The Impact of Digitalization on Sustainable Branding in the Tourism destination

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ABSTRACT

Purpose: The purpose of this study is to conduct a systematic literature review to comprehensively investigate the influence of digitalization on sustainable branding strategies within the tourism industry, with a specific focus on tourism destinations. Through this research, we aim to provide valuable insights into how digital technologies impact sustainable branding approaches such as eco-certifications, community empowerment, wildlife conservation, and cultural heritage preservation. We seek to synthesize existing knowledge, identify trends, and facilitate informed decision-making for stakeholders in the evolving landscape of tourism and digitalization.

Methodology: This research employs a Prisma methodology and systematic literature review, this study searched the databases of articles on "digitalisation," "sustainable branding", and "tourism destination". The selection criteria covered only academic papers published over recent years as related to digitalisation to sustainable brands within tourism. The systematic review comprises of keyword search, group classification bibliometric analysis and the presentation in a more detailed manner of 60 articles which comprise innovation dimensions on an international level.

Findings: Our research shows the significant influence of digitalization on branding strategies in tourism destinations. We discovered emerging trends in sustainable practices by studying the current landscape. Our study explains how to make use of digital innovations, such as interactive virtual reality experiences and smartphone apps for eco-friendly tours, which enable places to engage tourists ethically. We also highlight the significance of environmental preservation activities, and plastic-free programs. These findings offer industry stakeholders practical techniques for navigating the digital-driven transition in sustainable branding, resulting in a more ecologically conscious and visitor-friendly tourism sector.

Key Words: Sustainability, Digital Marketing, Branding, Tourism Destination.

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Introduction

The confluence of digitalization and sustainable branding is reshaping the landscape of the tourism industry. Digital technologies, encompassing social media, mobile applications, and online platforms, have become integral tools influencing tourist behavior, destination management, and communication strategies. Researchers (Smith et al., 2022; Wang & Li, 2021) argue that the fusion of digitalization and sustainability is not a mere coincidence but a transformative force that demands scholarly attention. The synergies and tensions between these two phenomena warrant a systematic examination to understand their collective impact on tourism destinations.

This research aims to contribute to this understanding by comprehensively investigating the integration of digital technologies within sustainable branding business plans for tourism destinations. The study sets out to explore the effectiveness of digital engagement platforms, such as websites and mobile applications, in disseminating sustainable tourism information (Buhalis & Law, 2008). It will evaluate the impact of virtual tours and augmented reality experiences on enhancing destination sustainability visibility (Kim & Uysal, 2018). Additionally, the research will analyze the role of online sustainable travel guides in promoting eco-friendly accommodations and responsible tour operators (Farmery et al., 2017). The influence of an eco-certification program on local businesses will also be examined, along with the effectiveness of digital storytelling campaigns and influencer collaborations in emphasizing a commitment to sustainability (McDonagh & Prothero, 2014).

Furthermore, the study will explore the role of community engagement through digital platforms in fostering collaboration among locals and visitors for sustainable tourism initiatives (Hean et al., 2017). Utilizing data analytics, the research aims to monitor and measure the impact of sustainable branding efforts continuously (Heid et al., 2021). This investigation addresses the current lack of detailed understanding about the precise impact of digitalization on sustainable branding in tourism destinations, filling a critical gap in existing research.

The existing literature recognizes the importance of sustainable branding in tourism destinations but lacks a comprehensive understanding of the specific impact and integration of digital technologies within sustainable branding business plans (Hall & Page, 2014). This study aims to fill this gap by providing a holistic examination of how digital platforms collectively contribute to promoting sustainable practices, enhancing environmental consciousness, and fostering responsible tourism in destination management (Buhalis, 2000).

Research Question: How does digitalization impact the sustainable branding strategies of a tourism destination?

Literature review

Sustainability and its importance in tourism industry

Sustainability in the tourism industry is a multifaceted concept encompassing environmental, social, and economic dimensions. Defined as the responsible management of resources to meet

current needs without compromising the ability of future generations to meet their own, sustainability is paramount in ensuring the long-term viability of tourism destinations (World Tourism Organization, 2019). Recent scholarship underscores the urgency for the tourism sector to adopt sustainable practices, recognizing the interconnectedness of environmental preservation, community well-being, and economic prosperity.

In the context of tourism destinations, environmental sustainability involves minimizing ecological footprints through initiatives such as waste reduction, energy efficiency, and conservation efforts (Gössling & Scott, 2019). Cutting-edge technologies play a pivotal role in achieving environmental goals, with studies highlighting the integration of digital platforms and smart technologies to enhance resource management and promote eco-friendly tourism experiences (Smith et al., 2022; Wang & Li, 2021).

