



## REVITALIZATION OF THE LAKE TOBA AREA: SWOT ANALYSIS IN THE ECONOMIC DEVELOPMENT OF THE NORTH SUMATRA REGIONAL

Feby Milanie<sup>1</sup>, Azhar Paras Muda Hasibuan<sup>2</sup>, Yustina Rizki Hasibuan<sup>3</sup>, Yusen Effendy<sup>4</sup>, Suhenpi Laia<sup>5</sup>, Hendra Gunawan Halawa<sup>6</sup>, Nasti Hasyim Nasution<sup>7</sup>, Afrida Nursanti<sup>8</sup>, Rita Efriyenni R<sup>9</sup>

<sup>1,2,3,4,5,6,7,8,9</sup>Universitas Pembangunan Panca Budi Medan

Corresponding E-mail: [febymilanie.unpab@gmail.com](mailto:febymilanie.unpab@gmail.com)

### Abstract

The Lake Toba area has great potential as an attractive tourist destination and as the main driving force for regional economic growth in North Sumatra. SWOT analysis is used as the main basis for designing a revitalization strategy for this area. SO and ST strategies utilize internal strengths to optimize external opportunities and overcome threats. However, the relationship between WO and WT strategies presents complexity, where they complement each other despite potential contradictions. This understanding of SWOT provides a comprehensive view of the factors influencing regional economic development, enabling the formulation of integrated strategies. This strategy includes improving tourism infrastructure, developing local community skills, and integrated regulations. Support from the central government, international institutions and the private sector is essential in implementing this strategy. With this holistic approach, it is hoped that the revitalization of the Lake Toba area can make a significant contribution to economic growth and welfare of local communities, while ensuring the preservation of the environment and local culture.

Keywords: *Lake Toba, Revitalization, SWOT Analysis, Development Strategy, Tourism Potential, North Sumatra, Tourism Infrastructure*

### 1. INTRODUCTION

Geographically, the Lake Toba area is unique with an area of around 1,145 square kilometers, making it one of the largest lakes in the world and a super volcanic crater.[1], [2]. Its stunning natural beauty, rich local culture and abundant natural resource potential make it a popular tourist destination for both domestic and foreign tourists. However, its potential is much wider than just a tourist attraction. Eight districts surround the Lake Toba tourist area, namely Toba Regency, Samosir Regency, Simalungun Regency, Dairi Regency, North Tapanuli Regency, Karo Regency, Humbang Hasundutan Regency, and Pakpak Bharat[3], [4], has various economic potentials that can be developed. If this potential is utilized properly, it can become the main driving force for North Sumatra's economic growth. However, tourism development in the Lake Toba area is also faced with various challenges and obstacles. Problems such as inadequate infrastructure, lack of accessibility, and lack of effective destination management and marketing are several things that need to be addressed to optimize tourism potential in this region.

In this context, SWOT analysis (Strengths, Weaknesses, Opportunities, Threats)[5], [6], [7], [8], [9]is a relevant approach for formulating development strategies for the Lake Toba area. This analysis makes it possible to identify internal strengths, weaknesses, opportunities and external threats that can influence the success of tourism development. This research aims to design a development strategy for the Lake Toba area using a SWOT analysis approach as the main basis. In this way, it is hoped that it can make a real contribution to efforts to advance Indonesian tourism as a whole, especially in the context of regional economic development in North Sumatra. Tourism development using SWOT analysis places this strategy in quadrant I, which supports an aggressive strategy between internal strengths and external opportunities[10]. This strategy is the main focus in tourism development by presenting souvenir products, typical culinary tourism, as well as providing public facilities such as rubbish dumps, public toilets, places of worship and health

