DECOLONISING CULTURAL PRESERVATION: LEVERAGING DIGITAL MEDIA FOR THE PROTECTION OF HAKKA HERITAGE

Mengyuan Zeng^{*}, Wahyuni Masyidah binti Md Isa and Roslina Ismail^{**} *First author, **Corresponding author Faculty of Creative Arts, Universiti Malaya, Kuala Lumpur, Malaysia College of Architecture and Design, Jiangxi University of Science And Technology, Ganzhou, China (zengmengyuan05@gmail.com, roslina_i@um.edu.my)

© 2023 Faculty of Creative Arts, Universit Malaya. This work is licensed under the terms of the Creative Commons Attribution (CC BY-NC-ND) (https://creativecommons.org/ licenses/by-nc-nd/4.0/) Received 16 December 2023; Accepted 30 December 2023

Abstract

This study critically examines the role of emerging digital technologies in preserving Hakka cultural heritage within the broader discourse of media and cultural sovereignty. The research highlights the importance of engaging younger generations in this process and investigates how digital tools can mediate the interaction between folklore and modern technology. Drawing on field observations, interviews, and community participation, the findings reveal that while digital technologies offer innovative possibilities for heritage preservation, they also carry significant risks of commodification and cultural homogenization. These challenges underscore the need to integrate local cultural values and ensure that digital representations remain faithful to the authentic practices and identities of the Hakka community. The study emphasizes the necessity of collaborative, culturally grounded digital strategies that reflect both local aspirations and global best practices. By centring Hakka voices and advocating for contextually relevant approaches, this research contributes to a more nuanced understanding of how digital technologies can empower ethnic communities and maintain cultural integrity in the digital age.

Keywords: Hakka culture, Digital heritage preservation, Cultural authenticity, Community engagement

Introduction

The digitization of cultural heritage presents new opportunities for preserving and sharing diverse cultural expressions.(Cameron & Robinson, 2007) However, within the context of decolonization of media, it also raises significant concerns. As digital tools like artificial intelligence, virtual reality, and augmented reality become increasingly integrated into cultural preservation efforts, it is crucial to critically assess their application to avoid perpetuating neocolonial practices(Ling, 2023). This study focuses on the preservation of Hakka cultural heritage a rich yet globally marginalized culture by exploring how digital media can be employed to empower the Hakka community in safeguarding and enhancing their cultural legacy.

Historically, Western media, particularly Hollywood, has often misrepresented Chinese cultural heritage, portraying Chinese characters in stereotyped and often subservient roles. For decades, these portrayals shaped global perceptions of Chinese identity and culture. However, a significant shift occurred with the work of Bruce Lee in the 1970s. His films not only broke away from these stereotypical portrayals but also presented Chinese characters as strong, dignified, and authentic, reclaiming cultural pride and challenging dominant Western narratives. Bruce Lee's films served as an early example of how media can be used to counter misrepresentations and present a more authentic portrayal of Chinese culture.

Similarly, just as Bruce Lee's work reclaimed the narrative of Chinese identity in global media, emerging digital technologies today offer similar opportunities for communities like the Hakka to take control of their cultural representation. By leveraging these technologies, the Hakka community can ensure that their heritage is not commodified or simplified, but rather preserved and shared in ways that reflect their true cultural values and history.

In the current technological landscape, by leveraging emerging digital technologies, communities like the Hakka can exercise Cultural Autonomy through Technology, ensuring that their heritage is preserved, represented, and transmitted according to their own values, rather than being subject to external influences. This autonomy is critical in resisting the cultural homogenization often associated with mainstream digital platforms (Bourreau et al., 2022).

This study, therefore, aims to explore how cultural heritage can be preserved through noncolonial means, moving beyond the existing frameworks of digital preservation that often emphasize the protection of recognized physical sites by international bodies like UNESCO. Many existing frameworks for cultural preservation emphasize the protection of physical sites or focus on heritage that has already been recognized by international bodies. This approach often overlooks intangible heritage and risks reinforcing colonial legacies by privileging certain forms of heritage over others. Thus, this study seeks to explore how digital technologies can be applied in a decolonizing manner to empower communities, such as the Hakka, in preserving both tangible and intangible elements of their culture.

Within this context, the Hakka community serves as a significant case study. Hakka, as a distinct cultural group, is renowned for its rich traditions, language, and unique architecture (Christiansen, 1998). In the face of rapid globalization and urbanization, the preservation of this cultural heritage, both tangible and intangible, is essential for ensuring its transmission to future generations. By leveraging digital technologies appropriately, we can uphold the integrity and sustainability of the Hakka cultural legacy, countering its marginalization in global narratives and ensuring its continued vitality.

