African Journal of Hospitality, Tourism and Leisure **2025, Vol. 14 No. 5 pp. 1007-1014**
ISSN: 2223-814X

Infrastructure Legacy Resilience and Tourism Development Imperatives of Mega-Event Stadia in Emerging Economies

Hilary Kennedy Nji BAMA
Department of Business Management, University of the Free State, Email, Bamahkn@ufs.ac.za

Abstract

This study interrogates the contested infrastructure legacy resilience and tourism development imperatives of mega-event stadia in emerging contexts, using the DHL Stadium in Cape Town and Mbombela Stadium in Nelspruit, South Africa. Drawing on fourteen (14) qualitatively collected semi-structured interviews and anchored on an integrated conceptual model, the study established that while the stadia remained structurally intact, they exhibited weak institutional resilience, fragmented governance, and minimal alignment with destination strategies. Superficial community engagement further undermined the perceived public value of the infrastructure. The study concludes that legacy realisation depends on anticipatory planning, inclusive governance, and adaptive capacity. Recommendations include early integration of legacy planning, strengthened multi-level coordination, enhanced community engagement, strategic tourism programming, and targeted investment. The study contributed to a context-sensitive understanding of post-event infrastructure functionality and its intersection with tourism imperatives in the Global South.

Keywords Emerging economies; infrastructure resilience; mega-event stadia; tourism development

How to cite this article: Bama, H.K.N. (2025). Infrastructure Legacy Resilience and Tourism Development Imperatives of Mega-Event Stadia in Emerging Economies. African Journal of Hospitality, Tourism and Leisure, 14(5):1007-1014. DOI: https://doi.org/10.46222/ajhtl.19770720.687

Introduction

The hosting of sport mega-events is a crucial component in promoting developmental agendas in relation to socio-economic conditions within the global context (Bama, 2018; Bama & Tichaawa, 2020; Preuss, 2015, 2018). Mega-events such as the FIFA World Cup or Olympic Games often promise enduring legacies in the form of upgraded infrastructure, enhanced urban form and strengthened tourism appeal (Bama & Tichaawa, 2021). For instance, in the run-up to South Africa's hosting of the 2010 FIFA World Cup, it was projected that the country stood the chance of presenting the country as a modern, technologically advanced, democratic, business-friendly, tourist destination (Alegi, 2008). Stadia, in this context, also seek to re-craft the global and regional image of the host environment, presenting them as futuristic arenas that show off the technical capabilities and capture the world's imagination (Kassens-Noor et al., 2015). Yet, reality notes that many host cities, particularly in the emerging contexts, like South Africa, tell of more ambivalent stories (Koenigstorfer et al., 2019; Mosime, 2016). Infrastructure built for such events, particularly stadia, may face challenges of underutilisation, high fixed and maintenance costs, and weak alignment with local developmental priorities. The case of South Africa's 2010 FIFA World Cup is emblematic in this regard: while the country gained global visibility and some infrastructural gains, scholars remain sceptical about the sustainability and inclusivity of those outcomes (Tomlinson et al., 2011; Preuss, 2018). Central to the promise of the development of event-related infrastructure, in particular stadia, is the justification and projection of their long-term legacy benefits (Bama, 2018; Bama & Tichaawa, 2021; Preuss, 2018). Nonetheless, in the years following the event, the utility, sustainability, and developmental alignment of such infrastructure are frequently called into question, emphasising the need for resilience incorporation (Daniels & Tichaawa, 2024). South Africa's hosting of the 2010 FIFA World Cup remains a defining example of this dynamic, where major stadia were constructed or upgraded with the expectation of ending socio-economic returns (Drummond & Cronje, 2019). Among these, the DHL Stadium in Cape Town and the Mbombela Stadium exemplify contrasting legacy trajectories shaped by differing urban scales, governance contexts, and post-event utilisation patterns. Drummond & Cronje (2019) opine that the stadium in Cape Town is often cited as a high-profile example of stadium 'white elephant' risks, having been expensive to build and struggling with consistent use and cost recovery in the post-event years. Meanwhile, Mbombela Stadium was intended to serve as a premier large-capacity venue for the Mpumalanga province (Mbombela IDP, 2009), something critics have questioned as to whether it has achieved sustained tourism, sporting, or community integration commensurate with its cost (Freschi, 2011; Street et al., 2014).

Mega-events have for decades been positioned as strategic opportunities by host nations to accelerate infrastructure investment, urban regeneration and tourism development. Nonetheless, the notion of legacy has become increasingly contested, especially in emerging economies where resource constraints and governance complexities are pronounced (Knott & Tinaz, 2022). The infrastructure legacy associated with mega-event stadia raises concerns. These include questions of long-term viability, maintenance cost burdens and alignment with local development priorities (Bama & Tichaawa, 2021; Reis et al., 2023). In the context of tourism, mega-event stadia are often framed as catalysts for destination branding, sport tourism, and visitor economy enhancement (Bazzanella et al., 2023). The construction of such stadia is frequently justified on the basis that they will generate return flows via events, tours, and auxiliary tourism attractions. Yet, empirical evidence suggests that utilisation rates and tourism-derivative benefits are uneven, especially in emerging economy contexts (Bama & Tichaawa,