The social and cultural dimensions of sustainability are equally critical, emphasizing the need for community engagement, empowerment, and the preservation of local heritage (McKercher & du Cros, 2020). Recent research by Jamal and Stronza (2022) stresses responsible traveler behavior, including cultural sensitivity, support for local businesses, and the respect for the social fabric of host communities as essential components of sustainable tourism.

Digitalisation in Tourism

Digitalisation in tourism is reshaping the industry landscape, revolutionizing how businesses operate and enhancing the overall traveler experience. It involves the integration of digital technologies to streamline operations, provide personalized services, and optimize destination management. Recent research highlights the role of digital platforms and smart technologies in improving efficiency, connectivity, and accessibility within the tourism sector (Smith et al., 2022; Wang & Li, 2021). From online booking systems to augmented reality experiences, digitalisation is a key driver of innovation and competitiveness in the contemporary tourism market.

Sustainable Branding in Tourism

Sustainable branding in tourism is a strategic approach that aligns a destination or business with environmentally and socially responsible practices, catering to the growing demand for ethical and sustainable travel. It involves communicating a commitment to sustainability through branding efforts, influencing consumer perceptions, and fostering a positive impact on local communities and ecosystems. Recent studies emphasize the importance of integrating sustainable practices into branding strategies, emphasizing authenticity, transparency, and community engagement (Jamal & Stronza, 2022; Gössling & Scott, 2019). Sustainable branding not only contributes to a positive image but also plays a pivotal role in attracting conscientious travelers and supporting the long-term resilience of tourism destinations.

Integration of Digitalization and Sustainable Branding

Digitalization has revolutionized the tourism industry, profoundly influencing sustainable branding strategies for destinations worldwide. Buhalis and Amaranggana (2015) emphasized the pivotal role of digital technologies in enhancing visitor experiences and fostering sustainable practices within tourism destinations. Through the integration of mobile apps,

social media platforms, and online marketing initiatives, destinations can effectively communicate their eco-friendly initiatives to a global audience, encouraging responsible tourism behavior (Buhalis & Amaranggana, 2015).

Furthermore, Gössling, Scott, and Hall (2016) highlighted the environmental benefits of digitalization in tourism. Real-time monitoring and data analysis, facilitated by digital technologies, enable destinations to optimize resource utilization and minimize negative environmental impacts. Sustainable practices, such as energy-efficient accommodations and eco-friendly transportation options, are promoted through digital platforms, shaping the branding image of destinations as environmentally conscious (Gössling, Scott, & Hall, 2016).

The integration of digital tools not only enhances environmental conservation efforts but also empowers local communities. Jamal and Budke (2014) demonstrated in their study that digital platforms enable indigenous communities to showcase their cultural heritage and engage with tourists directly. This engagement not only preserves local traditions but also fosters a sense of community empowerment, contributing to the overall sustainable branding of the destination (Jamal & Budke, 2014).

Moreover, Stone (2012) explored the concept of dark tourism and its digital representation. Through online platforms and virtual tours, destinations associated with sensitive historical events or natural disasters can manage visitor experiences sensitively, emphasizing education and preservation. Digital storytelling in dark tourism contexts exemplifies how digitalization can shape sustainable branding, ensuring respectful and responsible engagement with sensitive destinations (Stone, 2012).

In summary, the literature underscores the transformative impact of digitalization on sustainable tourism branding. Through digital technologies, destinations can communicate their sustainability initiatives, promote responsible tourism behavior, preserve local cultures, and conserve the environment. The amalgamation of digitalization and sustainable branding not only enhances the visitor experience but also contributes significantly to the long-term viability and positive image of tourism destinations.

Research methodology

In this research we have used Prisma research methodolgy and a systematic literature review follows a rigorous methodology to ensure the comprehensiveness and replicability of the research process. The search strategy involves querying reputable databases such as Scopus, PubMed, and Direct Science using keywords like "digitalisation," "sustainable branding," and "tourism destination." The inclusion criteria encompass peer-reviewed articles published in the last decade, focusing on the intersection of digitalisation and sustainable branding in tourism contexts. The initial search yielded a pool of potential articles, which underwent a multi-stage screening process based on relevance, methodology, and quality.

Data Collection

The systematic review methodology involved conducting a keyword search within a selected database to ensure an objective approach to data collection. Following the approach of Prisma

research methodology, the focus was exclusively on empirical articles published in scholarly journals, excluding non-empirical studies such as books and internet sources. The research scope was confined to papers published in peer-reviewed journals accessible through the Web of Knowledge databases: Science Citation Index Expanded (SCI), Social Sciences Citation Index (SSCI), and Arts & Humanities Citation Index (A&HCI).