However, with the rapid progression of globalization, industrialization, urbanization, and economic growth, younger generations are gradually distancing themselves from their cultural roots. (Islam et al., 2019) This distancing involves not only a physical separation from traditional communities but also a psychological and emotional detachment from the customs, values, and practices that define their cultural identity. It is driven by widespread socio-economic transformation and exacerbates an identity crisis, particularly evident in metropolitan areas. The intersection of diverse cultures and the pressures of modern life make it increasingly difficult to maintain a consistent cultural identity. This identity crisis poses greater challenges for the preservation of intangible cultural heritage (ICH), as the younger generation, who are potential cultural transmitters, often lack the connection or motivation to engage with traditional practices.(Sani & Ahmad, 2017)

Furthermore, previous studies have identified several key challenges in the application of digital technologies to cultural preservation. One of the most significant issues is the disconnect between these technologies and the cultural practices they aim to preserve (Strathman, 2019) .Although AI, VR, and AR offer promising tools for cultural preservation, their practical implementation often overlooks cultural sensitivity, leading to oversimplified or distorted representations(Hou et al., 2022; Rizzo, 2016). For example, some digital projects prioritize technological display over cultural context, neglecting the complexity and subtlety of cultural practices. This frequently results in a "flattened" cultural expression that becomes detached from its original context (Paananen et al., 2022). This disconnect undermines the authenticity of cultural heritage and the depth of cultural transmission, and in some cases, it even leads to the commodification of cultural content, reducing it to a mere subsidiary of tourism or commercial activities rather than preserving it as a genuine vehicle of cultural heritage.

Given these challenges, economic pressures on traditional forms of cultural expression are also increasing with global economic growth. In the process of modernization, the priority of economic development often outweighs cultural sustainability. Economic growth is typically accompanied by urban expansion, resource exploitation, and the spread of consumer culture, which often marginalizes traditional culture or even leads to its disappearance. (Victoria Reyes, 2022) Compounding this issue is the tension between cultural preservation and economic growth, as economic development often takes precedence over cultural sustainability (Erlewein, 2017). For example, in the pursuit of economic benefits, traditional handicrafts may gradually disappear because they cannot compete with the efficiency of industrial production, and traditional festivals may lose their original meaning and appeal due to social changes brought about by urbanization. This tension between economy and culture makes it increasingly difficult to sustain intangible cultural heritage, especially in regions most impacted by globalization, where traditional cultural expressions are often regarded as outdated or economically insignificant, and therefore are ignored or abandoned(Adewumi, 2022). These challenges underscore the need to rethink cultural preservation strategies. Especially in the application of digital technologies, it is crucial to develop strategies that genuinely respect and preserve cultural contexts, rather than merely digitizing cultural content.

This study addresses the gap in understanding how modern digital technologies can effectively preserve Hakka culture, particularly in light of challenges such as the identity crisis among younger generations. While there has been significant progress in cultural preservation technologies, there is still a need to explore how to use these tools without perpetuating neocolonial practices and to align them with the cultural transmission needs of rapidly evolving socio-economic environments. This research emphasizes the importance of developing strategies that engage younger generations while preserving the authenticity of cultural heritage, specifically within the Hakka community. By integrating digital tools with the needs and values of local communities, this study aims to ensure that Hakka cultural heritage is both protected and revitalized for future generations.

This study also examines media decolonization in the context of cultural preservation. While digitization offers new opportunities for preserving and sharing diverse cultural expressions, it presents challenges, especially through the lens of decolonization. As technologies like Artificial Intelligence (AI), Virtual Reality (VR), and Augmented Reality (AR) are increasingly integrated into cultural preservation, their application must be critically examined. if not carefully managed, they could inadvertently replicate neo-colonial community, further marginalizing the very communities they aim to empower) Neo-colonialism, in this context,

refers to the subtle forms of control and influence that powerful nations or corporations exert over developing countries, particularly through economic, cultural, and technological means. When applied to digital cultural preservation, neo-colonialism manifests through technologies like AI, VR, and AR, which are often developed and controlled by external entities. These technologies, if misused, can prioritize external narratives or commercial interests over local cultural values and knowledge systems, undermining the very autonomy they are meant to protect (Mouton & Burns, 2021).

This study focuses on the Hakka culture of southern Jiangxi, a community with a rich cultural heritage that has historically been marginalized in global cultural narratives. The Hakka people have faced challenges in preserving their cultural identity in the face of globalization and technological change. Therefore, preserving Hakka culture is crucial, as it not only showcases unique architectural aesthetics, artistic expression, and cultural values but also represents an important part of China's cultural diversity. The Hakka tulou and other architectural forms reflect the community's cohesion and engineering ingenuity, while traditional arts such as Hakka folk songs and embroidery embody deep aesthetic and historical significance. Supported by the 2022 Science and Technology Project of Jiangxi Provincial Department of Education (Project No.: GJJ2200885) and the 2023 Jiangxi University of Science and Technology Gan Nan Hakka Culture Digital Research Institute Project (Project No.: 22FY-XJ05), this research explores the intersection of digital media and cultural preservation. It aims to investigate how emerging technologies can be leveraged to protect Hakka culture, thereby strengthening rather than weakening ethnic culture knowledge systems. This is not merely about safeguarding cultural heritage; it is also about dismantling and reimagining existing power relations, resisting past biases, and seeking balance among cultures. This decolonization of media research concerns how researchers can contribute to dismantling existing power structures in order to promote a more just and balanced global cultural narrative. This study seeks to address these limitations

This research is guided by several key questions. First, it seeks to understand how emerging digital technologies can be employed to preserve Hakka culture without reinforcing digital colonialism or homogenizing cultural practices. This question is central to the framework of the study, emphasizing the need to use technology in ways that uphold the sovereignty of Chinese Hakka culture. Secondly, the research examines the specific challenges and limitations associated with the use of AI, VR, and AR in cultural preservation, particularly for ethnic communities. Understanding these challenges is crucial for developing strategies to mitigate the risks posed by these technologies. Finally, the study explores how digital media can engage younger generations in the preservation of Hakka heritage while maintaining cultural authenticity. This question highlights the importance of intergenerational transmission of cultural knowledge and the role that digital technologies can play in fostering a deeper connection between young people and their cultural heritage.