Open Rubric

2021). Long-term legacy value of mega-event infrastructure in emerging economies remains highly contested, particularly regarding tourism development and post-event stadium infrastructure resilience. Within South Africa, the hosting of the 2010 FIFA World Cup represented a major infrastructure and tourism investment. The stadia were conceived as urban icons and as legacy assets for tourism and sport. Nonetheless, assessments indicate that while there was initial optimism, post-event challenges in operation, maintenance, and community integration emerged (Bama & Tichaawa, 2020; Swart & Bob, 2012). The cost of upkeep, limited anchor tenants and declining utilisation have raised questions about how resilient the infrastructure really is (Bama & Tichaawa, 2021). Given renewed attention to stadium infrastructure resilience and public investment efficiency following the COVID-19 pandemic, this study interrogates the contested legacy outcomes of mega-event infrastructure in emerging economies by examining the stadium infrastructure and tourism development legacy imperatives of the 2010 FIFA World Cup in South Africa, with specific reference to the DHL Stadium and the Mbombela Stadium. In so doing, the study interrogates how these stadia demonstrated resilient legacies and what lessons these experiences hold for the tourism development potential of mega-event stadia in emerging economies. This inquiry, therefore, aims to address the relative lacunae in extant scholarship that often emphasises developed economies and overlooks the persistence of legacy risk in emerging economy contexts (Alshikhy et al., 2025; Knott et al., 2022). By way of contribution, this study advances theoretical understandings of mega-event infrastructure legacy by incorporating the concept of resilience, thus shifting the focus from mere post-event outcomes to the capacity to withstand, adapt and repurpose infrastructure over time. Additionally, the inquiry integrates a tourism-development lens by emphasising not only physical infrastructure but the embeddedness of stadia in destination systems, sporting and visitor economies, and community-oriented regeneration. For policymakers and planners in emerging-economy host cities, the findings point to the importance of early legacy-oriented planning, strong governance coalitions, and adaptive event-tourism strategies to avoid infrastructure becoming a burden rather than a benefit.

Theoretical underpinning

Infrastructure legacy frameworks

The concept of legacy in the context of mega-events has evolved substantially. Early definitions emphasised the long-term benefits or costs left by large-scale events such as the Olympics or the FIFA World Cup. Such legacies include improved urban infrastructure, enhanced global reputation and tourism growth (Li & McCabe, 2012; Preuss, 2015). More recently, scholars such as Byers (2020) highlight that legacy is not automatically positive, and that multiple typologies (economic, social, spatial and environmental) must be distinguished. The construction of stadia for mega-events is often further touted as part of the infrastructure backlog programme for the host country, and Allmers & Maennig (2008) contend that new stadia constructed for mega-events give rise to novelty effects, increased comfort, and improved views and atmosphere. For instance, the framework proposed by Preuss (2007) and revisited in subsequent scholarship emphasises inputs (investment), outputs (infrastructure created), outcomes (utilisation) and impacts (long-term city changes). Critically, the Centre for Events and Festivals (CEF) asserts that effective legacy frameworks recognise the need for early planning, alignment with pre-existing city agendas and realistic assumptions about post-event use (CEF, 2022; Preuss, 2018; Stewart & Rayner, 2016). Despite these advances, research continues to signal measurement problems and inconsistent definitions. The concept of legacy remains dangerously easy to manipulate in host city discourse (CEF, 2022). While this body of work has addressed infrastructure, tourism and urban development more broadly, fewer studies focus clearly on the stadium asset and its long-term legacy in tourism development, promotion and emerging-economy contexts.

Stakeholder theory

Considered by much of academia, as expounded by, and grounded in Freeman's (1984) theory, the concepts of 'stakeholders' and 'stakeholder theory' have, in contemporary academic discourse, infiltrated the dialogue in the management sciences domain, and many other disciplines alike (Freeman, 2011; Harrison & Wicks, 2013). Ansoff (1965) first applied the term 'stakeholder theory' in defining the objectives of the firm, a major thrust of which was to attain the ability to balance the conflicting demands of various stakeholders in the firm. According to Phillips et al. (2003), stakeholder theory is concerned with organisational management and ethics, with the primary aim of promoting stakeholder maximisation. Contemporary research suggests that stakeholder theory, as a concept, has been applied in the domain of tourism in relation to strategic planning and sustainability imperatives of managing tourism destinations (Hall, 2012; Hardy & Beeton, 2001). Discussions on stakeholder theory also highlight that, without stakeholder support, developing tourism in a sustainable manner would be difficult (Hinch & Higham, 2011). Consequently, implementing the stakeholder approach rendered the determination of whether the expectations of stakeholder groups, such as residents and stadium managers, in terms of the legacy benefits applicable to the hosting of the event. In their research, Gursoy & Kendall (2006) assert that the involvement and support of all stakeholders is critical, irrespective of their previous attitudes. In pursuing the sustainability imperatives of the mega-event infrastructure resilience in the developing economies, the current study adopted the stakeholder approach. Stakeholder engagement, as defined by Bourne (2010), was implemented through the identification of stakeholders, and their prioritisation, visualisation, and engagement through effective communications. The stakeholders' engagement was obtained with the aim of establishing their views, perceptions and indications, as well as of assessing their interests with regard to their perceptions of the sustainability and resilience trajectory of 2010 FIFA World Cup stadia infrastructure deployment and management in the context of tourism development imperatives (Bama & Tichaawa, 2021). The key stakeholders in the current study included the residents, stadium anchor tenants, the stadium management organisations, the municipalities involved in stadium management, and the government departments within the host cities of Cape Town and Mbombela.

Resilience and infrastructure in emerging settings

Infrastructure legacy scholarship has begun to engage with the concept of resilience. Resilience is understood to be the capacity of a system to absorb disturbance, adapt and maintain function. In mega-event studies, resilience is still an emergent theme, with the concept receiving limited application in the sport-tourism event context (Hemmonsbey & Knott, 2023). In parallel, Gao (2025) argues that resilience in the mega-event domain needs sharper conceptualisation, while considering what it means for infrastructure, institutions and destination systems to be resilient. Applied to emerging economies, resilience becomes critical. These contexts often face institutional fragility, maintenance funding gaps, and weaker market absorption of post-event infrastructure (Baumann & Matheson, 2018; Townes et al., 2025). For instance, studies exploring mega-sport events and sustainability note that infrastructure legacy in emerging contexts is vulnerable to underutilisation, rapid deterioration and misalignment with local developmental priorities (Al-Muhannadi et al., 2024; Daniels &Tichaawa, 2025). The phenomenon of infrastructure lag is especially pertinent in emerging economies, where tourism flows, governance capacity and public-private partnerships may be weaker. Thus, a resilience lens helps shift the conversation from what legacy emerged, to how well the infrastructure is embedded, maintained and adapted over time in context.