**REVITALIZATION OF THE LAKE TOBA AREA: SWOT ANALYSIS IN THE ECONOMIC DEVELOPMENT OF THE NORTH SUMATRA REGIONAL**

*Feby Milanie<sup>1</sup>, Azhar Paras Muda Hasibuan<sup>2</sup>, Yustina Rizki Hasibuan<sup>3</sup>, Yusen Effendy<sup>4</sup>, Suhenpi Laia<sup>5</sup>, Hendra Gunawan Halawa<sup>6</sup>, Nasti Hasyim Nasution<sup>7</sup>, Afrida Nursanti<sup>8</sup>, Rita Efriyenni R<sup>9</sup>*

facilities. Collaboration between the government and investors is carried out to develop lodging facilities such as hotels and resorts, as well as improving road facilities to increase accessibility for tourists. The development of tourist attractions aims not only to increase tourism attractiveness, but also to encourage economic growth and improve the welfare of the surrounding community [11], [12], [13]. Tourism plays an important role in driving the economy and creating jobs around Lake Toba. This is based on the great potential that the tourism sector has to increase regional income, stimulate other sectors such as trade and services, and provide opportunities for local communities to be involved in various economic activities related to the tourism industry. With amazing natural potential, cultural diversity and various interesting tourist attractions, Lake Toba is a magnet for domestic and foreign tourists. By developing tourism infrastructure, promoting destinations, and empowering local communities, Lake Toba's tourism potential can be optimized to make a significant contribution to regional economic growth and the welfare of the surrounding community. Revitalization of the Lake Toba area is a crucial step in driving the regional economy of North Sumatra. With undeniable tourism potential, there is a huge opportunity to increase tourist attraction and visitation. However, the development of adequate tourism infrastructure, together with a sustainable approach to the environment and preservation of local culture, is the key to success. Thus, through a careful SWOT analysis, we can identify important factors that will shape the future of the Lake Toba Region as a sustainable and attractive tourist destination.

## **2. IMPLEMENTATION METHOD**

This research is a type of descriptive research, which uses literature analysis methods with data collection techniques by conducting review studies of books, types of literature, notes and reports related to the problem to be solved. [14], [15], [16], [17]. The data analysis technique used in this research is SWOT analysis, which was chosen to obtain an in-depth understanding of the tourism situation through the introduction of external and internal elements that influence the tourist destination. This analysis helps formulate strategic plans by identifying opportunities and strengths, and addressing weaknesses and threats. The application of SWOT Matrix Analysis describes the opportunities and threats faced, adjusted to the strengths and weaknesses of the tourist park.

## **3. RESULTS AND DISCUSSION**

### **SWOT Analysis Results**

#### **1. SO Strategy**

Improving facilities to support integrated tourism development in Lake Toba requires a holistic and strategic approach involving various aspects of infrastructure, services and promotion. Improving roads, bridges and public transportation connecting Lake Toba with the surrounding large cities is very important. Good access increases tourist comfort and safety, and supports local mobility. The development of high-quality hotels, resorts and other accommodation is needed to meet the diverse needs of tourists. These facilities must be adapted to international standards to attract foreign tourists. There are adequate clinics or health centers around tourist areas to ensure the safety and health of tourists. Providing public facilities such as clean toilets, rubbish dumps, places of worship and adequate parking areas is very important to increase tourist comfort. Increasing the skills of local communities in the tourism sector through training and certification. This includes training in tour guides, hotel management, culinary and foreign language skills. Providing a tourist information center that can provide complete guidance to tourists regarding attractions, events and services at Lake Toba.



Implementation of an environmental conservation program to maintain the natural beauty and preservation of Lake Toba. This includes effective waste management and conservation of aquatic and terrestrial ecosystems. Encourage sustainable tourism practices that pay attention to environmental and social impacts. Tourists and tourism businesses are encouraged to engage in environmentally friendly and responsible activities. Involving local communities in the tourism development process to ensure equitable economic and social benefits. This can be done through the development of micro, small and medium enterprises (MSMEs) in the tourism sector.

## 2. WO Strategy

Preparing an integrated tourism development plan for Lake Toba by identifying and evaluating existing weaknesses, such as the lack of integrated regulations and policies as well as low awareness and involvement of local stakeholders. This weakness can be overcome by taking advantage of available opportunities, including support from central and regional governments, as well as collaboration with international and national institutions that focus on sustainable tourism development. The first step that must be taken is to form a multidisciplinary work team consisting of tourism experts, city planners, economists and community representatives. This team will be responsible for designing comprehensive and integrated regulations, which include the development of policies and operational standards for all aspects of tourism.

