVID-19 pandemic, many countries have lost income from the tourism sector, one of them being Indonesia. During the pandemic, the central and regional governments are trying to maintain economic stability by promoting tourism to the public to visit tourist destinations. Tourists want quality tourism

activities. Because the main function of the tourism industry is to serve tourists (Sara *et al.*, 2021; Leković *et al.*, 2020). The role of the supply chain is to provide added value that must be felt by all tourists visiting tourism (González-Torres *et al.*, 2021; Sriwana *et al.*, 2022; Janvier-James, 2012).

The development of the supply chain model is based on several theories and references to previous research models (González-Torres *et al.*, 2021; Rumanti *et al.*, 2020). In addition, a supply chain network analysis was carried out based on observations in the tourism industry in Rembang Regency, Central Java, Indonesia. The purpose of supply chain diagrams is not to discuss the relationship of entities alone but to allow and think about with whom they interact in the supply chain (No, 2016; Achmad *et al.*, 2023c).

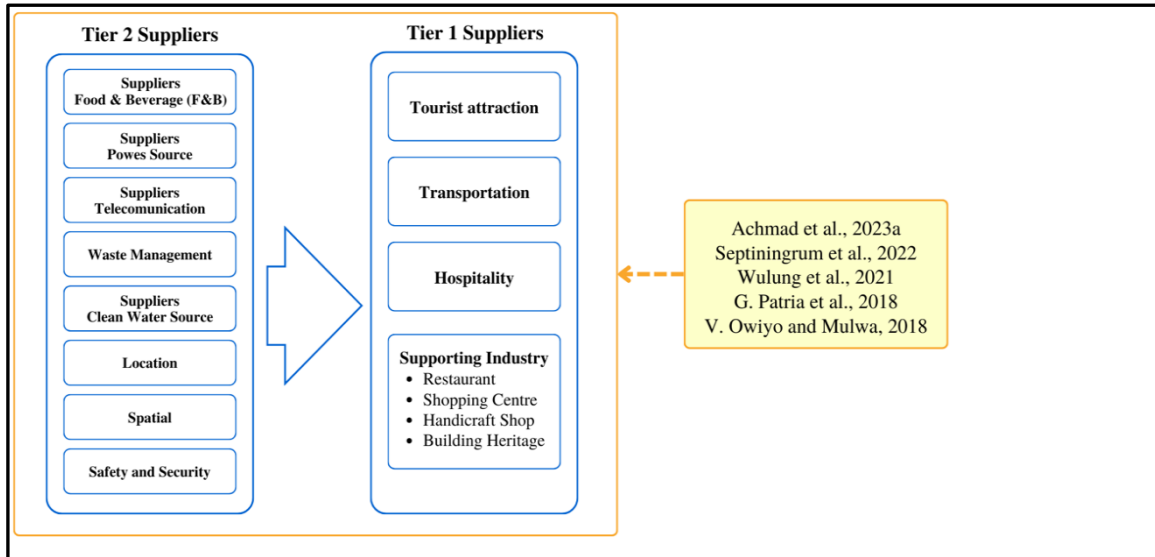


Figure 2. Suppliers in the Tourism Industry Supply Chain

Variables support systems and facilities are variables designed to measure and develop tourism potential in an area (Lickorish and Jenkins, 2007; Septiningrum *et al.*, 2022; Mahaputra, 2018; Wulung, 2021; Mulwa *et al.*, 2018). To develop tourism in Rembang Regency, the support system variables should be able to be delivered to tourists visiting tourist destinations in Rembang Regency. With the fulfillment of all support systems and facilities by tourists, it is hoped that they will be able to provide customer satisfaction to tourists (Lickorish and Jenkins, 2007; Septiningrum *et al.*, 2022). This study's support system facilities variables include telecommunications, power sources, transportation, waste management, location, clean water sources, supporting industry, spatial, hospitality, and safety and security. Therefore, Figure 2 describes the support system variables in this study as tier 1 suppliers and tier 2 suppliers, which will be mapped for each stakeholder involved in these stages.