The chosen keywords for the search were "branding" and "tourism." And "sustainable branding" Employing various combinations, the search produced 300 results for "branding" in the title and "tourism" in the topic, 400 results for "branding" in the topic and "tourism" in the title, and 1568 articles when both keywords were used in the topic. The document type was specified as an article, and the search spanned the year 2015 to the present, with English as the language of inclusion.

Analysis

The second phase of the systematic review process involves several key steps:

Identification of Relevant Papers

Instead of relying solely on keyword searches, a more nuanced approach was adopted to identify papers aligned with the research's core objective. The search criteria were refined to ensure that the selected papers genuinely addressed innovations in tourism.

Categorization of Papers

Papers were then categorized based on additional criteria, including the study's location, research methodology, data acquisition methods, level of analysis, and the types of innovation explored. This multi-dimensional grouping facilitated a more comprehensive understanding of the literature.

Bibliometric Analysis

Selected papers underwent bibliometric analysis to unveil the theoretical foundations of tourism innovation research. A network grouping algorithm was applied to identify and visually represent the structure of this foundation.

Detailed Presentation of Papers

The 120 papers selected for in-depth analysis were presented in three distinct groups: those examining the significance of innovation for firms (micro-level), those addressing regional innovation (macro-level), and those concentrating on innovations in a broader context.

Refinement of Sample

Abstracts of all 120 papers were meticulously reviewed, and the refined criteria were applied to narrow down the sample to the final 60. Papers not directly related to innovation in the tourism sector and those primarily adopting methodological approaches were excluded.

Computer-Managed Data

All 60 selected articles were systematically managed using a Microsoft Excel database table. Each row encapsulated all reference information for a given article, encompassing title, author(s), journal, year of publication, study location, statistical methods used, presented point of view, level of analysis, and innovation category.

Descriptive Analysis

A detailed descriptive analysis of the 60 papers was conducted, elucidating the characteristics of these papers and the diverse dimensions of innovation encapsulated within them.

International Context

Within an international context, European tourist destinations emerged prominently, featuring in 50.44% of the selected studies. A total of 20 studies were performed in Europe, 10 in the USA and Caribbean, 10 in Asia, 15 in Africa, and 5 in Australia. Additionally, 20 papers presented comparative studies across multiple countries. Fourteen papers, primarily qualitative discussion papers, could not be associated with any specific destination.

Results and findings

The systematic literature review identified a total 60 articles meeting the inclusion criteria. These articles were categorized into key themes, including digitalisation in tourism, sustainable branding practices, and the impact of digitalisation on sustainable branding. Preliminary analysis reveals a growing body of literature emphasizing the transformative role of digital technologies in shaping sustainable branding strategies within tourism destinations. Further detailed analysis will be conducted to extract nuanced insights and identify patterns across the selected articles.

Figure 1: Article selection process
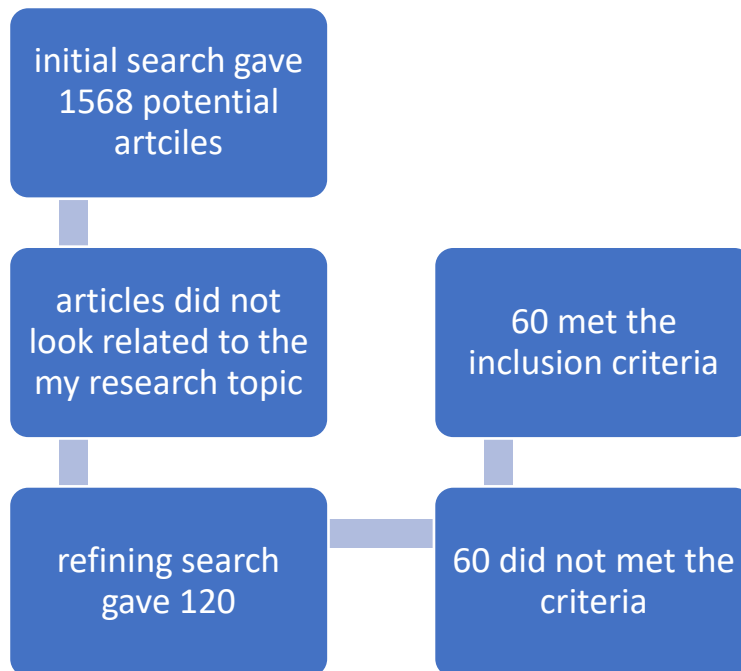
Source: Authors' own editing.

