

The Development of Wellness Tourism in Curug Wadas Malang, Mangkang, Semarang

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Received: June 30, 2024

Revised: July 27, 2024

Accepted: August 25, 2024

Published: August 31, 2024

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DOI: [10.29303/jppipa.v10iSpecialIssue.9089](https://doi.org/10.29303/jppipa.v10iSpecialIssue.9089)

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Abstract: The research aims to develop Curug Wadas Malang in Mangkang as a wellness tourism destination within Semarang City. Utilizing field research, the study involved direct observation and interaction with individuals in their natural environment, as outlined by Sugiyono (2018). Observations were conducted in the Curug Wadas Malang forest area, alongside interviews with forest rangers, local residents, and Indonesian Red Cross (PMI) officers. This dual approach of simultaneous observations and interviews facilitated comprehensive data collection. In addition to fieldwork, a thorough literature review was undertaken to explore existing health tourism examples that incorporate natural elements such as forests, rivers, and waterfalls. The data gathered from both the literature and field research were thematically analyzed following the methodology proposed by Braun, Clarke & Hayfield (2022). The analysis revealed four key themes: the potential for wellness tourism at Curug Wadas Malang, the advantages of integrating forest, river, and waterfall elements in wellness tourism, a case study of Hoshinoya Karuizawa in Japan, and another case study from Kaua'i in Hawaii. The findings indicate that Curug Wadas Malang possesses significant natural resources and social capital through Community-Based Disaster Preparedness (CBDP) initiatives led by local communities. Therefore, a community-based tourism approach is recommended. This strategy emphasizes involving local populations in planning and implementing health tourism initiatives, enhancing disaster preparedness efforts while promoting sustainable tourism that benefits the community economically and socially.

Keywords: Forest; River; Semarang; Waterfall; Wellness Tourism

Introduction

As per the Global Wellness Institute, the increasing demand for wellness tourism has resulted in the development of distinctive and comprehensive travel experiences that integrate physical and mental well-being. Yoga, meditation, and spa therapies are frequently integrated into these experiences, which aim to enhance overall health and wellness through outdoor activities such as hiking and nature immersion. For instance, retreats such as Gwinganna Lifestyle Retreat in Australia and NIHI Sumba in Indonesia provide transformative experiences that link participants with horses to facilitate therapeutic processes, self-discovery, and healing. The increasing prevalence of wellness-focused travel is a reflection of the growing emphasis on

health and well-being, which is driving the development of these holistic travel experiences. This trend is especially apparent among men, who are now more inclined to participate in wellness activities, including mindfulness, breathwork, and meditation retreats, in order to alleviate tension and reestablish a connection with themselves (Suban, 2022).

Wellness tourism has grown in popularity worldwide during the last two decades, and even five decades, with a major increase in research and publications on the subject. Anticipated consumer demands in the post-pandemic tourist future are projected to sustain this ongoing growth (Ronda et al., 2022; Zhong et al., 2021). Tourism frequently encompasses activities that occur in natural environments, including ecotourism and adventure

How to Cite:

Prabowo, H., Prasetyo, A., & Ockta, Y. (2024). The Development of Wellness Tourism in Curug Wadas Malang, Mangkang, Semarang. *Jurnal Penelitian Pendidikan IPA*, 10(SpecialIssue), 659–664. <https://doi.org/10.29303/jppipa.v10iSpecialIssue.9089>

tourism, which are closely associated with wellness tourism. These activities are analyzed in terms of tourist behavior and destination management (Cruice et al., 2003). The development of wellness tourism travel experiences is influenced by the growing emphasis on health benefits, happiness and well-being, visitors' freedom to select their destination, and ultimately, visitors' intention to return (Dillette et al., 2021; Dini & Pencarelli, 2022).

Curug Wadas Malang Mangkang is a waterfall located in Malang, Semarang is a natural landscape characterized by its lush forest, flowing river, and picturesque waterfall. It is situated in Dusun Plumbon, Desa Wonosari, Mangkang District, Semarang City. At first, the region was mostly recognized by local visitors for its abundant forests, rivers, and waterfalls. This forest is an area of KPH (Forest Management Unit) Kendal BKPH (Forest Management Unit) Mangkang. In addition to being a local tourist destination, the area is also known as a natural disaster area for flooding. Fortunately, in 2021, the Semarang City Red Cross established SIBAT (Siaga Bencana Berbasis Masyarakat) or CBDP (Community-Based Disaster Preparedness) as a response to the community's need to have the ability to deal with disasters, such as floods that often occur in this area (Filep, 2014; Hekmat et al., 2022). The SIBAT in this region has implemented a variety of community-based initiatives, including community training, team organization, and aid collection, as evidenced by their observations. The SIBAT collaborates with the local government and other groups to enhance its efficacy in managing disasters. Ultimately, SIBAT also proactively undertook the development of ecotourism.