In addressing these research questions, this study contributes to the broader discourse on decolonising media futures. It provides a critical examination of how digital technologies can be aligned with decolonising efforts in cultural preservation, offering insights that are relevant not only to the Hakka community but to other ethnic cultures facing similar challenges. By emphasizing the importance of sovereignty of Chinese culture and Hakka as one of Chinese cultures. in the digital age, this research aims to guide the responsible use of technology in cultural preservation, ensuring that it serves as a tool for empowerment rather than exploitation

Literature review

Decolonization of media and Cultural Preservation

In the field of cultural heritage preservation, the acceleration of globalization and technological development has brought neocolonial practices under widespread scrutiny and in-depth discussion (Syafitri, 2024). Arjun Appadurai, in his work Modernity at Large (1996), discusses the impact of globalization on culture and introduces the concept of "cultural flows." He argues that the transnational flow of culture under globalization may challenge the autonomy of local cultures, especially in the context of digitalization(Appadurai, 1996). This viewpoint has directly led to research on sovereignty of Chinese culture and Hakka as one of Chinese cultures. and the role of digital technology in the decolonization of media process. Within this context, the application of digital technologies, particularly Artificial Intelligence (AI), Virtual Reality (VR), and Augmented Reality (AR), although offering new tools for cultural preservation, also presents risks of cultural exploitation, assimilation, and marginalization(Bihari, 2023; Chan & Patten, 2023; Hiswara et al., 2023; Liu, 2021). For example, the commercialization of ethnic cultures into tourist souvenirs or cultural products may neglect the interests of ethnic communities, leading to the commodification of culture. Similarly, in VR or AR displays, an overemphasis on mainstream cultural values may weaken or marginalize the uniqueness of ethnic cultures. Within this context, While the application of digital technologies, particularly AI, VR, and AR, offers new tools for cultural preservation, it also provides opportunities for Cultural Autonomy through Technology. By controlling how these tools are applied, the Hakka community can challenge the dominant Western narratives and ensure that their cultural identity is preserved without commodification or misrepresentation. However, as AI, VR, and AR technologies become more widely applied, scholars are beginning to explore their dual role in cultural preservation. On one hand, these technologies provide new tools for cultural preservation; on the other hand, they may reinforce neocolonial patterns by commodifying culture and exercising technological control, further marginalizing the cultural rights and expressions of ethnic communities. Prominent scholars in this research direction include Bihari, Chan & Patten, Hiswara (Qian, 2023; Wan, 2024). Therefore, ensuring sovereignty of Chinese culture and Hakka as one of Chinese cultures. that is essential when applying digital technologies to cultural preservation, meaning that ethnic communities should have the right to autonomously manage and protect their cultural heritage to avoid the negative impacts of neocolonial practices. The aforementioned studies have explored and revealed the issues of cultural exploitation and marginalization that digital technologies may provoke in cultural preservation. These key concepts provide a theoretical foundation for understanding the complexities and challenges of using digital technologies in cultural preservation.

Application and Challenges of Digital Technologies

The integration of digital technology into cultural preservation efforts has opened new avenues for enhancing the accessibility and engagement of cultural heritage AI, VR, and AR can create immersive and interactive experiences, offering innovative ways to engage with cultural heritage. However, there remains a significant gap in the literature concerning the neo-colonial implications of these technologies, particularly when applied to ethnic cultures. While these tools offer innovative ways to experience and preserve cultural heritage, they can also inadvertently reinforce existing power imbalances by commodifying culture for global consumption rather than preserving it for the communities to whom it belongs (Rizzo, 2016; Levin & Mamriot, 2021). This study builds on existing critiques by focusing on the intersection of digital media and decolonisation, offering a framework for employing technology in a way

that centers the voices and needs of the Hakka community. However, The continuous adaptation of digital technologies is crucial for effective cultural preservation, as cultural content is dynamic and evolves alongside societal and technological advancements. Technologies like 3D modeling, VR, AR, and AI, while promising, often face challenges related to compatibility with specific cultural contexts and require significant resources for maintenance (Rizzo, 2016). Without regular updates, these technologies risk becoming outdated, misaligned with current cultural expressions, and unable to capture the nuances of evolving practices(Levin & Mamlok, 2021).Therefore, it is essential to integrate digital preservation efforts with local cultural initiatives, ensuring active engagement with communities who are the custodians of their heritage. This collaboration allows digital tools to be tailored to reflect the living nature of culture, maintaining their relevance by safeguarding both historical and emerging cultural developments.