Tourism development imperatives of mega-event stadia

Mega-event stadia have been marketed as tourism assets as they contribute to destination branding, sporting tourism, and urban regeneration. The tourism literature emphasises that mega-events offer host cities the opportunity to enhance their attractiveness, media exposure and visitor flows (Alshikhy et al., 2025; Knott et al., 2022). Research on sport tourism destination attractiveness, particularly in emerging economies, identifies key drivers such as event legacy, facility quality, and stakeholder collaboration (Daniels & Tichaawa, 2024; Moradi & Norouzi Seyed Hossini, 2025; Proos, 2025). However, the link between stadium infrastructure and tourism development is less straightforward in practice. While stadia may host initial high-profile events, long-term tourism utilisation depends on how well they integrate into visitor experiences, complementary amenities and destination systems. Contemporary scholars emphasise that tourism-legacy measurement must include destination image, repeat visitation, and tourism product creation, not simply infrastructure output. Particularly in emerging contexts, current scholarship highlights the risk of stadia becoming ‘white elephants’ or underused structures when tourism demand, local events market and commercial viability are weak (Daniels & Tichaawa, 2025; Wheatly, 2024). Consequently, for stadia to fulfil tourism development imperatives, they must move beyond event hosting to become enduring nodes of tourism activity, embedded within destination branding strategies, accessible to non-event tourists, and supported by operational and governance capacity.

Conceptual framework

This study draws on three interlinked conceptual strands to frame its investigation of mega-event stadia in emerging economy contexts: infrastructure legacy theory, resilience thinking in infrastructure systems, and tourism development imperatives in event-led urban investment. While each framework offers discrete analytical insights, their intersection provides a more comprehensive lens through which to evaluate the trajectories of DHL Stadium and Mbombela Stadium since their commissioning for the 2010 FIFA World Cup. Infrastructure legacy, as theorised by Preuss (2007) and later refined in critical literature (Byers, 2020), encompasses both tangible and intangible outcomes that remain after a mega-event concludes. In the case of stadia, the focus is on physical infrastructure and its sustained utility, adaptability, and relevance within urban development trajectories. This study adopts a legacy lens that goes beyond immediate post-event assessment to examine how these venues function over time in terms of usage, spatial integration, and public value. On its part, resilience is not only conceptualised as physical durability, but also as the infrastructure system’s capacity to adapt to shifting urban, economic, and governance conditions (Gao, 2025; Townes et al., 2025). In emerging economies, where state capacity, fiscal constraints, and institutional coordination are often limited, resilience demands a context-sensitive evaluation. This includes the ability of stadium infrastructure to resist obsolescence, accommodate alternative functions, and remain viable amid governance and funding uncertainties. A resilient legacy thus implies infrastructure that can be maintained, reimagined, and reintegrated over time. Tourism imperatives are the third analytical axis, recognising that mega-event stadia are often justified as tourism enablers, whether for sport tourism, heritage-linked visitation, or broader destination branding. This study foregrounds Li & McCabe’s (2012) conceptualisation of tourism legacy as including both the infrastructure itself and the tourism system it supports. The assessment includes the degree to which the stadia contribute to long-term tourism flows, generate diversified tourism use, and fit within regional destination development strategies.

The conceptual framework integrates these three strands (Figure 1) to evaluate stadium legacies not only in terms of their structural endurance but also their institutional adaptability and contribution to sustained tourism growth. This integrated framework supports a more nuanced understanding of how mega-event infrastructure functions post-event, particularly in resource-constrained and governance-fragmented environments typical of emerging economies. The DHL Stadium in Cape Town and Mbombela Stadium serve as contrasting yet complementary case studies. Cape Town represents a metropolitan context with high tourism inflows, a diversified economy, and a competitive event landscape. Mbombela, by contrast, is a smaller regional centre with lower event density and limited tourism infrastructure. This contrast enables exploration of how legacy resilience and tourism imperatives play out under differing urban and developmental conditions, while remaining within the same national mega-event policy frame.