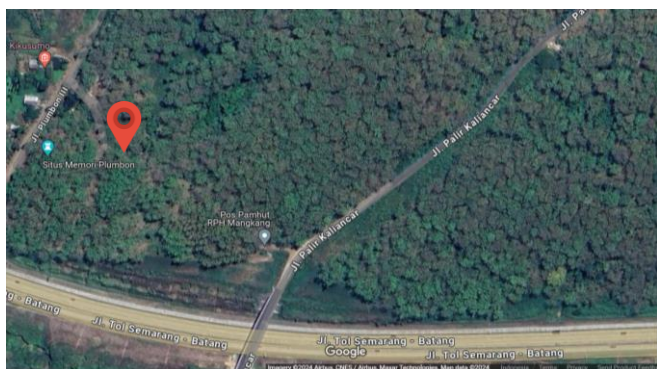


Figure 1. Forest around Curug Wadas Malang, Mangkang, Semarang.

According to the FAO, in 2020 Indonesia has around 92.0 million hectares of forested land, which constitutes to 53.0% of the total land area (171.9 million hectares). Certainly, some of these forests have the potential to be developed as an area for wellness tourism. However, the Indonesian government has implemented an action plan to encourage wellness tourism in Bali, Solo, and Yogyakarta, which are prioritized for the development of wellness tourism (Chen & Petrick, 2016; Choi et al., 2015). Thus, it makes sense to create wellness tourism in woods in other areas

that are accessible to tourists. Curug Wadas Malang possesses an abundance of natural potential, road access, and a local community that is well-prepared for the growth of wellness tourism. Therefore, the objective of this research is to establish Curug Wadas Malang, Mangkang as a wellness tourism destination in the Semarang city area.

Method

The present study utilized field research, a data collection strategy that entails direct observation and interaction with individuals in their natural environment. Observations were conducted directly in the woodland region of Curug Wadas Malang, Mangkang, Semarang. Concurrently, interviews were carried out with forest rangers, local residents, and officials of PMI Kota Semarang. Data collection involved simultaneous observations and interviews at the research site. Furthermore, a comprehensive literature analysis was undertaken to identify several instances of wellness tourism that include woods, rivers, and waterfalls.

Initially, the researchers carried out on-site field research at the designated research location. Furthermore, I performed a thorough examination of the current body of literature on wellness tourism, specifically emphasizing case studies from various nations. The sources comprised scholarly journals and digital sites. The literature evaluation focused on key subjects such as the definition and advantages of wellness tourism, effective approaches to integrated tourism development, and optimal strategies for nature-based tourism experiences. The investigation also examined case studies of other integrated tourism destinations in the United States and Japan, including Kaua'i, Hawaii, United States of America, and Hoshinoya Karuizawa, Japan, in order to conduct a comparative analysis. The selection of these cases was based on their commonalities in integrating natural features such as rivers, waterfalls, and woods to provide a comprehensive wellness tourist experience.

Data collected through the literature review and fieldwork were subsequently subjected to thematic analysis. There are four main topics that we focus on: wellness tourism, the integration of forests, rivers, and waterfalls in wellness tourism, a case study of Hoshinoya Karuizawa, and a case study of Kaua'i. The researchers focused specifically on identifying elements that could be utilized to boost the tourism potential of Curug Wadas Malang, Mangkang, Semarang.

Results and Discussion

The The results show that there are four themes, namely: wellness tourism in Curug Wadas Malang; combination of forest, river, and waterfall in wellness

tourism, Case Study 1: Hoshinoya Karuizawa, Japan; and Case Study 2: Kaua'i, Hawaii.

Wellness tourism in Curug Wadas Malang

Wellness tourism in the forest is a form of tourism that integrates the advantages of forest ecosystems with wellness products and services. Ecotourism is a type of tourism that focuses on promoting the preservation of health and relaxation by immersing oneself in natural areas. Forest wellness tourism destinations offer a variety of activities and amenities that promote the physical and mental well-being of tourists, including hiking, forest bathing, and other nature-based activities (Braun et al., 2022; Wang et al., 2024). Empirical evidence collected in the field indicates that a site including a waterfall has the potential to be transformed into a destination for recreational tourism. Another location that is quite steep is more suitable for trekking and adventure tourism. Additionally, there is a very level area available, along with a 1 kilometer walking path, that is particularly suitable for engaging in forest treatment or forest bathing. Figure 2 demonstrates that level terrain can be used for forest therapy practices such as earthing or grounding (on the left), whereas teak trees are sufficiently sizable for engaging in tree hugging (on the right).