Younger Generations and Identity Crisis

In the context of rapid globalization and the advancement of information technology, cultural shifts have had a profound impact on the identity of younger generations. Cultural change theory posits that culture evolves continuously through the interaction, integration, and conflict of different cultures. For the younger generation, these cultural shifts are particularly pronounced because they live in an era where multiple cultures intersect, often leading to an identity crisis due to the conflict between traditional and mainstream cultures. Bourdieu's practice theory further deepens this analysis by revealing the inequalities inherent in cultural change through concepts such as field, capital, and habitus(Appadurai, 1996; Gartman, 2002). Growing up in this unequal cultural structure, the younger generation finds that their cultural resources and opportunities are constrained by class, economic, and political forces, which may prevent them from fully inheriting traditional culture. Instead, they may be forced to adapt to or assimilate into mainstream culture. This passive cultural adaptation process further exacerbates their identity crisis, underscoring the importance of preserving cultural diversity and strengthening cultural identity in modern society.

Balancing Cultural Transmission and Innovation

In the context of contemporary society, cultural transmission and transformation face numerous complex challenges, particularly with the development of socio-economic factors, the process of globalization, and the rapid advancement of modern technology. The process of passing down traditional culture among younger generations is increasingly being disrupted. Specific elements of traditional culture may be diluted, neglected, or even forgotten during this process, making it difficult for younger generations to find their cultural identity in a rapidly changing society. This crisis of cultural identity is especially pronounced as younger generations face the dual pressures of local and foreign cultures. The infiltration of foreign cultures weakens the influence of traditional culture, leading to conflicts in cultural identity, sometimes manifesting as alienation from traditional culture or an over-reliance on mainstream culture.(Bucholtz, 2002) To address these challenges, the literature review emphasizes the necessity of finding a balance between cultural transmission and cultural transformation. On one hand, by strengthening the protection and study of traditional culture, education and advocacy can help the younger generation understand and identify with their cultural roots. On the other hand, the review highlights the importance of cultural innovation, supporting the younger generation in creating new cultural forms that meet the demands of modern society within the context of globalization. Additionally, promoting dialogue and exchange between different cultures is crucial for helping the younger generation find their place in a multicultural environment, enhancing their cultural

identity, and alleviating identity crises. Government and societal support are key to helping young people establish an identity that both respects traditional culture and adapts to modern society.

In conclusion, cultural change theory not only provides a deep theoretical foundation for understanding the causes of identity crises among the younger generation but also points the way toward achieving sustainable cultural development during this period of change. By seeking a balance between cultural transmission and transformation, the younger generation can re-establish their cultural identity within the context of globalization, thereby promoting social progress and harmonious development. This innovative review not only deepens the understanding of cultural change theory but also offers new perspectives and strategies for addressing practical issues in cultural transmission and transformation.

Methodology

This study employed a fieldwork methodology, involving immersion in natural environments to observe, collect data, and interact with participants for an in-depth understanding of their behaviours, cultures, and social dynamics. Fieldwork can encompass a range of data collection methods, including participant observation, interviews, surveys, and document analysis. This study is designed around on-site observation and participation in targeted Hakka villages to gain a profound understanding of local culture, social interactions, and daily life.

The study site and participants of this research were situated in the Gan Nan region of Jiangxi Province, China, focusing on the Hakka villages in the regions of Ganxian, Ningdu and Longnan (As shown in Figure 1-2). The research primarily observed local living environments, lifestyles, and Hakka customs. Participants included local villagers, cultural inheritors, and government officials. To ensure the representativeness of the study, a random sampling method was used to select participants, ultimately identifying 6 participants.

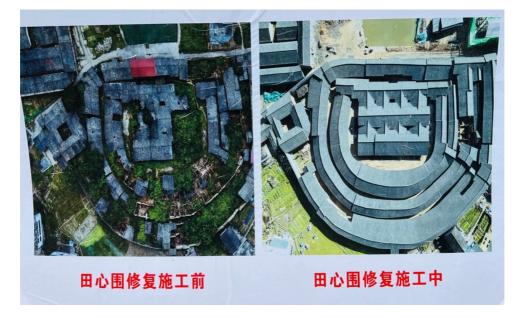


Figure 1. Comparison Of The Tian Xinwei Enclosure Before (Left) And During (Right) Restoration Work In Longnan City. Source: Author's Fieldwork, 2023.



Figure 2.Tin Sam Wai Village, Longnan City: Current Situation Of Hakka Village Survival Source: Author's Fieldwork, 2023.

The data collection for this study employed three primary methods. First, through participant observation, the researcher stayed at each research site for seven days, recording the daily behaviors and social customs of participants to gain an in-depth understanding of the community's culture and social structure. For instance, the researcher closely observed the "Kang Deng" ritual in Xiaoyuan Village, Ningdu County, a traditional folk practice recognized as part of Gannan Hakka intangible cultural heritage (As shown in Figure 3-4). Second, semi-structured in-depth interviews were conducted with key participants to gather detailed perspectives and personal experiences related to the research questions. Finally, document analysis was utilized to review relevant historical documents and cultural records, supplementing the data from observations and interviews and providing critical support for understanding the community context.