Copyright: © 2025 AJHTL /Author(s) | Open Access – Online @ www.ajhtl.com

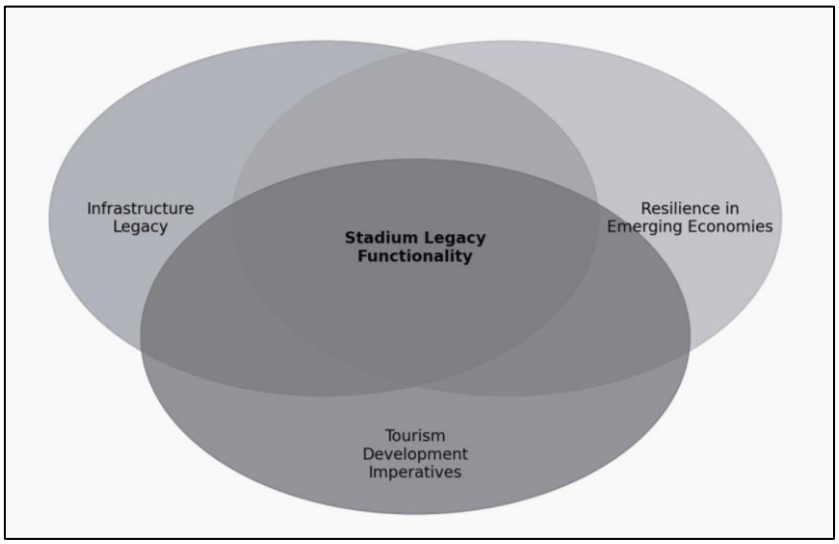

Figure 1: Conceptual framework

Methodology

This qualitatively designed study relies on the interpretivist paradigm, oriented to provide in-depth insights into the infrastructure legacy resilience and tourism-development imperatives of two mega-event stadia in South Africa: the DHL Cape Town Stadium and Mbombela Stadium. The qualitative design is appropriate given the focus on contextual and interpretive understanding of infrastructure performance over time, institutional dynamics and tourism linkages (Cresswell & Cresswell, 2018). The stadia were selected via a purposive sampling to capture variation in urban and tourism contexts within the same national legacy framework. Cape Town's DHL Stadium, located in a major metropolitan tourism hub, and Mbombela Stadium, in a smaller regional city, provide contrast in terms of scale, tourism market maturity, event volumes and infrastructure embedding. Such contrast enables the identification of how legacy resilience and tourism imperatives are conditioned by local context, institutional capacity and urban characteristics (Bama, 2018). Primary data were collected between the months of May and September 2025 via semi-structured virtual interviews with 14 [8 based in Cape Town and 6 based in Mbombela] key resource persons within municipal government structures, stadium management authorities, tourism representatives, local business representatives and resident organisations. To facilitate the interviews, an interview guide consisted of structured questions around four domains: (1) perceptions of infrastructure legacy, (2) resilience of venue infrastructure and institutions, (3) tourism development outcomes and mechanisms, and (4) stakeholder coordination and governance roles. The interviews all lasted between 40-60 minutes each, conducted via video conferencing on Microsoft Teams or Zoom technology, given the scheduling and travel limitations. Interviews were recorded with participants' informed consent. The collected data were subsequently transcribed verbatim from the interviews. Thereafter, the transcripts were imported into the NVivo qualitative analysis software for systematic coding. An inductive-deductive approach was adopted whereby initial open coding identified emergent themes from the data, after which codes were mapped to the conceptual framework's dimensions. Through iterative coding, category refinement and cross-case comparison, patterns within the two stadia contexts were identified. Throughout the process, the transcripts and themes were constantly checked against the recordings and the notes made by the researcher, to ensure transferability, credibility and confirmability (Abrahams & Bama, 2023; Bama & Tichaawa, 2021). Key findings emanating from the interviews are discussed below.

Results and discussion

Following the content analysis of the interview transcripts, the data were grouped according to the varying conceptual categories and discussed in line with the emergent themes. The analysis generated four overarching themes relevant to the conceptual framework: (1) infrastructure legacy outcomes, (2) institutional and operational resilience, (3) tourism development linkages, and (4) stakeholder engagement and community perception. Themes are illustrated using verbatim excerpts from interview participants and, where relevant, triangulated with the conceptual framework. Key differences and similarities between the two stadia are highlighted to foreground how local context shapes legacy trajectories in emerging economy settings.

Infrastructure legacy outcomes

Stakeholder perspectives across both case sites revealed divergent patterns in the material and symbolic legacy of the stadia. In Cape Town, the stadium remains structurally sound and visually iconic, often cited as a landmark in the city's urban landscape. Additionally, participants acceded to the fact that the stadium is largely integrated into the fabric of the city, as it has been used for promotional and marketing purposes. To this end, a stadium management official from Cape Town stated "The stadium provides a tool for the promotion and marketing of the city and country as a whole… the amount of advertising the city got out of the Rugby Sevens tournament, for example, is simply phenomenal, and makes the stadium a powerful tool for positioning the city as a preferred tourism and events destination." While such an agreement was noted, informants nonetheless highlighted that the utilisation of the stadium has not matched expectations. While it has hosted occasional international sporting fixtures,

concerts, and cultural events, the stadium still operates below capacity for most of the year. As noted by one of the participants: "The infrastructure is world-class, but the volume and frequency of events are far lower than what was projected back before 2010. Additionally, the cost of maintaining that level of facility is enormous". Such feedback corroborated previous studies on mega-event infrastructure sustainability in South Africa which found that the costs of operations and maintenance of stadia in South Africa (DHL in Cape Town, Moses Mabhida in Durban, and Nelson Mandela in Gqeberha) ranged between R55 and R80million in annual costs, highlighting why there were huge contestations in both the media and academic space as to the sustainability of these facilities (Bama & Tichaawa, 2021). Furthermore, the key informants from Mbombela noted that the stadium is considered a 'white elephant' given its minimal usage beyond sporadic local football matches and government events (Molloy & Chetty, 2015). Particularly, its location in the periphery of a smaller city with limited commercial event demand was cited as a key barrier to sustained use. As such, a municipal official from Mbombela observed that "Construction of the stadium was never just about the hosting of a tournament, but rather about building a legacy - a legacy in terms of, amongst others, infrastructure development, … Nonetheless, we struggle to justify the facility's upkeep. It is not well integrated into the tourism offering, and event planners often bypass us for better-connected cities". Collectively, the findings highlighted that legacy planning was considered minimal or retrospective as there was little evidence of structured post-event programming strategies, anchor tenants, or financial sustainability planning at the time of construction, corroborating prior scholarship on the issue (Baumann & Matheson, 2018). This absence of long-term alignment was frequently mentioned as a missed opportunity to convert the infrastructure into a sustainable legacy asset.