Figure 2. Earthing and tree hugging activity

The abundance of teak and pine trees in Curug Wadas Malang provides an opportunity to obtain odors from phytoncide and turpentine. Research found that favourable immunological outcomes of phytoncide treatment, including increases in NK cells, T-cells, and cytotoxic effector molecules (Lew & Fleming, 2024; Li & Wen, 2024). While turpentine, which is found in many pine trees, contains α -cadinol and spathulenol previously described as antiviral, antitumor, antimicrobial and immunomodulatory agents (Zorić et al., 2022).

Combination of Forest, River, and Waterfall in Wellness Tourism

To develop Curug Wadas Malang as wellness tourism, it can be done by combining forest, river, and waterfall. The combination can create a holistic and immersive experience that promotes physical, mental, and emotional well-being. This approach is supported by scientific literature, which highlights the benefits of incorporating natural elements into wellness tourism.

Forest wellness tourism involves immersing oneself in natural environments, such as forests, to promote relaxation and well-being. Studies have shown that forest bathing, a key component of forest wellness tourism, can have significant relaxation effects and improve mental health (Latifa et al., 2019; Wang et al., 2024). River and waterfall wellness tourism can include activities such as hot springs and thermal baths, which are often located near these natural resources. These activities can enhance the overall wellness experience by providing a sense of tranquility and rejuvenation.

Combining these elements (forest, river, and waterfall) can create a comprehensive wellness tourism experience that incorporates multiple natural resources. For example, a wellness village might include a forest, river, stream, waterfall, soil, water, and mountain, providing a diverse range of natural environments for tourists to engage with (Pan et al., 2019; Taba et al., 2023). Studies have demonstrated the benefits of combining forest, river, and waterfall elements in wellness tourism. For instance, a study on the development of wellness-village tourism found that incorporating natural resources like forests, rivers, and waterfalls can enhance the overall wellness experience (Irvine et al., 2013; Zaman et al., 2022). Another study on evaluating potential areas for mountain wellness tourism argued that wellness tourism should include rural wellness, health preservation in the forest, sunbaths, spa, and cultural regimens to create a comprehensive wellness experience (Adi et al., 2017; Dolezal & Novelli, 2022).

The mechanism of action for combining forest, river, and waterfall wellness tourism is multifaceted. Forest therapy, for example, has been shown to have relaxation effects by reducing cortisol levels and improving mood (Tyrväinen et al., 2014). Similarly, river and waterfall activities can provide a sense of tranquility and rejuvenation through the use of hot springs and thermal baths (Bratman et al., 2015).

Case Study 1: Hoshinoya Karuizawa, Japan

Hoshinoya Karuizawa located at Kitasaku District, Nagano 389-0194, Japan. This place offers a private wellness program that combines thermal therapy and forest bathing (forest therapy), focusing on regaining physical resilience lost during COVID-19. The activity includes "forest walks" with tailored advice on breathing and strolling techniques, flexibility training, and daily massages. Meals are crafted using locally sourced ingredients, including wild forage, spring vegetables, autumn mushrooms, and deer and boar in the winter.



Figure 3. Hoshinoya Karuizawa Resort



Figure 4. Site Plan of Hoshinoya Karuizawa

It is situated at an altitude of approximately 900-1000 meters, offering breathtaking views of the surrounding landscape. This resort is designed to provide a unique blend of modern comfort and natural serenity, with a focus on preserving the local ecosystem and allowing wildlife to thrive [26]. The site plan of Hoshinoya Karuizawa Resort (Fig. 4) indicates a design that incorporates buildings close to the Kizugawa River, which can be a strategic move for developing wellness tourism that combines river, waterfall, and forest elements. The density of teak trees, adequate road access and the river flowing through the forest in Curug Wadas Malang (Fig 1) have the potential to develop several riverside home stays. This could be aimed at the elderly, or patients with certain diseases to undergo rehabilitation. This location can also be developed into a toll road rest area, which presents various types of nature tourism, by opening access from the toll road to the location.

Case Study 2: Kaua'i, Hawaii

Kaua'i is an island in Hawaii archipelago. Kaua'i is known for its breathtaking natural beauty, particularly in the Na Pali Coast and Waimea Canyon areas. These regions offer dramatic waterfall settings surrounded by lush tropical forests, creating a unique and awe-inspiring experience for visitors (Bedimo-Rung et al., 2005; Kaczynski & Henderson, 2007). The island of Kaua'i (Hawaii) is one of the regenerative tourism destinations also known as the 'Garden Island.' It is the oldest and fourth largest island in the Hawaiian Islands.