Figure 3-4. The "Kang Deng" ritual, a traditional folk custom in Xiaoyuan Village, Ningdu County, southern Jiangxi. Source: Author's fieldwork, 2025.

The data analysis employed descriptive analysis and thematic analysis methods. Initially, field notes and interview transcripts were preliminarily coded to identify major themes and patterns. Subsequently, through iterative comparison and classification, core themes related to the research questions were refined. To enhance the reliability of the analysis, triangulation was applied, integrating results from different data sources and methods to ensure the validity and credibility of the study's conclusions.

This study strictly adhered to ethical guidelines, ensuring informed consent and privacy protection for all participants. During the fieldwork, the researcher established trust with the community, ensuring that all data collection and usage processes were approved by the participants. The study was approved by the UMREC before commencement, and the research purpose, methods, and participants' rights were thoroughly explained to all involved.

Results

The study utilized thematic analysis to examine fieldwork Observations data concerning the transmission of Hakka culture, community structure, and youth cultural identity. By identifying and analyzing recurring themes from observations and interviews, the research uncovered key factors influencing the preservation of Hakka culture and the profound impact of internal power structures on cultural practices and identity formation within the community.

Thematic Analysis of Observations 1: Challenges in Cultural Transmission

The observations and interviews revealed key challenges that hinder the transmission of Hakka culture, which can be categorized into three primary areas. First, Geographical Remoteness. The remote location of the community and the limited accessibility from urban centers hinder the dissemination of cultural knowledge. Visitors often experience only the superficial aspects of Hakka culture, such as the tangible cultural heritage exemplified by the tulou, without gaining insight into the deeper cultural context and history. This situation leads to a superficial understanding of Hakka culture, where visitors' comprehension is restricted to surface-level elements. Second, Time Constraints and Fast-Paced Lifestyles. The fast-paced nature of modern life often leaves visitors and researchers with insufficient time to engage deeply with Hakka intangible cultural heritage, such as festivals and handicrafts. This challenge makes it difficult to ensure the deep transmission of culture, leading to cultural displays and experiences that are often superficial and fail to convey the rich meanings embedded within these traditions. Lastly, Lack of Research on Digital Preservation. Despite the potential role of digital technologies in cultural preservation, there is currently a notable lack of research on how to effectively apply these technologies to the preservation of Hakka culture. This gap further limits the breadth and depth of cultural transmission, particularly in terms of engaging younger generations in the process of cultural preservation.

Thematic Analysis of Observations 2: Challenges of Youth Migration and Cultural Continuity

The Hakka community is facing a significant issue of youth migration, which has profound implications for cultural continuity. First, Youth Migration for Employment: Due to the lack of local industry, many young people choose to migrate for work or move to cities with their parents to receive better education. This has led to a shortage of labor within the villages, economic stagnation, and an aging population, which in turn diminishes the vitality and continuity of cultural activities. Second, Cultural Identity and Sense of Belonging: Although some Hakka youths still maintain a strong sense of cultural identity and are willing to return to the village for major festivals to participate in cultural activities, their deep understanding of local folk culture is limited. Particularly, their grasp of the history and meanings behind cultural practices is weak, making their cultural identity more emotional rather than a comprehensive transmission of cultural knowledge. This dynamic underscores the need to integrate youth more

meaningfully into cultural preservation efforts to bridge the gap between cultural belonging and genuine transmission.

Thematic Analysis of Observations 3: Community Power Structures and Cultural Transmission

The internal social dynamics and power structures within the community play a crucial role in the transmission of cultural practices. First, Cultural Core of Ancestral Halls and Surnames: Collective activities in Hakka villages, such as the Lantern Festival and Mid-Autumn Festival folk events, often center around ancestral halls linked to specific surnames. These events are not only expressions of culture but also critical moments for reinforcing community identity. The ancestral hall, serving as both the starting and ending point of cultural activities, symbolizes the generational transmission of Hakka culture and acts as a key link in maintaining cultural continuity. Second, Elders' Authority and Decision-Making Influence: Power structures within the community are often concentrated among elders, known as the "decision-makers," who play significant roles in community decision-making and resource allocation. They sometimes even assist the government in influencing local perspectives. This power dynamic greatly impacts how cultural practices are perpetuated and determines which cultural activities receive support and development. While the authority of elders ensures the preservation of cultural traditions, it can also potentially limit cultural innovation. While the authority of elders is crucial for maintaining the purity and integrity of cultural traditions, it can also inhibit innovation when decision-making becomes overly centralized and conservative attitudes dominate.

Based on this thematic analysis, the researcher employed "fantasy theme analysis" to envision a future scenario of the Hakka community under extreme globalization and complete digitalization(Williams, 1987). For example, cultural elements may become virtualized and disseminated through online platforms, which, while breaking down geographical barriers, could lead to the superficiality of culture and the homogenization of identity. Virtual rituals and community interactions might expand the global reach of culture but simultaneously weaken the depth and emotional connections of traditional culture. To address these challenges, the study emphasizes the need for future cultural preservation strategies to strike a balance between the convenience of digitalization and the depth of cultural transmission, ensuring the sustainable development of Hakka culture in the context of globalization. This imagined scenario not only analyzes how Hakka culture might transform and endure under the pressures of globalization but also explores the potential risks and opportunities involved. It reveals the possible challenges in cultural transmission and provides a deeper understanding of future possibilities.