Community involvement and awareness are key elements in this strategy. Education and outreach campaigns must be carried out intensively to increase public and stakeholder understanding of the importance of integrated regulations. The development of supporting infrastructure is also an important aspect of integrated regulation. Public facilities and services such as transportation, accommodation and public facilities must be integrated into regulations to increase tourist comfort and satisfaction. In addition, environmental conservation must be an integral part of regulations to ensure that tourism development runs sustainably and does not damage the Lake Toba ecosystem.

Collaboration and strategic partnerships with the private sector and investors need to be improved to support the implementation of regulations and development of tourism infrastructure. In addition, building a collaborative network between regional governments around Lake Toba will ensure effective coordination and integrated implementation of regulations. With this integrated approach, the development of supporting facilities at Lake Toba will not only increase tourist attraction, but also contribute to improving the welfare of local communities and environmental sustainability. This strategy will make Lake Toba a competitive and sustainable world-class tourist destination.

## 3. ST Strategy

The strategy that has been designed to increase the capacity and capability of local governments around Lake Toba promises comprehensive and measurable steps. First of all, through ongoing training and education programs for local government officials, their skills and knowledge will be significantly improved. This program will cover tourism management, natural resource management, as well as an understanding of sustainable tourism regulations and policies. Building an effective coordination system between central, regional and other stakeholders will be the basis for better cooperation in developing tourism potential. By establishing regular communication and collaboration forums, issues related to tourism development can be discussed openly and synergistically. The use of information technology is also an integral part of this strategy. By

**REVITALIZATION OF THE LAKE TOBA AREA: SWOT ANALYSIS IN THE ECONOMIC DEVELOPMENT OF THE NORTH SUMATRA REGIONAL**

*Feby Milanie<sup>1</sup>, Azhar Paras Muda Hasibuan<sup>2</sup>, Yustina Rizki Hasibuan<sup>3</sup>, Yusen Effendy<sup>4</sup>, Suhenpi Laia<sup>5</sup>, Hendra Gunawan Halawa<sup>6</sup>, Nasti Hasyim Nasution<sup>7</sup>, Afrida Nursanti<sup>8</sup>, Rita Efriyenni R<sup>9</sup>*

utilizing information technology, a transparent and accountable monitoring and evaluation system can be created. This allows the success of every step and policy taken to be measured and improved as needed. However, this strategy is also faced with several challenges. Limited resources, whether human, financial or technological, can be an obstacle to effective implementation. In addition, resistance to change from certain parties and excessive dependence on external funding such as the private sector or international aid are also threats that need to be overcome. By identifying these strengths and threats, strategic steps can be taken to maximize the success of this strategy while managing the risks involved. Thus, it is hoped that this strategy can make a significant contribution in increasing tourism potential around Lake Toba and advancing regional government as a whole.

#### **4. WT Strategy**

Standardization of integrated tourism development planning, the method adopted mainly focuses on collecting in-depth data on the tourism potential of the region. This data covers various aspects such as natural wealth, cultural heritage, existing infrastructure, as well as relevant market trends and demands. By conducting a thorough analysis of these data, it will be possible to formulate appropriate and sustainable planning standards, with success criteria measured from various dimensions, including economic sustainability, environmental preservation and local community empowerment. The initial step in this process is the formation of a long-term strategic plan which includes identifying clear goals and determining the strategic steps needed to achieve them. This plan not only considers aspects of environmental management and effective marketing strategies, but also takes into account the active participation of local communities in decision making regarding tourism development. Furthermore, setting standards for developing tourism infrastructure is a priority. This standard covers various aspects such as accessibility, accommodation facilities and other supporting facilities. By ensuring adequate infrastructure, it is hoped that the tourist experience can be significantly improved.