Institutional and operational resilience

Across both study areas, respondents consistently emphasised institutional fragility and resource strain as central challenges undermining the resilience of the stadia. Institutional and operational resilience here considers the stadium governance structures, funding models, and operational mechanisms to support ongoing utilisation and maintenance. Until as recently as 2021, the DHL Stadium in Cape Town was owned and managed by the municipality. Consequently, some respondents [perhaps unfamiliar with the changing management model] noted that persistent tensions were a fixture among political leadership, operational teams, and commercial partners. For instance, one of the officials noted that "We've not fully succeeded in that yet. Certainly, the income does not cover the cost of operations. And, essentially, the reason for that is that we don't yet have enough usage of the stadium for high-income-producing events. We have the structure and the city support, but the model is not self-sustaining. The constant pressure to justify the cost, especially when events don't break even". Some effort had been taken to establish public-private partnerships, but these were reported to be short-lived or transactional rather than strategic. In this regard, respondents described operational processes as reactive rather than adaptive, with few mechanisms in place for long-term scenario planning or multi-stakeholder governance coordination. Furthermore, some respondents noted that institutional weaknesses were even more pronounced in Mbombela. Such respondents highlighted a lack of dedicated stadium management personnel, unclear accountability structures, and a minimal events portfolio, with no standalone strategic plan or budget. To this end, one of the stadium officials stated that "No one really owns the stadium. It is in our books, yes, but there's no long-term strategy or even a dedicated manager with the mandate to reposition it. There were some viability considerations, but only at a superficial level, because that wasn't really driving the decision-making. Sustainability planning and the implications for post-event utilisation were lacking. And so, the viability was not tested... It was simply assumed that it could be viable, [and] that there would be enough use afterwards". Consequently, funding for maintenance and refurbishment was identified as inconsistent, with deferred maintenance becoming a growing concern, particularly for Mbombela. Respondents' views further highlighted concerns about the absence of institutional memory, frequent turnover in city management, and limited interdepartmental collaboration, all of which weakened the adaptive capacity of the stadium institutions to respond to shifting post-event realities (Mosime, 2016). Humphrey & Fraser (2016), considering a study by Alm et al. (2012), indicate that the hosting of the 2010 FIFA World Cup in South Africa led to an oversupply of stadia, when considered in the context of the stadium's capacity, and the attendance and utilisation figures, suggesting that from a sustainability and resilience perspective, appropriate strategies are required.

Tourism development linkages

Stakeholder views on the tourism development contributions of the stadia revealed a gap between aspirational legacy narratives and actual integration into the tourism economy. Across both study areas, respondents noted that the stadia were justified, in part as tourism assets which, in their views, mostly remained underexploited. For instance, with the respondents from Cape Town, the symbolic and branding value of the DHL Stadium has been sustained, particularly through panoramic imagery of the stadium in promotional materials, which Drummond & Cronje (2019) consider as a 'soft' benefit of the stadium. Nonetheless, respondents highlighted that tourism-related programming such as stadium tours, event packaging, or regular sporting and event fixtures remained sporadic, concurring with rhetoric that there was no consistent plan regarding leveraging the tourism potential of the stadia in the long term. As such, with regard to the DHL Stadium in Cape Town, one of the residents noted "The stadium is iconic, no doubt. But tell me what the legacy was other than infrastructure. There was no real legacy planning… no integration with community priorities". In concurrence, another participant, from the community around the Mbombela stadium, noted that "The stadium is iconic, yes. But from a tourism point of view, it is not leveraged in a consistent or strategic manner. Most visitors [only] see it from afar". Furthermore, local tourism stakeholders pointed to the lack of integration between event calendars, tour operators, and destination marketing initiatives. The absence of a dedicated sport tourism strategy was repeatedly identified as a missed opportunity. In the instance of Mbombela, the situation was more acute.

Most participants indicated that the stadium has failed to contribute meaningfully to tourism development. Limited international visitation, weak destination branding and lack of event infrastructure coordination were cited as barriers. A respondent from the local tourism bureau remarked that "It's not even on our list of tourism sites anymore. There's nothing happening there that draws visitors, and it does not fit into the region's tourism strategy". Across both study areas, the findings suggest that while the stadia are physically present, they remain peripheral in local tourism systems. Respondents consistently linked this disconnect to governance fragmentation, lack of post-event-tourism planning, and weak institutional collaboration between sport, tourism, and urban development, which aligns with extant literature that more often than not, planning was superficial in substance (Drummond & Cronje, 2019).

Stakeholder engagement and community perception

Stakeholder engagement and perceptions of local community value emerged as cross-cutting issues affecting both stadium legacy and future sustainability. Across both case study areas, participants expressed concern that initial consultations during the planning and construction phases were limited, top-down, and largely symbolic. Post-event, this pattern has persisted, with minimal community involvement in legacy planning or ongoing stadium development and usage. In Cape Town, for example, respondents noted some attempt at community programming and limited access for local sport groups, but these efforts were described as intermittent and under-resourced. Several community representatives expressed ambivalence about the stadium's presence in noting that "It's beautiful, but it doesn't feel like it belongs to the communities around it. We don't use it unless there's a major event, even then, it's usually priced out of reach". In the case of Mbombela, the discontent appeared more entrenched. Local business owners and community leaders described that stadium as physically and socially removed from the urban core, with little visibility or integration into everyday life. A community leader noted "We were told it would bring jobs, tourism, and events. But after the 2010 [FIFA World Cup], it has been mostly quiet. Most people or visitors don't know what happens here now, if anything at all". The lack of sustained stakeholder dialogue and participatory planning mechanisms was seen as a key constraint on legacy realisation and resilience building. Participants stressed that without meaningful engagement, particularly with the local tourism stakeholders and surrounding communities, efforts to reposition the stadia as long-term public assets would remain futile. Moreover, a sense of symbolic disconnection has undermined local ownership, further weakening the infrastructural and social resilience of the stadia.