Tour operators and travel agents act as distributors and deliver suppliers containing variable support systems and facilities to tourists (Gereffi *et al.*, 2003, Zhang *et al.*, 2009; Palang and Tippayawong, 2018). In addition, tourists can also enjoy products or services from suppliers directly without going through intermediaries. However, most of the tourism industry will form a unity in activities (Lickorish and Jenkins, 2007; Bojanic and Lo, 2016), one of which is serving tourists with agents or tour operators Zhang *et al.*, 2009; Palang and Tippayawong, 2018). Tour agents represent tourism products and services to customers. They help generate interest and promote products and services. In addition, tour agents play an important role in building relationships with customers and helping to fulfill their needs. Tour agents help process customer orders and guarantee that all the necessary details are available and in order. Therefore, it is illustrated in Figure 3 that products or services from suppliers will be delivered to visiting tourists through tour operators and travel agents.

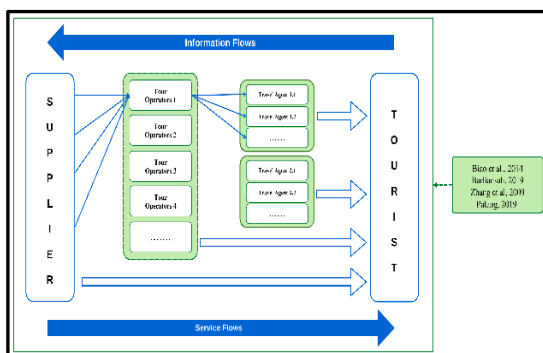


Figure 3. Tour and Travel Agent in the Tourism Industry Supply Chain

From the model constructs and previous explanations, it is necessary to have local government and regulations to support the development of the tourism industry in an area (Septiningrum *et al.*, 2022; No, 2016). The local government of Rembang Regency has supported the development of the tourism industry through the Rembang Regency Regional Regulation No. 12 of 2019 concerning the Rembang Regency Tourism Development Master Plan for 2019-2025. Rembang Regency has implemented various strategies for developing the tourism industry in areas with potential (Statistics of Rembang Regency, 2021b; BPS, 2021). In addition, (Septiningrum *et al.*, 2022) states that local governments also support the efforts

of the Ministry of Tourism to promote potential tourism in Indonesia. Therefore, the role of local government is very useful in supporting success and plays an important role in the supply chain of the tourism industry.

Every component in the tourism industry, which consists of support systems and facilities as suppliers, tour operations and travel agents as distributors, and tourists as consumers, becomes a unit in the tourism industry activities. The integration of synergies between service providers in the tourism industry activities will increase performance and provide a positive experience for each tourist (Camilleri, 2018). Therefore, mapping the supply chain in the tourism industry, it is expected to clarify every activity in it (Dewi et al., 2018; González-Torres et al., 2021; Sriwana et al., 2022). With a mapped framework, one can generate the first, increased visibility; mapping the supply chain of the tourism industry provides a clear view of all stakeholders involved, their roles, and interdependencies. Second, better coordination; by

mapping the supply chain, all stakeholders can identify opportunities for collaboration, reducing inefficiencies and improving coordination. Third, enhanced planning; the mapping process provides a basis for identifying and prioritizing areas for improvement, enabling better planning and decision-making. Fourth, better allocation of Resources; by understanding the supply chain, resources can be allocated more effectively, leading to improved performance and cost savings. Fifth, Improved customer satisfaction; mapping the supply chain allows the identification of pain points and opportunities for improving customer experience, thereby increasing customer satisfaction (Dewi et al., 2018; González-Torres et al., 2021; Sriwana et al., 2022; Zhang et al., 2009; Palang and Tippayawong, 2018). From the explanation of each of these stages, an overall elaboration is obtained, which is used as a conceptual model for the tourism industry supply chain framework shown in Figure 4.

