



# The Galle Fort World Heritage Site: A Nature-Culture Approach to the Conservation of Cultural Heritage along the Southern Coast of Sri Lanka

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## ■ Abstract

*This paper focuses on the Galle Fort World Heritage site, assessing current practices and issues related to heritage conservation concerning disasters. The purpose is to highlight the importance of understanding nature-culture links for the conservation of coastal heritage sites, exposed to natural conditions, such as sea breeze, sea erosion, and hazards like tsunamis. The Galle Fort is strongly connected to its larger cultural landscape, for which the conservation of the entire ecosystem is required. This paper suggests the development and implementation of integrated and people-centered policies involving all stakeholders in conservation plans, giving due consideration to nature-culture linkages.*

**KEY WORDS:** Sri Lanka, Galle fort, Coastal cultural heritage, Nature-culture links, People-centered conservation

## ■ 1. Introduction

### *1.1 Overview of the heritage site*

The distinction between nature and culture as separate entities, and rigid categorizations based on arbitrary divisions, as seen in various charters and conventions on heritage (see Askew 2010: 19-44; UNESCO 1972), are now being challenged and the traditional definitions and scope of heritage are also being reconsidered (see e.g., Harrison 2015: 24-42; 2013). The symbiotic relationship that exists between nature, culture, and people is increasingly emphasized and reinforced. Similarly, heritage sites, cultural or natural, are no longer considered as isolated entities, but they are identified as being interconnected to and interdependent on people, landscapes, and the accompanying ecosystems (Larsen and Wjesuriya 2017: 42; Leitão 2017: 195-

210; Lilley 2013).

These discussions are highly relevant to the Galle Fort World Heritage site, as well as the heritage in the Southern Coastal Belt of Sri Lanka (hereafter referred to as the Southern Coastal Belt). The unique cultural landscape of this region is partly a result of the area having been under the control of the Portuguese, the Dutch, and the English, from 1505 to 1948. The Old Town of Galle and its fortifications (Galle Fort) have been a UNESCO World Heritage Site since 1988. It was built and maintained by all three colonial powers, and is multicultural in its character, termed as 'heritage of dual parentage,' like many other heritage sites along the Southern Coastal Belt (Da Silva 1992).

In this context, the present study focuses on the Galle Fort World Heritage site to assess

current practices and issues related to heritage conservation in relation to disasters. The Galle Fort is constantly exposed to the sea breeze, sea erosion, and natural hazards, such as tsunamis, in addition to human-induced hazards. However, its architectural and planning characteristics, as well as coral and boulder/granite reefs, protect the site from disasters, as is shown by the reduced impact of the 2004 Indian Ocean Tsunami. The Galle Fort is, therefore, an example to be further analysed of how cultural heritage relates to the natural environment in the context of disaster risk management. This study is based on the author’s long-term observations made at the Galle Fort, as a member of the Management Board of the Galle Fort Heritage Foundation, a survey undertaken after the 2004 Tsunami (cf. Poisson et al. 2009), and interviews conducted between July and August 2018 with various stakeholders of the Galle Fort<sup>1</sup>.

1.2 Brief description of the landscape

The Galle Fort is part and parcel of a larger ecological setting and its values and meanings are derived from the greater cultural landscape of the Southern Coastal Belt. Consequently, neither nature nor people can be separated from the fort, which is located in the District of Galle, adjacent to the

historic city by the same name [Fig. 1]. The Southern Coastal Belt has a rich biodiversity, including lagoons with numerous maritime species, mangroves, and forest covers with specific maritime vegetation (Jayatissa 2009; Dahdouh-Guebas 2005) which are used daily by people. The cultural evolution in the region is a result of human interaction with this environment. The Galle Fort is a great manifestation of this interaction over the centuries. The unique coastal environment provided distinct living conditions for its dwellers which brought together diverse belief systems, along with the historical conditions cited above, that led to the development of this distinct cultural landscape. Therefore, the author considers that the nature-culture linkages existing in the Galle Fort, as well as the traditional livelihood of the communities who have demonstrated resilience to threats and used opportunities provided over the years, need to be safeguarded. This paper highlights the potential of the Galle Fort to be a model of nature-culture linkages and resilience to disasters in the Southern Coastal Belt, provided that an integrated management approach is developed.