Discussion

The study aimed to examine the infrastructure legacy resilience and tourism development imperatives of mega-event stadia in an emerging economy context, using the DHL Stadium in Cape Town and the Mbombela Stadium in Mbombela. The findings reinforce the need to move beyond singular interpretations of legacy as static or universally beneficial. Instead, they suggest that legacy outcomes are contingent on institutional adaptability, spatial context, and integration with broader tourism and development systems. From an infrastructure resilience perspective, both stadia remain intact more than a decade after the 2010 FIFA World Cup, their functional integration into the urban and tourism fabric is limited. These findings align with Preuss (2007) framework, which distinguishes between planned and unplanned legacies, and between tangible infrastructure and its long-term impact. The underutilisation of Mbombela Stadium, and sporadic programming of activities at the DHL Stadium, reflect a disconnect between initial aspirations and the lived post-event reality, an observation consistent with critiques by Bama & Tichaawa (2021) and Knott et al. (2022) The absence of clearly defined long-term legacy objectives, coupled with limited legacy governance structures, undermine the stadia's ability to achieve resilience, and evolve into everyday public assets. Applying a resilience lens sharpened the distinction between physical and institutional sustainability. Although the stadia remain operational, their management structures exhibit low adaptive capacity, a finding consistent with Gao (2025), who argues that resilience in infrastructure systems requires governance coherence and resource flexibility. In both cases, budgetary strain, fragmented mandates, and weak intersectional coordination limited the venues' ability to respond to changing post-event conditions. Mbombela Stadium's reliance on ad hoc management and the absence of dedicated personnel exemplify what Baumann & Matheson (2018) described as infrastructure lag in emerging contexts: assets that survive physically but stagnate institutionally.

Despite being positioned as catalysts for long-term tourism, the stadia remain peripheral to local tourism systems. This concurs with Li & McCabe's (2012) argument that legacy should be assessed not only in terms of infrastructure delivery, but also in terms of the integration of that infrastructure into the destination experience and branding strategies. The lack of stadium-based tourism products, such as tours and event packages, limited collaboration with tourism stakeholders, and low visibility (particularly in Mbombela) in destination promotion all reflect a missed opportunity to embed the venues into the tourism economies where the tourism economy may be otherwise strong, as in the instance of Cape Town. Perhaps the most consistent cross-case finding was the limited stakeholder engagement and lack of community integration. This undermines both institutional resilience and the social legitimacy of the infrastructure. Community perceptions of disconnection, exclusion, and symbolic alienation, particularly in Mbombela, echo concerns raised in post-event literature about mega-projects reinforcing urban inequalities rather than resolving them (Swart & Bob, 2012). Without participatory planning or community co-ownership, legacy infrastructure risks becoming not only underused but also politically and socially fragile. These findings validate the conceptual integration of legacy, resilience, and tourism development as a framework for analysing post-event infrastructure. They also highlight that in emerging economies, the successful convergence of these three domains depends on anticipatory governance, cross-sector collaboration, and community anchoring. Legacy is not simply what is left behind, but what is actively maintained, adapted, and embedded over time.

Conclusion

The study examined the infrastructure legacy outcomes, institutional resilience and tourism development linkages of two mega-event stadia in South Africa, fifteen years after the 2010 FIFA World Cup. Using semi-structured interviews with key stakeholders, and predicated on the conceptual framework integrating legacy theory, resilience thinking and tourism imperatives, the study highlights significant lacunae between initial expectations and long-tern realities. While the stadia remain physically intact and symbolically present in their respective urban landscapes, their practical contribution to post-event tourism development and sustained public value has been limited. The findings underscore the importance of moving beyond a static conception of legacy and adopting a more dynamic understanding centred on institutional adaptability, stakeholder engagement, and tourism system integration. To enhance the long-term value of mega-event stadia in emerging economies, legacy planning must be embedded from the outset of the project lifecycle. Rather than treating legacy as a retrospective concern, infrastructure initiatives should include detailed legacy-use scenarios, transition strategies, and repurposing plans during the design and planning phases. This should be supported by dedicated budget lines for post-event operations, allowing for smooth handover and long-term continuity. Furthermore, multi-level governance structures must be strengthened to improve coordination across stadium management entities, tourism authorities, and community stakeholders. Fragmented governance has been shown to undermine both institutional resilience and tourism integration. Establishing a lead legacy agency with a mandate for legacy and tourism development would enhance accountability, foster strategic coherence, and improve operational efficiency.

The absence of long-term planning mechanisms, weak governance structures, and limited alignment with local tourism strategies have constrained the stadia's ability to function as resilient, tourism-enabling infrastructure. Mbombela Stadium in particular, illustrates the vulnerabilities of legacy infrastructure in secondary cities with limited demand, capacity and political prioritisation. Community anchoring and access should be prioritised. Programmes that encourage community participation, such as access for local sport clubs, events and cultural initiatives, can help foster a sense of shared ownership. This not only improves the social legitimacy of the infrastructure but also ensures that the stadium contributes to local well-being and public value beyond elite events. In addition, tourism programming must be purposefully integrated into stadium operations, including stadium tours, multi-event packaging, and collaborative marketing with nearby tourism attractions to maximise their contribution to the visitor economy. Investment in adaptive capacity is also critical to infrastructure resilience, including the ability to adjust to evolving community needs and fluctuating fiscal resources. Diversified revenue streams, flexible partnership models, and mechanisms for periodic reassessment of stadium use will enable these facilities to remain relevant and functional over time. Ultimately, this study contributes to the literature on legacy by demonstrating that in emerging economies, infrastructure legacy is shaped as much by institutional and governance conditions as by physical design. For mega-event investments to yield long-term tourism and development value, legacy resilience must be planned, not presumed.