Discussion

The discussion highlights the crucial importance of aligning digital technologies with the specific cultural needs of the Hakka community to preserve intangible cultural heritage without commodification or misrepresentation. By focusing on both the opportunities and challenges presented by AI, VR, and AR, and actively involving local communities in preservation efforts, the study underscores the significance of tailoring these technologies to the unique cultural context of the Hakka. It also emphasizes the risks of commodifying or misrepresenting ethnic cultures in the process. The research advocates for a decolonized approach that prioritizes cultural authenticity, ensuring that ethnic communities retain control over their own cultural narratives. This section summarizes the key insights, discusses their broader implications, and explores strategies for future preservation efforts.

Aligning Digital Technology with Cultural Needs and Addressing Challenges

One of the central findings of this research is the need to ensure that digital technologies are tailored to the cultural context of the Hakka community. While AI, VR, and AR offer immersive experiences for preserving intangible heritage such as folklore, festivals, and traditional practices, their application must be culturally sensitive to avoid superficial or commodified representations. These tools have great potential when used in ways that reflect the values and traditions of the community, empowering the Hakka people to control how their culture is presented. This research supports the sovereignty of Chinese culture by advocating for digital preservation methods that align with the specific needs of Hakka culture as one of the unique components of China's diverse cultural heritage. However, the study also identifies significant challenges, particularly the risk of commodification when cultural elements are reduced to content for global consumption. To mitigate these risks, the research emphasizes the need for collaboration between cultural experts, technologists, and community members in designing and implementing digital preservation projects. This approach ensures that the preserved heritage remains faithful to its original context and prevents the cultural value from being diminished by oversimplification or commercialization.

Engaging Younger Generations and Fostering Cultural Sovereignty

Researcher highlights the role of digital technologies in engaging younger generations with their cultural heritage. Generation Z shows a strong interest in using digital platforms like VR to interact with cultural content, but they expect these experiences to be both innovative and culturally authentic. The challenge is to balance technological advancement with the preservation of cultural authenticity, ensuring that digital experiences remain deeply connected to the values and traditions they represent. In addressing these challenges, it is crucial to consider the "micro-colonial paradox," where digital technologies, despite being viewed as empowering tools, may impose standardized frameworks and external agendas that subtly reinforce cultural dominance and narrative control(Lentin & Titley, 2011). Walter Mignolo underscores the importance of "epistemic disobedience" in resisting such globalized knowledge hierarchies, arguing that local communities must assert their own epistemologies to counter the risk of cultural homogenization(Mignolo, 2011). In the context of digital preservation, this highlights the need to foreground Hakka perspectives and ensure that technological frameworks do not overshadow or distort local cultural practices.

To counteract this, digital preservation projects must be critically examined to ensure that they do not replicate colonial dynamics under the guise of innovation. It is essential to integrate local knowledge systems and cultural perspectives into the design and implementation of these projects, thereby ensuring that the digital preservation of Hakka culture, or any other heritage, genuinely reflects and respects the communities it aims to serve. This approach not only safeguards cultural authenticity but also empowers local communities to maintain control over how their heritage is preserved and represented in the digital age.

Centering Ethnic Knowledge

Western media has historically misrepresented and harmfully stereotyped Chinese culture, for example, "Yellow Peril" stereotype reflected Western fears of Asian dominance or invasion, portraying Chinese characters as threatening, devious, and untrustworthy. (Tchen & Yeats, 2014) A notable example is Dr. Fu Manchu, a recurring villain in several films who embodied

this trope a brilliant but evil mastermind bent on world domination. Similarly, the "Dragon Lady" stereotype represented Chinese women as mysterious, sexually dangerous, or cunning, often appearing in films as seductresses or villainesses.(Rajgopal, 2010) Another common misrepresentation was the portrayal of Asian men as emasculated or comic figures, such as the character Charlie Chan, who, though depicted as intelligent, was portrayed by white actors in "yellowface," contributing to a long tradition of misrepresentation.(Norio Masuchika, 2013) Examples of yellowface also include white actors like Boris Karloff and Warner Oland, who played iconic Chinese characters such as Fu Manchu and Charlie Chan, respectively. In films like "The Good Earth" (1937), white actors played Chinese farmers, using makeup to create an "Asian" appearance, further contributing to a false and caricatured image of Chinese people. These examples show how Western media has marginalized and mispresented Chinese culture through a Western-centric or colonial narrative. These misrepresentations highlight the importance of reclaiming cultural narratives and ensuring that ethnic cultures like the Hakka are accurately represented. Decolonizing media involves dismantling Western-centric or colonial narratives, for the Hakka, this means ensuring that their language, traditions, and history are portrayed authentically and not homogenized or stereotyped by mainstream media.. New technologies, such as AI, can empower communities like the Hakka to take control of their cultural narratives and create culturally authentic content that reflects the nuances of their heritage.