2. Significance of Galle Fort

Located in a distinct natural setting, the Galle

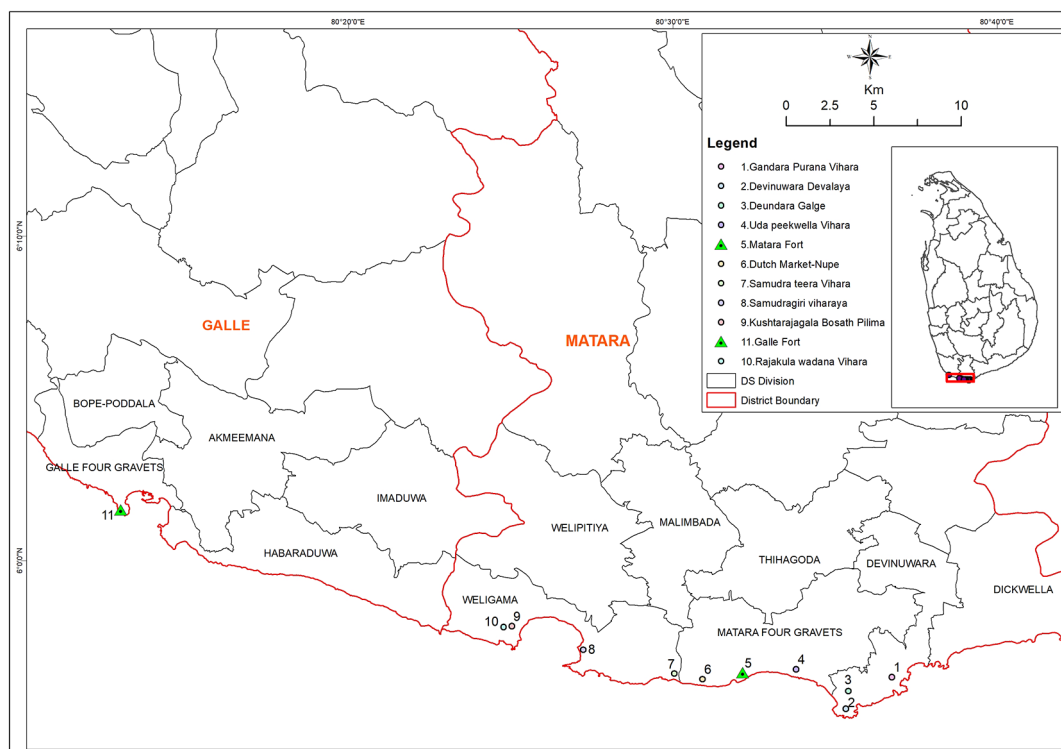


Figure 1: Map showing Galle and Matara Fortresses and other main heritage sites in the region. (Source: Author)

<sup>1</sup> The author consulted and interviewed a number of stakeholders involved in the cultural heritage conservation in Sri Lanka as well as an expert involved in heritage conservation and training at international level.

Fort has important values and meanings to its users (Ministry of Culture and Arts Government of Socialist Republic of Sri Lanka 2015:13-14). The Galle Fort represents the European expansion in Asia and thus it can be used to read the history of the colonial occupation of Sri Lanka. It was declared a UNESCO World Heritage Site due to its unique historic and architectural value (Da Silva 1992). It was first built by the Portuguese in 1588 and was modified and used by the Dutch starting in 1649 until it was captured by the English in 1796 (Kuruppu and Wijesuriya 1992). This fort encloses an area of 52 hectares and houses a large number of buildings, such as courts, churches, temples, mosques, and warehouses. The fortification contains 14 bastions, a gateway, and a clock tower. Some of these architectural works are great examples of the blend of European and Asian designs and concepts (Bandaranayake 1992) [Fig. 2]. This fort is also a living heritage site, which is inhabited by over 1,686 people<sup>2</sup>, and for those living there, heritage is a daily experience.

The social formation in this area is a result of the cross-fertilization of various ethnic and religious traditions over centuries: the fortress has places of worship for Buddhists, Christians, and Muhammadans, and is home for various ethnic groups, such as Sinhalese, Muslims, Tamils,

Burghers, and Malays. All of these communities have lived in harmony and practiced their faiths for centuries, leading to the development of multiculturalism within the region. The Galle Fort has remained a living monument throughout its history.

This fort has many attributes that need to be preserved. For instance, fortifications, grid streets, street houses with frontal veranda and backyards, public and private buildings, and an underground sewer system all still display originality in their form and design (Ministry of Culture and Arts Government of Socialist Republic of Sri Lanka 2015: 14, 16). The sewer system functions as a drainage system even today and some of the tsunami floods reached the Fort through it in 2004. The architectural design of the Galle Fort owes much to its local geomorphology. The ramparts of the fort, for example, follow local topography, while the bastions are located at the most strategic points in sea and land fronts (Ministry of Culture and Arts Government of Socialist Republic of Sri Lanka 2015: 73), protecting it from natural hazards.