Acknowledgement

This paper forms part of a broader research study on mega-event infrastructure legacies in emerging economies and the researcher would like to acknowledge the financial contributions made by the University of Free State, South Africa.

Reference

Abrahams, E. & Bama, H. K. (2023). Study Abroad Programmes as an Edutourism Segment for South African Universities. *GeoJournal of Tourism and Geosites*, *51*(4), 1775-1785. https://doi.org/10.30892/gtg.514spl18-1173

Alegi, P. (2008). A Nation to be Reckoned With: The Politics of World Cup Stadium Construction in Cape Town and Durban, South Africa. *African Studies*, *67*(3), 397-422. https://doi.org/10.1080/00020180802505038

Al-Muhannadi, K., Boros, A., Vinogradov, S. & Dávid, L. D. (2024). Literature Review of Impacts of Mega-Sport Global Events on Destination Sustainability and Sustainability Marketing—Reflection on Qatar 2022 FIFA World Cup. *Journal of Infrastructure Policy Development*, *8*, 6214. https://doi.org/10.24294/jipd.v8i12.6214

Alshikhy, T., O'Sullivan, H., Polkinghorne, M. & Gennings, E. (2025). The Role and Impact of Sporting Mega-Events in the Context of Soft Power. *Encyclopedia*, *5*(1), 31. https://doi.org/10.3390/encyclopedia5010031

Ansoff, I. (1965). *Corporate Strategy: An Analytic Approach to Business Policy for Growth and Expansion*. New York: McGraw-Hill.

Bama, H. K. N. (2018). *Sustainable Mega-event Infrastructure Development in Developing Economies: A case Study of the Infrastructural Legacy Impacts of Selected 2010 FIFA World Cup Stadia in South Africa*. Unpublished Doctoral Thesis University of Johannesburg, Johannesburg.

Bama, H. K. N. & Tichaawa, T. M. (2020). Mega-Event and Stadium Legacies in the Global South: The Case of South Africa. In *New directions in South African Tourism Geographies* (pp. 129-145). Cham: Springer International Publishing.

Bama, H. K. N. & Tichaawa, T. M. (2021). The Urban Legacy Impacts of Mega-Event Stadia: Selected Case Studies from South Africa. *Geosport for Society*, *14*(1), 28-46. https://doi.org/10.30892/gss.1404-074

Baumann, R. & Matheson, V. (2018). Mega-events and Tourism: The Case of Brazil. *Contemporary Economic Policy*, *36*(2), 292-301. https://doi.org/10.1111/coep.12270

Bazzanella, F., Schnitzer, M., Peters, M. & Bichler, B. F. (2023). The Role of Sports Events in Developing Tourism Destinations: A Systematized Review and Future Research Agenda. *Journal of Sport & Tourism*, *27*(2), 77-109. https://doi.org/10.1080/14775085.2023.2186925

Bourne, L. (2016). Targeted Communication: The Key to Effective Stakeholder Engagement. *Procedia-Social and Behavioral Sciences*, *226*, 431-438. https://doi.org/10.1016/j.sbspro.2016.06.208

Byers, T., Hayday, E. & Pappous, A. S. (2020). A New Conceptualization of Mega Sports Event Legacy Delivery: Wicked Problems and Critical Realist Solution. *Sport Management Review*, *23*(2), 171-182. https://doi.org/10.1016/j.smr.2019.04.001

City of Mbombela. (2009). Mbombela Municipality Integrated Development Plan. Available at https://www.cogta.gov.za/wp-content/uploads/2021/02/City-of-Mbombela-Municipality.pdf [Retrieved 24 October 2025].

Daniels, T. & Tichaawa, T.M. (2021). Rethinking Sport Tourism Events in a Post-Covid19 South Africa. *African Journal of Hospitality, Tourism and Leisure*, 10(4), 1241-1256. https://doi.org/10.46222/ajhtl.19770720-160

Daniels, T. & Tichaawa, T. M. (2024). The Path to Resilience in Sport Event Tourism: South African Stakeholder Responses to a Crisis. *Development Southern Africa*, *41*(4), 795-809. https://doi.org/10.1080/0376835X.2024.2350383

Daniels, T. & Tichaawa, T. M. (2025). Towards a Framework for Resilience Building in Sport Event Tourism in the Developing Context. *Geojournal of Tourism and Geosites*, (33), 1969-1979. https://doi.org/10.30892/gtg.61354-1564

Drummond, R. & Cronje, J. (2019). Building a White Elephant? The Case of the Cape Town Stadium. *International Journal of Sport Policy and Politics*, *11*(1), 57-78. https://doi.org/10.1080/19406940.2018.1508053

Freeman, R.E. (1984). *Strategic Management: A Stakeholder Approach*. Boston: Pitman Publishing Inc.

Freeman, R.E. (2011). Some Thoughts on the Development of Stakeholder Theory. In *Stakeholder Theory Impact and Prospects*:212-234. Edited by Phillips, R.A. Cheltenham: Elgar.

Freschi, F. (2011). Dancing in Chains: The Imaginary of Global South Africanism in World Cup Stadium Architecture. *African Arts*, *44*(2), 42-55.

Gao, Y. (2025). The Impact of Winter Sports Events on the Local Snow and Ice Tourism Economy Opportunities and Challenges for Regional Economic Development. In *2025 5th International Conference on Enterprise Management and Economic Development (ICEMED 2025)* (pp. 1081-1088). Atlantis Press.