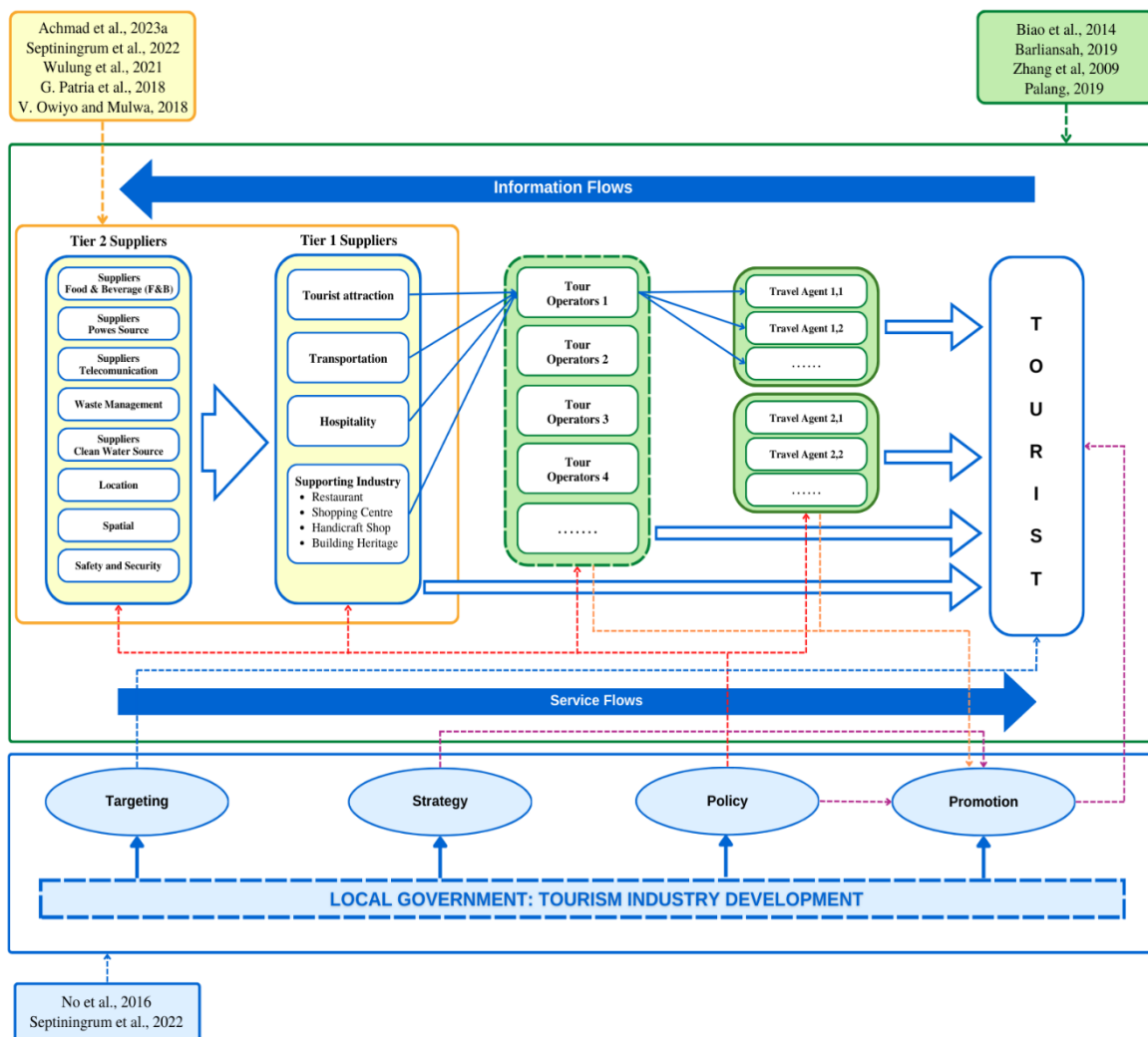


Figure 4. Result Elaboration Model of the Supply Chain Touris

The purpose of constructing a supply chain model for tourism in Rembang Regency, Central Java, Indonesia, is to map the stakeholders involved in tourism industry activities. So that it can be used to make recommendations to the government on how to maximize service flow, information flow, and profits in tourism industry activities (Chopra & Meindl, 2007). That way, it can increase added value for the tourism industry in Rembang Regency, Central Java, Indonesia. The increased value added in the tourism industry in Rembang Regency will impact the people around the tourist area to get jobs. Thus, it is necessary to map the supply chain in the tourism industry. Figure 4 shows the results of elaborating the supply chain tourism model.

5. CONCLUSIONS

This study develops a supply chain model in the tourism industry to uncover supply chain stakeholder in the tourism industry and analyze the role of each actor. This will provide added value for tourism industry activities so that they can align services for the better from suppliers to tourists. If tourists are satisfied with tourism, the income and economy of the community around the tourist area will also increase. The results of this study state that there are several stages in distributing services and support systems, and facilities to tourists, namely through suppliers, tour operators, tour agencies, and tourists. This finding has practical implications for the government in making policy strategies. Based on the results of the research that has been done, this model aims to be the basis for further development into a simulation model, and there are several opportunities that can be developed for further research.

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