In addition, the Galle Fort is located adjacent to the Rumassala hillock which gives an astounding scenic beauty to the setting of the Fort. The biodiversity observed in Rumassala, the coastal vegetation, and the sea around the fort,



Figure 2: Galle Fort UNESCO World Heritage Site; Front view (Photo credit: Amila Bandaranayake)

<sup>2</sup> Number as at 31.12.2018, Performance report Galle Heritage Foundation 2015.

as well as the uninterrupted oceanic view from the fort, make this heritage site inseparable from nature [Figs. 3 & 4]. Moreover, Rumassala is also associated with Ramayana myths (Ravi Prakash 1998). The Buona-vista Coral Reef, which was once identified as having the greatest marine biodiversity among all coral reefs in Sri Lanka, was located at the base of the Rumassala hill. This reef, along with the Cloisenburg Reef, is destroyed now, largely due to human intervention, including port expansion. The Galle Fort Reef, located close to the Galle Fort wall, is the only living coral reef around the fort today (see Karunaratne and Weerakkody 1996). These reefs are part of the Galle Fort heritage and need to be included in its conservation planning. Coral reefs along the Southern Coastal Belt are a major attraction for marine eco-tourism. The Coral reefs in Sri Lanka as a whole are, however, endangered due to mining and the deterioration of water quality, and therefore, need a proper conservation and management plan.



*Figures 3 & 4: Galle Fort, View from the sea and Rumassala (Photo credit: Rasika Mutukumarana)*

The fort is also intimately connected with the everyday life of the fishing community, who still practice sustainable traditional fishing techniques, which are currently great tourist attractions. Ritipanna, or stilt fishing (fishing while sitting on a narrow pole tied to a stick installed in the seabed), is one such technique uniquely found along the Southern Coastal Belt [Fig. 5]. This tradition, however, is endangered due to the overexploitation of marine resources and becoming less economical.



*Figure 5: Stilt fishing/Ritipanna (Photo credit: M.A.U. Rukshan)*

However, due to population pressures and the increasing demand for luxury living, the heritage sites are being modified. Many traditional houses and public buildings have been modified into guest houses and even as luxury hotels, and in some cases, this is causing considerable damage to the heritage. Moreover, the site is permanently exposed to the sea breeze and sea erosion, in addition to having been hit by the 2004 Tsunami. Coastal heritage, thus, is vulnerable to decay and destruction from natural and human activities and needs the constant attention of heritage managers [Fig. 6].



*Figure 6: Effect of sea erosion at Galle Fort (Photo credit: Amila Bandaranayake)*

### 3. Current management arrangements

There are a number of institutions and policy frameworks in place in Sri Lanka to deal with the conservation of natural and cultural heritage. Legislation concerning both cultural and natural heritage has been in place in Sri Lanka since the 1940s. The National Archaeology Policy (2006) and the Antiquities Act No. 09 of 1940, and its subsequent amendments (Act No 24 of 1998) are the main legal and policy framework made available for the protection of cultural heritage. Until the 1980s, the main state institution that dealt with cultural heritage, except the Department of National Museums, was the Department of Archaeology. The 1980s were a turning point in heritage research and conservation, with the expansion of institutional arrangements and the establishment of the Central

Cultural Fund and the Postgraduate Institute of Archaeology. At that moment, the conceptualization of heritage took a broader perspective, new policy frameworks were introduced, and international agreements, such as the 1972 UNESCO World Heritage Convention, were ratified.

Currently, the Department of Archaeology and the Central Cultural Fund are the main bodies that undertake cultural heritage conservation. Legislation, such as the Heritage Foundation Acts, established to deal with specific sites, are also in place. The Galle Heritage Foundation, established under the Galle Heritage Foundation Act No. 7 of 1994, manages the Galle Fort. This Foundation is represented by 14 different institutions, including the Department of Archaeology and the Central Cultural Fund<sup>3</sup>. In addition, there is also a Civilians' Collective (forum of residents) at the Galle Fort. Although these institutions consult each other in carrying out their respective duties, there is a lack of coherent and integrated policies at national-level planning and understanding between various stakeholders and residents in the heritage site.