Gursoy, D. & Kendall, K.W. (2006). Hosting Mega Events: Modelling Locals' Support. *Annals of Tourism Research*, *33*(3), 603-623. https://doi.org/10.1016/j.annals.2006.01.005

Hall, C.M. (2012). Sustainable Mega-Events: Beyond the Myth of Balanced Approaches to Mega-Event Sustainability. *Event Management*, 16, 119-131. http://dx.doi.org/10.3727/152599512X13343565268294

Hardy, A.L. & Beeton, R.J.S. (2001). Sustainable Tourism or Maintainable Tourism: Managing Resources for the Average Outcomes. *Journal of Sustainable Tourism*, 9(3), 168-192. https://doi.org/10.1080/09669580108667397

Harrison, J.S. & Wicks, A.C. (2013). Stakeholder Theory, Value, and Firm Performance. *Business Ethics Quarterly*, *23*(1), 97-125. https://doi.org/10.5840/beq20132314

Hemmonsbey, J. & Knott, B. (2023). Sport Event Tourism Organizations and Resilience Theory: A Systematic Literature Review. *Event Management*, *27*(4), 537-557. https://doi.org/10.3727/152599522X16419948695116

Hinch, T. & Higham, J. 2011. *Sport Tourism Development. Aspects of Tourism*. Clevedon: Channel View.

Kassens-Noor, E., Wilson, M., Müller, S., Maharaj, B. & Huntoon, L. (2015). Towards a Mega-Event Legacy Framework. *Leisure Studies*, *34*(6), 665-671. https://doi.org/10.1080/02614367.2015.1035316

Knott, B., & Tinaz, C. (2022). The Legacy of Sport Events for Emerging Nations. *Frontiers in Sports and Active Living*, *4*, 926334. https://doi.org/10.3389/fspor.2022.926334

Koenigstorfer, J., Bocarro, J. N., Byers, T., Edwards, M. B., Jones, G. J. & Preuss, H. (2019). Mapping Research on Legacy of Mega Sporting Events: Structural Changes, Consequences, and Stakeholder Evaluations in Empirical Studies. *Leisure Studies*, *38*(6), 729–745. https://doi.org/10.1080/02614367.2019.1662830

Li, S. & McCabe, S. (2013). Measuring the Socio-Economic Legacies of Mega-Events: Concepts, Propositions and Indicators. *International Journal of Tourism Research*, *15*(4), 388-402. https://doi.org.10.1002/jtr.1885

Lohmann, P., Swart, K., Virkki, K., Cohen, M. & Feller, R. (2025). FIFA World Cup Qatar 2022: Perceptions and Experiences Through the Lens of Tourists, Residents, and Overseas Spectators. *Event Management*. https://doi.org/10.3727/152599525X17551312270841

Moradi, E. & Norouzi Seyed Hossini, R. (2025). Sport Tourism and Destination Attractiveness: Bridging Gaps in Research for Emerging Economies. *Tourism Recreation Research*, 1–30. https://doi.org/10.1080/02508281.2025.2472315

Mosime, K. M. (2016). *The Post-Event Function of World Cup Stadia as Contribution to the 2010 Fifa World Cup Legacy.* PhD thesis. University of Pretoria, Pretoria.

Phillips, R.A., Freeman, R.E. & Wicks, A. (2003). What Stakeholder Theory is Not. *Business Ethics Quarterly*, *13*(4), 479-502. https://doi.org/10.5840/beq200313434

Preuss, H. (2007). The Conceptualisation and Measurement of Mega Sport Event Legacies. *Journal of Sport & Tourism*, *12*(3-4), 207-228. https://doi.org/10.1080/14775080701736957

Preuss, H. (2015). A Framework for Identifying the Legacies of a Mega Sport Event. *Leisure Studies*, *34*(6), 643-664. https://doi.org/10.1080/02614367.2014.994552

Preuss, H. (2018). Event Legacy Framework and Measurement. *International Journal of Sport Policy and Politics*, *11*(1), 103–118. https://doi.org/10.1080/19406940.2018.1490336

Proos, E. (2025). Sports Tourism: Breaking the Tackle at Rugby Stadiums. *African Journal of Hospitality, Tourism and Leisure*, *14*(2):250-258. https://doi.org/10.46222/ajhtl.19770720.605

Reis, R., Telles, S. & Teixeira, M. C. (2023). Measuring the Legacies of Sports Mega Events: A Systematic Review. *Journal of Physical Education and Sport*, 23(4), 996 –1009. https://doi.org.10.7752/jpes.2023.04125

Stewart, A., & Rayner, S. (2016). Planning Mega-Event Legacies: Uncomfortable Knowledge for Host Cities. *Planning Perspectives*, *31*(2), 157–179. https://doi.org/10.1080/02665433.2015.1043933

Street, L., Frawley, S. & Cobourn, S. (2014). World Cup Stadium Development and Sustainability. In *Managing the Football World Cup* (pp. 104-132). London: Palgrave Macmillan UK.

Swart, K. & Bob, U. (2012). Mega Sport Event Legacies and the 2010 FIFA World Cup. *African Journal for Physical Health Education, Recreation and Dance*, *18*(sup-2), 1-11.

Tomlinson, R., Bass, O. & Bassett, T. (2011). Before and After the Vuvuzela: Identity, Image and Mega-Events in South Africa, China and Brazil. *South African Geographical Journal*, *93*(1), 38-48. https://doi.org/10.1080/03736245.2011.570005

Townes, J.I., Fobosi-Klaas, A. & Mfazi, S. (2025). Recovery and Resilience Within The South African Niche Tourism Sector. *African Journal of Hospitality, Tourism and Leisure*, *14*(2), 274-281. https://doi.org/10.46222/ajhtl.19770720.607

Wheatley, M. C. (2024). The Impact of Mega-Events on Urban Development: A Review. *Premier Journal of Social Science*, *1*. https://doi.org/10.70389/PJSS.100001