Similar to Curug Wadas Malang, this island has forests, rivers and waterfall (Mayer et al., 2009; Rosenberger et al., 2009). Additionally, Kaua'i's lush, tropical forests offer ideal settings for guided hikes, forest bathing, and other nature-based wellness activities (Lymeus et al., 2019; Tsunetsugu et al., 2013).

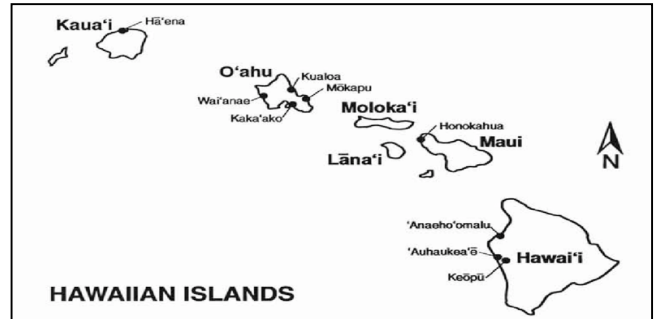


Figure 5. Kaua'i Island at Hawaii Archipelago

In terms of local community involvement in tourism, of course both have differences. Kauai became a tourist destination in the late 19th century, particularly after the construction of the Moana Hotel in 1901 [32]. Studies on the importance of community participation and benefits to local communities in Kauai tourism have been conducted . The experience of the people living in the Curug Wadas Malang area already has good social capital with the existence of SIBAT in overcoming natural disasters since 2021. The SIBAD community's initiative to manage wellness tourism is also a positive impact of the social capital they already have. For this reason, knowledge and experience in community-based tourism planning is relevant. Community based (nature) tourism has been developed in Bali. Dolezal and Novelli see that community-based tourism (CBT) is an increasingly favored approach to tourism development that is rooted in ideas that are reflected in in the UN Sustainable Development Goals (SDGs). Drawing upon SDG17 - Partnerships for the Goals - and specifically focusing on SDG17.9 - Capacity building, SDG17.14 - Enhancing policy coherence for sustainable development, and SDG17.16 and SDG17.17 [34]. In addition, the government's role and significant positive effect on the community-based tourism and sustainable tourism development in the Penglipuran traditional village.



Figure 6. Forest, River and Waterfall in Kaua'i and Curug Wadas Malang

The comparison between Hoshinoya Karuizawa and Kaua'i in terms of wellness tourism development is as follows. Both destinations make use of their natural river, waterfall, and forest environments to provide immersive wellness experiences. Hoshinoya Karuizawa prioritizes traditional Japanese customs, whereas Kaua'i seamlessly combines Hawaiian cultural elements with wellness. Prudent stewardship of natural resources, mitigation of visitor impacts, and preservation of the authenticity of cultural experiences would be of utmost importance. Collaborations with local communities, environmental organizations, and indigenous groups have the potential to foster the growth of sustainable and culturally-conscious wellness tourism. Stakeholders who intend to develop Curug Wadas Malang as a wellness tourism destination may utilize findings from the Hoshinoya Karuizawa and the Kaua'i as a resource. Various stakeholders, including local residents, PMI Semarang City, SIBAT, and KPH (Forest Management Unit), can form partnerships and cooperate to accomplish shared objectives. There are five positive impacts of wellness tourism that combine river, waterfall and forest or nature tourism, i.e.: reduced stress and improved mental health, enhanced physical activity and fitness, improved mood and well-being, increased mindfulness and connectedness, and improved sleep and relaxation. To develop wellness tourism in Curug Wadas Malang, Mangkang, Semarang, a community-based tourism approach is needed in terms of, encourage the involvement of the community in the planning, design, development, and implementation of wellness tourism. Marketing and Promotion, utilize social media platforms, travel agents, and the local tourist board to raise awareness and promote Curug Wadas Malang, Mangkang, Semarang as a health tourism destination, actively engaging the local community. Collaborating with local businesses and organizations to provide healthy food options and outdoor activities inspired by nature

Conclusion

In conclusion, Curug Wadas Malang, Mangkang, and Semarang, which are characterized by forests, rivers, and cascades, have the potential to be transformed into wellness tourism, which encompasses recreational tourism, forest therapy, and adventure tourism. To become wellness tourism, the social capital of the community surrounding this location, which has been successfully proven in overcoming natural disasters via SIBAT, can be developed for planning, design, development, and implementation using a community-based tourist strategy.

Acknowledgments

The authors acknowledgment to Ratnaningdyah Hasna Zahari, Adria Rini Saptawati and Maryono who accompanied the author when conducting field research.

Author Contributions

The first author took the initiative to conduct on-site research, after the second author provided sufficient secondary data. The first author then drafted the paper and was corrected by the second author.

Funding

This research received no external funding

Conflicts of Interest

The authors declare no conflict of interest.

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