The Ministry of Tourism Development, Wildlife and Christian Religious Affairs, through its departments, such as Wildlife Conservation, deals with natural heritage, including the Rumassala Forest Reserve. The Coastal Conservation Department is responsible for marine life around the Galle Bay and the coast. However, concerns have been raised about the proposed Galle Harbour Expansion Project (2007), and the management of the Rumassala Forest Reserve (Goreau 1998).

In relation to the integration of disaster risk management in cultural heritage conservation, Sri Lanka is yet to integrate international instruments, such as the Sendai Framework for Disaster Risk Reduction (2015) and the Strategy for Risk Reduction at World Heritage Properties (2007). At the local level, there are a number of state-level arrangements to deal with disasters. While the Ministry of Mahaweli Development and Environment is the main ministry that deals with environmental conservation, climate change, and biodiversity, the Ministry of Disaster Management deals with disasters specifically.

However, there are gaps and issues in these arrangements. Lack of understanding about the nature-culture link among the agencies that

deals with these aspects are a major issue. At the Galle Fort, where nature, culture, and people are inseparably linked, this rigid institutional division creates conflicts of interest, both in the planning and implementation of policies. Even among the Coastal Conservation Department, the Department of Wildlife Conservation, and the Ministry of Fisheries, which deals with natural heritage - marine life, coral reefs, mangroves, and landforms, conflicts of interests arising from overlapping territorial and subject areas are noted. This leads to issues in managing the ecosystem around the Galle Fort. Similar situations occur in managing of the cultural heritage at the Galle Fort, where several agencies, such as the Department of Archaeology, Central Cultural Fund, and the Galle Fort Heritage Foundation, are involved. The main focus of the Galle Fort management has been on its tangible heritage. This leads to the negligence of intangible heritage, such as the traditional livelihoods and belief systems of the communities, as well as the natural environment, of which the fort and the built heritage is only a part. This leads to inefficient disaster responses and recovery, such as to threats like tsunamis.

#### ■ 4. Current State of Conservation and Challenges for Continuity

The author examined the entire area affected by the 2004 Tsunami, between the Nilwala river in Matara to the Walawe river in Ambalantota in Southern Sri Lanka (Bohingamuwa 2004, see also Bohingamuwa 2009). This study was undertaken as part of the conditional survey initiated by ICOMOS Sri Lanka, in collaboration with the Ministry of Higher Education. The author also examined the Galle Fort as part of a social, economic, and cultural survey project initiated by the Galle Heritage Foundation. The objective of this survey was to assess the state of the conservation of the property, including the impact of the tsunami, and to recommend necessary conservation methods. The entire Galle Fort was surveyed and the residents were interviewed using a questionnaire prepared by the author (Bohingamuwa 2006). In 2018, the author conducted a new survey and interviews to reassess the heritage management of the Galle Fort.

It was found that during the 2004 Tsunami, much of the damage to human life and heritage was due to the weaknesses of disaster preparedness and risk reduction mechanisms. The coastal

<sup>3</sup> Other key institutions involved are, Galle Municipal Council, Urban Development Authority, Coast Conservation Department and Ports Authority.

communities neither had any prior knowledge or experience of such disasters nor had they been part of any Disaster Risk Reduction programmes. This resulted in causing complete shock and panic among them during the disaster. However, they overcame material and emotional losses within a short period and either resumed their traditional livelihoods or adopted new strategies. The coastal ecosystem that was devastated by the tsunami recovered even faster, illustrating greater resilience and adaptability.

The 2004 Tsunami tested the state's preparedness and capacity, including the strength and efficiency of heritage agencies that deal with such disasters. In their sincere efforts to recover, reconstruct, and restore affected properties and human life, both the government and non-government actors and agencies, as well as individuals, acted to their fullest capacity. However, the author's active involvement in the post-tsunami Archaeological Impact Assessments and heritage conservation activities allowed him to perceive the lack of coordination between these actors, which caused considerable damage to cultural properties. For instance, the Municipal Council, the Urban Development Authority, and the other state agencies that deal with everyday needs of the people, acted fast to restore the affected infrastructures before heritage agencies could put in place conservation plans. Even the findings of the ICOMOS Sri Lanka post-tsunami study on the affected sites did not lead to making any comprehensive and concrete conservation programmes.

The Galle Fort itself only received limited impact from this tsunami, primarily due to its strong high wall and the coral and boulder reefs around it [Figs.7 & 8]. The selection of the location and architectural planning of the fort, with minimal intervention to the natural coastal environment, saved both properties and lives within the fort. Tsunami water entered the fort mainly through the entrances situated on the land side. No loss of life was reported from the fort and only some cultural properties were affected. In contrast, the adjacent historic city and the surrounding area were devastated by the tsunami waves that came from either side of the Fort.