The research emphasizes the importance of preserving the sovereignty of Chinese culture, specifically through advocating for digital preservation methods that prioritize Hakka cultural values. By ensuring that these methods align with the Hakka community's unique traditions and needs, the study reinforces the community's autonomy over its heritage, protecting it from external forces that might dilute or co-opt its distinct elements. Positioning Hakka culture within the broader landscape of Chinese culture ensures accurate representation of its unique aspects while safeguarding it from being overshadowed or distorted by outside influences. This approach not only preserves the integrity of Hakka culture but also strengthens its place within the rich diversity of Chinese heritage. Central to this effort is youth engagement, as involving Hakka youth in digital preservation initiatives empowers them with tools and knowledge to sustain and adapt their cultural traditions in relevant and accessible ways. This not only counters colonial narratives of cultural erosion but also ensures that Hakka culture remains dynamic and living. Furthermore, while this research is rooted in the Hakka context, it contributes to global discourses on cultural preservation and digital innovation by challenging top-down, universalizing approaches and promoting locally informed, community-driven strategies. This approach fosters a more equitable and dialogic exchange of knowledge, strengthening the resilience and authenticity of cultural heritage in the digital age.

Conclusion and Recommendations

This study critically explores the role of emerging digital technologies specifically AI, VR, and AR in the preservation of Hakka cultural heritage within a decentered media framework. The findings reveal that while these technologies present unique opportunities for cultural preservation, they also carry risks of reinforcing colonial narratives if not carefully managed. This balance between opportunity and risk underscores the need for a decolonized approach to media, where cultural heritage is preserved not just as a commodity but as an authentic expression of local values and history.

A key contribution of this research is its focus on integrating local cultural values and engaging Generation Z, who represent both the future custodians of cultural heritage and active

participants in digital culture. The engagement of Generation Z is crucial, as their participation ensures the transmission of cultural heritage through modern digital platforms, while simultaneously challenging dominant global narratives. By adopting decolonized media strategies, this study demonstrates how AI, VR, and AR can enable the preservation of Hakka culture in a way that resists the oversimplification and commodification often seen in global media representations. Furthermore, the research emphasizes the importance of safeguarding the sovereignty of Chinese culture, with Hakka as an integral part of this broader heritage. By leveraging these technologies, communities like the Hakka can maintain control over their cultural narratives, ensuring that technological advancements empower local communities rather than erode their cultural authenticity. This alignment between digital innovation and cultural sovereignty is essential for preserving not only the tangible aspects of Hakka culture but also its intangible values and practices. Moreover, engaging Generation Z in this process strengthens the continuity of Hakka traditions. By involving them in the creation and dissemination of cultural content, these digital tools not only enhance cultural identification but also support the broader goals of media decolonization. This approach ensures that Hakka cultural representations remain under local control, maintaining their depth, complexity, and cultural integrity. However, this study also acknowledges the inherent challenges posed by digital technologies, particularly the risk of perpetuating neo-colonial practices if control over content creation remains in the hands of external entities. To counteract this, the study advocates for strategies that prioritize ethnic knowledge, community empowerment, and cultural sovereignty. These strategies contribute to the dismantling of colonial legacies, ensuring that the digital representation of Hakka culture is authentic and community-driven.

Given the complexities of digital cultural preservation, this research advocates for collaborative approaches that integrate local knowledge with global frameworks. Global conservation strategies, such as UNESCO's Convention for the Safeguarding of the Intangible Cultural Heritage, offer valuable frameworks that can be adapted to local needs, informing sustainable and culturally appropriate preservation efforts. In the case of Hakka culture, this means tailoring global insights to resonate with the community's specific context while resisting the imposition of external norms. Drawing on Siiri Paananen's advocacy for participatory and co-creation methods, the findings highlight the need to involve local culture communities in shaping digital technologies to avoid cultural misrepresentation (Paananen et al., 2022). Such approaches prioritize cultural sovereignty and center the voices of the Hakka people, ensuring that digital preservation is authentic, community-driven, and free from the risks of commodification or neo-colonial dynamics.

In conclusion, this research advances the discourse on decolonizing media futures by providing a framework for leveraging digital technologies to sustain Hakka cultural heritage in the digital age. While the study has limitations, such as a small sample size and potential subjective bias, it offers valuable insights for policymakers and practitioners seeking to align digital technology with the preservation of local cultures. Future research should broaden its scope by expanding sample sizes, investigating specific applications of emerging digital technologies, and exploring how these tools can be adapted to other cultural contexts. Equally important is fostering broader community participation engaging local artists, cultural practitioners, and youth to ensure digital preservation strategies reflect lived experiences and aspirations. Community-led digital projects should prioritize local decision-making, strengthening cultural authenticity and sovereignty. Interdisciplinary collaborations among cultural experts, technologists, and educators are essential for creating nuanced strategies that balance technological innovation with cultural sensitivity. Capacity-building initiatives, such as training and resources for local practitioners and youth, will further empower communities to become active custodians of their cultural heritage. Establishing ongoing evaluation mechanisms will help ensure that digital preservation practices align with cultural values, adapt to technological change, and avoid external control or cultural homogenization. Together, these strategies underscore the need for a forward-looking approach that integrates digital innovation with ethical stewardship ensuring that Hakka and other ethnic cultures remain dynamic, evolving traditions that enrich both local and global landscapes.