The figure outlines the systematic progress of a literature search, commencing with an initial search yielding a substantial pool of 1568 potential articles. However, upon closer inspection, these articles were deemed unrelated to the research topic, prompting a refinement of the search strategy. The subsequent refinement resulted in a narrowed selection of 120 articles. Notably, half of these, totalling 60 articles, did not meet the predefined criteria, suggesting a stringent application of inclusion standards. The remaining 60 articles successfully met the inclusion criteria, signalling a more focused and relevant set of literature for the research at hand. This figure underscores the importance of a meticulous search and refinement process, steering the researcher towards a more targeted and pertinent collection of articles for in-depth analysis and synthesis in the subsequent stages of the research endeavor.

The results of the systematic literature review illuminate a compelling landscape at the intersection of digitalization, sustainable branding, and tourism destinations. The identification of 60 articles meeting inclusion criteria underscores the scholarly attention to the transformative potential of digital technologies in shaping sustainable branding practices within tourism. The rigorous selection process, depicted in Figure 1, emphasizes the importance of precision and relevance, as only articles directly contributing to the research topic were retained.

The preliminary analysis reveals a growing consensus among scholars on the significant impact of digitalization on sustainable branding in tourism destinations. This alignment reinforces the importance of embracing digital tools to enhance the sustainability narrative, as demonstrated

by the refined set of 60 relevant articles. As the review progresses, a more in-depth analysis will extract nuanced insights, identify patterns, and contribute to a comprehensive understanding of how digitalization can be harnessed to attract visitors while safeguarding the environment. These findings affirm the critical role of sustainability in the tourism sector, not only as a mechanism to attract visitors but also as a proactive measure for environmental conservation and destination resilience.

Discussion

Based on the literature reviewed, it is recommended that destination managers and marketers leverage digital platforms strategically to communicate sustainable initiatives. Authenticity should be prioritized in sustainable branding efforts to build trust among tourists. Collaboration between the public and private sectors is essential for the successful integration of digitalisation into sustainable branding strategies.

Sustainable Branding Business Plan for Tourism Destinations:

In advancing sustainable branding strategies for tourism destinations, the proposed business plan strategically harnesses digital tools to both promote and integrate environmentally conscious practices. The plan encompasses diverse initiatives, including the development of an interactive website and mobile application serving as a centralized hub for comprehensive sustainable tourism information. These platforms not only disseminate crucial details on sustainability initiatives, local experiences, and environmental conservation efforts but also actively engage with a diverse audience through various social media channels. Moreover, the integration of virtual tours, augmented reality experiences, and strategically placed QR codes (Quick responses codes) offers potential visitors' immersive virtual explorations of the destination's sustainable practices and cultural richness. This fusion of digital technologies extends to the creation of online sustainable travel guides, featuring eco-friendly accommodations, responsible tour operators, and community-contributed content, fostering a virtual community of environmentally conscious travelers.

Complementing these digital endeavors, the business plan includes tangible strategies such as an eco-certification program for local businesses. This program incentivizes and validates sustainable practices among hotels, restaurants, and tour operators, with prominently displayed eco-certification logos across both digital and physical platforms enhancing visibility and credibility. Additionally, the plan advocates for compelling digital storytelling campaigns, leveraging influencers and travel bloggers to emphasize the destination's commitment to sustainability. Community engagement is fostered through online forums and social media groups, providing spaces for collaboration among locals and visitors on sustainable tourism initiatives. Lastly, the incorporation of data analytics tools ensures continuous improvement, monitoring the impact of sustainable branding efforts and adapting strategies based on insights, thereby ensuring a dynamic and effective approach to sustainable branding in the tourism industry.

Conclusion

The synthesis of existing literature demonstrates a complex interplay between digitalisation and sustainable branding in tourism destinations. Digital technologies, particularly social media and mobile applications, have emerged as powerful tools for destination marketers to communicate sustainable initiatives and engage with a global audience. Sustainable branding, rooted in authenticity and transparency, has become a strategic imperative for destinations navigating the digital landscape. The review highlights the need for a nuanced understanding of these dynamics to inform effective destination management practices.

Future research

While this review provides valuable insights, future research should delve deeper into specific aspects, such as the role of emerging technologies (e.g., augmented reality, virtual reality) in sustainable branding. Additionally, longitudinal studies could offer insights into the evolving nature of digitalisation's impact on sustainable branding over time. Comparative analyses across diverse tourism destinations and cultural contexts would contribute to a more comprehensive understanding of the global implications.

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