The natural landscape on these sides of the fort have been modified for augmenting the Galle Sea Port and a waterway. Approximately 70 % of the buildings located on the coastline were destroyed and at least 30 % of those up to 1km inland suffered



*Figures 7 & 8: Galle Fort, Granite boulders that protect Fort from sea waves (Photo credit: Rasika Mutukumarana)*

considerable damage in Galle. In the city of Galle, 497 people perished while another 412 people went missing due to the tsunami (cf. Department of Census and Statistics 2005). The Southern Coastal Belt was the worst affected area. The case of the Galle Fort, therefore, is an exception in the Southern Coast area, illustrating that much can be learned from the past- wise use of local conditions- and from heritage for increasing resilience and developing Disaster Risk Reduction programmes for the rest of the region. Conservation of the natural coastal environment - mangroves, coastal sand dunes, and coral reefs - are vital for the conservation of the Galle Fort and coastal heritage as a whole. Jayatissa (2009) and Dahdouh-Guebas (2005) discussed how mangroves acted as natural barriers against the 2004 Tsunami, protecting both cultural heritage and humans living in vulnerable areas. Understanding traditional knowledge and passing that on to future generations would help protect nature, culture, and human lives along the coast.

Nevertheless, the Galle Fort and the coastal heritage, in general, is vulnerable to decay and destruction due to exposure to sea breeze and erosion. The growth of algae and fungi on Buddhist temple paintings, peeling of wall plasters, corrosion of metal objects, and the decaying of roofs, which results in leaking rainwater and cracked walls, are the main state of conservation issues noted in the Galle Fort and other sites in the Southern Coastal Belt. Moreover, movable cultural properties, such

as the Ola Leaf Manuscripts<sup>4</sup>, require constant monitoring.

Illegal construction and modifications made to heritage buildings are reported from the Galle Fort World Heritage Site, threatening its integrity. The encroachment of the buffer zone of the Galle Fort prompted the UNESCO World Heritage Committee to request that Sri Lanka prepare a comprehensive Integrated Management Plan for the Galle Fort in 2010 (The WHC decision 34COM7B.72). This plan was approved by the UNESCO World Heritage Committee in 2016 (Ministry of Culture and Arts Government of Socialist Republic of Sri Lanka 2015). In keeping with these requirements, the Antiquity Ordinance, as well as the Galle Heritage Foundation Act, are being amended (Mandawala 2015: 6 and Pers. comm. 2018).

## ■ 5. Lessons learned and Recommendations

The challenge to all heritage stakeholders is to protect both properties and human lives from both natural and human-provoked hazards. The exploitation of natural resources and developmental activities have caused considerable damage to the ecosystem and landscape along the Southern Coastal Belt and around the Galle Fort, exposing communities, as well as cultural and natural heritage, to natural hazards, endangering people's livelihoods. The impact of the 2004 Tsunami exemplifies the power of nature, as well as the resilience of both coastal communities and the natural environment in their ability to overcome such disasters. However, the impacts on cultural heritage need to be dealt with by heritage managers, whose role was largely overlooked in this disaster. The 2004 Tsunami showed the limitations of the disaster risk preparedness and disaster recovery system of Sri Lanka.

Yet, the Galle Fort showed to be an exception, resistant even to threats from the tsunami. The resilience of properties and coastal communities in other areas could be increased by protecting the coastal landscape and mangroves which act as buffers against the threats of nature. Understanding and respecting the nature-culture and people linkages and educating and involving communities in heritage management and disaster response programmes are the way forward for the

management of heritage at the Galle Fort and along the Southern Coast Belt. An active role of heritage managers is vital in such efforts.

A number of positive initiatives have been undertaken in the recent past and some more efforts are being made to safeguard the heritage, like the preparation of an Integrated Management Plan for the Galle Fort. However, a number of issues, such as deeper understanding about the nature-culture linkages and a people-centered approach to heritage conservation, remain largely unaddressed. This highlights the need for fresh thinking and integrated planning at a national level to bring all stakeholders together for the effective functioning of heritage management. Key to achieving any success in these efforts depends on training an adequate number of heritage managers and involving local communities in heritage protection.

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<sup>4</sup> Ola leaf is a palm leaf prepared for writing in ancient Sri Lanka. Ola leaf manuscripts written on various subjects such as Buddhism, traditional medicine and horoscopes, are found in the island.

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