The application of standards also occurs in the management of tourist destinations, which includes regulating tourist traffic, environmental conservation efforts, and related risk management. This aims to ensure that tourism destinations maintain their sustainability, safety, and the authenticity and uniqueness of their culture. Empowering local communities is also a key focus with the setting of standards for skills training, participation in decision-making processes, and fair sharing of economic benefits. These steps are aimed at creating a greater positive impact on local communities and improving their welfare in a sustainable manner. Standardization is also needed in developing diverse and quality tourism products, taking into account the diverse needs and preferences of tourists. With this approach, it is hoped that all aspects of tourism development can be carried out in an integrated manner, providing maximum benefits for all parties involved, and producing a significant positive impact for the region.

#### **Discussion**

SWOT (Strengths, Weaknesses, Opportunities, Threats) analysis is a very relevant tool for understanding the dynamics involved in these revitalization efforts. The SO (Strengths-Opportunities) strategy can be seen as an integral part of revitalization efforts, as it leverages existing strengths in improving tourism support facilities, such as improved infrastructure and skills development of local communities, to take advantage of opportunities in regional economic development.





The WO (Weaknesses-Opportunities) strategy highlights weaknesses in integrated tourism development planning in Lake Toba, which can be overcome by taking advantage of existing opportunities, such as support from the central government and international institutions. This strategy directly supports the goal of revitalizing the Lake Toba area to improve the regional economy. The ST (Strengths-Threats) strategy emphasizes increasing the capacity of local governments around Lake Toba and involves effective coordination to overcome threats such as limited resources. By increasing capacity and coordination, this strategy supports regional economic revitalization and development efforts. The WT (Weaknesses-Threats) strategy highlights the need for standardization in integrated tourism development planning, which is an important part of efforts to revitalize the Lake Toba area. By identifying weaknesses and addressing challenges, this strategy aims to achieve sustainable regional economic development.

There is a complex relationship between WO (Weaknesses-Opportunities) and WT (Weaknesses-Threats) strategies, which gives rise to potential contradictions. The WO strategy highlights internal weaknesses such as a lack of integrated planning, which can be overcome by exploiting external opportunities such as support from central government and international institutions. On the other hand, WT strategies highlight the need to overcome internal weaknesses, such as standardization in planning, to face external challenges, such as resistance to change. Even though at first glance, WO and WT seem to be opposites, they actually complement each other in the context of the revitalization of the Lake Toba area. While the WO strategy emphasizes using external opportunities to overcome internal weaknesses, the WT strategy highlights the importance of addressing those internal weaknesses before facing external challenges. Thus, even though there are potential contradictions, the two can be integrated synergistically in revitalization efforts. Overall, the SWOT analysis in the context of the revitalization of the Lake Toba area provides a comprehensive view of the internal and external factors that influence regional economic development efforts in North Sumatra. By understanding existing strengths, weaknesses, opportunities and threats, strategic steps can be designed to maximize potential and overcome challenges in realizing the revitalization goals.

#### 4. CONCLUSION

In the SWOT analysis for the revitalization of the Lake Toba area, SO and ST strategies utilize internal strengths to optimize external opportunities and overcome external threats. Meanwhile, WO and WT strategies face potential contradictions, where WO emphasizes the use of external opportunities to overcome internal weaknesses, while WT highlights the need to overcome internal weaknesses before facing external challenges. Even though at first glance the two appear to be opposites, they actually complement each other in efforts to revitalize the Lake Toba area. SWOT analysis provides a comprehensive view of the factors influencing regional economic development, enabling the formulation of integrated strategic steps to achieve revitalization goals.

#### REFERENCES

- A. Mukhlisin and MH Pasaribu, "SWOT ANALYSIS IN MAKING DECISIONS AND TAKING THE RIGHT POLICIES," 2020.
- B. Budiandrian, T. Budiarto, and V. Hikmatyar, "Participation of Village Communities and Business Actors in Sustainable Tourism Development in Toba Regency," 2023.