REFERENCES

- Adewumi, A. A. (2022). Protecting intangible cultural heritage in the era of rapid technological advancement. *International Review of Law, Computers & Technology*, *36*(1), 3-16.
- Appadurai, A. (1996). Modernity at large: Cultural dimensions of globalization. *U of Minnesota P*.
- Bihari, S. (2023). Cultural Heritage and Indigenous Knowledge: Reviving Traditions for Future Generations. Sustainable Development Goals in SAARC Countries: Key Issues, Opportunities and Challenges, 1, 24-32.
- Bourreau, M., Moreau, F., & Wikström, P. (2022). Does digitization lead to the homogenization of cultural content? *Economic Inquiry*, 60(1), 427-453.
- Bucholtz, M. (2002). Youth and cultural practice. *Annual review of anthropology*, *31*(1), 525-552.
- Cameron, F., & Robinson, H. (2007). Digital knowledgescapes: Cultural, theoretical, practical, and usage issues facing museum collection databases in a digital epoch.
- Chan, S. Y., & Patten, A. (2023). What's Wrong with Neocolonialism: The Case of Unequal Trade in Cultural Goods. *American Political Science Review*, 1-15.
- Christiansen, F. (1998). Hakka: The politics of global ethnic identity building.
- Erlewein, S.-N. (2017). Culture, development and sustainability: The cultural impact of development and culture's role in sustainability. *Going Beyond: Perceptions of Sustainability in Heritage Studies No. 2*, 85-97.
- Gartman, D. (2002). Bourdieu's theory of cultural change: Explication, application, critique. *Sociological Theory*, 20(2), 255-277.
- Hiswara, A., Aziz, A. M., & Pujowati, Y. (2023). Cultural Preservation in a Globalized World: Strategies for Sustaining Heritage. *West Science Social and Humanities Studies*, 1(03), 98-106.
- Hou, Y., Kenderdine, S., Picca, D., Egloff, M., & Adamou, A. (2022). Digitizing intangible cultural heritage embodied: State of the art. *Journal on Computing and Cultural Heritage (JOCCH)*, 15(3), 1-20.
- Islam, M. R., Wahab, H. A., Burmester, C. F., & Chowdhury, S. R. (2019). Cultural globalization: A critical analysis of identity crises in the developing economies. *Globalization and development: Economic and socio-cultural perspectives from emerging markets*, 369-385.
- Lentin, A., & Titley, G. (2011). *The crises of multiculturalism: Racism in a neoliberal age*. Bloomsbury Publishing.
- Levin, I., & Mamlok, D. (2021). Culture and society in the digital age. Information, 12(2), 68.
- Ling, R. (2023). Nascent, liminal, and emerging technologies. *Emerging Media*, 1(1), 9-21.
- Liu, Q. (2021). Cultural exploitation in Chinese politics: reinterpreting Liu Sanjie. *Prometheus*, *37*(2), 111-136.
- Mignolo, W. (2011). Epistemic disobedience and the decolonial option: A manifesto. *Transmodernity: Journal of peripheral cultural production of the Luso-Hispanic world*, 1(2).

- Mouton, M., & Burns, R. (2021). (Digital) neo-colonialism in the smart city. *Regional Studies*, 55(12), 1890-1901.
- Norio Masuchika, G. (2013). "Yellowface" in movies: a survey of American academic collections. *Collection building*, 32(1), 31-36.
- Paananen, S., Suoheimo, M., & Häkkilä, J. (2022). Decolonizing design with technology in cultural heritage contexts-systematic literature review. Congress of the International Association of Societies of Design Research,
- Qian, Z. (2023). Heritage conservation as a territorialised urban strategy: conservative reuse of socialist industrial heritage in China. *International Journal of Heritage Studies*, 29(1-2), 63-80.
- Rajgopal, S. S. (2010). "The Daughter of Fu Manchu" The Pedagogy of Deconstructing the Representation of Asian Women in Film and Fiction. *Meridians*, 10(2), 141-162.
- Rizzo, I. (2016). Technological perspectives for cultural heritage. *The Artful Economist: A New Look at Cultural Economics*, 197-214.
- Sani, N. A., & Ahmad, Y. (2017). Shifting from cultural practitioners to Intangible Cultural Heritage (ICH) inheritors: Issues, challenges and approaches in the Malaysian's Living Human Treasure System. Safeguarding Cultural Heritage: Challenges and Approaches, 104.
- Strathman, N. (2019). Digitizing the ancestors: Issues in indigenous digital heritage projects. International Journal of Communication, 13, 18.
- Syafitri, M. (2024). Neocolonialism and Local Values: How Indigenous Peoples Preserve Their Cultural Identities in a Global Age. *Journal of Studies on Art, Culture and Society*, 23-28.
- Tchen, J. K. W., & Yeats, D. (2014). Yellow peril!: An archive of anti-Asian fear. Verso Books.
- Wan, S. (2024). The impact of globalized knowledge dissemination and US intellectual hegemony on Taiwan. MATEC Web of Conferences,
- Williams, C. E. (1987). Fantasy theme analysis: Theory vs. practice. *Rhetoric Society Quarterly*, *17*(1), 11-20.