**REVITALIZATION OF THE LAKE TOBA AREA: SWOT ANALYSIS IN THE ECONOMIC DEVELOPMENT OF THE NORTH SUMATRA REGIONAL**

*Feby Milanie<sup>1</sup>, Azhar Paras Muda Hasibuan<sup>2</sup>, Yustina Rizki Hasibuan<sup>3</sup>, Yusen Effendy<sup>4</sup>, Suhenpi Laia<sup>5</sup>, Hendra Gunawan Halawa<sup>6</sup>, Nasti Hasyim Nasution<sup>7</sup>, Afrida Nursanti<sup>8</sup>, Rita Efriyenni R<sup>9</sup>*

- Baburrahman, W. Rasaili, and R. Yulastina, "DEVELOPMENT OF COMMUNITY BASED TOURISM (CBT) AS AN EFFORT FOR COMMUNITY CREATIVE ECONOMIC EMPOWERMENT IN SLOPENG VILLAGE," Proceedings of the National Seminar of the Faculty of Social and Political Sciences, vol. 1, pp. 218–224, 2024.
- D. Assyakurrohim, D. Ikhrum, RA Sirodj, and MW Afgani, "Case Study Method in Qualitative Research," Journal of Science and Computer Education, vol. 3, no. 01, pp. 1–9, Dec. 2022, doi: 10.47709/jpsk.v3i01.1951.
- DJ Prihadi, SB Annida, F. Kristiadhi, AP Dhahiyat, and NS Junirahma, "Development Strategy of Madasari Beach Marine Tourism, Pangandaran Regency, Indonesia," Formosa Journal of Multidisciplinary Research, vol. 3, no. 1, pp. 221–232, Jan. 2024, doi: 10.55927/fjmr.v3i1.7954.
- DM Sasoko and I. Mahrudi, "JOURNAL OF INTERDISCIPLINARY STUDIES PERSPECTIVE OF SWOT ANALYSIS TECHNIQUES IN ACTIVITY PLANNING," 2023.
- G. Pakpahan, RPK Sinaga, and H. Thamrin, "The Impact of Tourism Village Development on Improving the Welfare of the Pearung Village Community, Paranginan District, Humbang Hasundutan Regency," RISOMA: Journal of Social Humanities and Education Research, vol. 2, pp. 74–83, 2024.
- GY Tampubolon and I. Zulian, "Unesco and Indonesia Collaboration in Lake Toba Tourism Development Through the Global Geopark Program," Action Research Literate, vol. 8, no. 3, 2024, [Online]. Available: <https://arl.ridwaninstitute.co.id/index.php/arl>
- J. Babakan Sari No, K. Bandung, and J. Barat, "SWOT Analysis in Determining Study Course and Training Strategies at LKP Sunakis Institute in Bekasi Sunarni STIE Dharma Negara," Journal of Management, Economics and Entrepreneurship, vol. 1, no. 4, pp. 223–236, 2023, doi: 10.58192/wawasan.v1i4.1260.
- Mahanum, "Literature Review," ALACRITY : Journal Of Education, vol. 1, no. 2, pp. 1–12, 2021.
- M. Hanif, N. Luh, Y. Dewi, A. Hidajad, A. Fikri, and F. Saleh, "Restrengthening Community-Based Disaster Management: Learning from Local Wisdom in Indonesia," International Journal of Demos, vol. 4, no. 4, 2022.
- M. Ridwan, S. AM, B. Ulum, and F. Muhammad, "The Importance Of Application Of Literature Review In Scientific Research," 2021. [Online]. Available: <http://journal.fdi.or.id/index.php/jmas/article/view/356>
- N. Ahyani and N. Kesumawati, "An Analysis of Strength, Weakness, Opportunity, and Threat (SWOT) Implementation of E-Learning During the Covid-19 Pandemic," 2021.
- N. Lousiane, D. Abdul, and W. Syaroni, "Analysis of Strengths, Weaknesses, Opportunities, and Threats (SWOT) for Business of Laboratory Competency Training," 2020.
- R. Dyah Pekerti, AS Khodijah, R. Hillia, and A. Syifa, "Community Economic Development with Agrotourism in Sirnagalih Village, Bantarkalong, Tasikmalaya Regency," 2024.
- RK Sari, "LITERATURE RESEARCH IN INDONESIAN LANGUAGE EDUCATION DEVELOPMENT RESEARCH," Borneo Humaniora Journal, pp. 60–69, 2021.
- R. Sidauruk and H. Saksono, "Creative Economy as a City Branding Basis for Integrated Tourism in the Lake Toba Region," 2018.