Building Resilience by Reducing Disaster Risks to Cultural Heritage

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The Scope of Cultural Heritage

Cultural heritage is often associated with grandiose monuments and iconic archaeological sites that can hold us in awe of their beauty, history and sheer scale. However, the understanding of cultural heritage has undergone a marked shift during the last few decades in terms of what it is, why it is important, why it is at risk and what can be done to protect it. Cultural heritage today encompasses broad array of places such as historic cities, living cultural landscapes, gardens or sacred forests, technological or industrial achievements in the recent past and even sites associated with painful memories and war. Collections of movable and immovable items within sites, museums, historic properties and archives have also increased significantly in scope, testifying not only to the lifestyles of royalty and the achievements of great artists, but also to the everyday lives of ordinary people. At the same time intangibles such as knowledge, beliefs and value systems are fundamental aspects of heritage that have a powerful influence on people’s daily choices and behaviors. Today as in the past, cultural heritage continues to perform its irreplaceable role as a source of meaning and identify for communities and individuals.

Risks to Cultural Heritage from Disasters:

Each year disasters caused by natural and human-induced hazards result in the destruction of countless historical properties, museums and archives that hold the history of humanity within their walls. Cultural landscapes and natural heritage are being destroyed, and with them valued ecosystem services. These risks may be extensive, spanning entire countries or regions, or they may be more localised, such as those posed by fires, floods or landslides where they regularly affect particular heritage sites. Often, disasters also affect traditional knowledge, practices, skills and crafts that ensure cultural continuity, as well as the means for its maintenance and conservation. Recent earthquake in Philippines in 2013 damaged historic Bohol churches, while Thailand floods in 2011 have had dramatic impact on the World Heritage Site of Ayutthaya. Also devastating fires in the World Heritage City of Lijang in China in 2013 and 2014 have damaged significant historic urban fabric.

Contribution of Heritage to Resilience:

Experience has shown that degradation of natural resources, neglected rural areas, urban sprawl and poorly engineered new construction increase the vulnerability of communities to disaster risks. On the other hand, a well-conserved natural and historic environment, based on traditional knowledge and skills, considerably reduces underlying vulnerability factors, strengthens the resilience of communities and saves lives. Traditional knowledge systems embedded in cultural heritage evolved over time through series of trials and errors can play a significant role in disaster prevention and mitigation, thereby contributing to a more sustainable development. Such local knowledge often equips communities to better face natural hazards through lifestyles, customs and traditional livelihoods. For instance, certain coastal communities over the centuries have not only become capable of foreseeing natural hazards, but are also better equipped to deal with them through measures such as building on stilts and constructing wind-resistant structures. In fact, when
traditional skills and practices are kept alive and dynamic, they can contribute to the rebuilding of resilient communities after disasters. Local masons and crafts people can rebuild shelters using local knowledge and resources, salvage and re-use materials from collapsed structures, help the community to reduce its dependency on external support and provide livelihood sources crucial for sustainable recovery. In this sense, cultural heritage optimizes locally available resources and the socio-cultural needs of communities. They symbolism inherent in heritage is also a powerful means to help victims recover from the psychological impact of disasters. Traditional social networks that provide mutual support and access to collective assets are extremely effective coping mechanisms for community members. Therefore it is important to draw on traditional knowledge in building construction, warning systems as well social mechanisms while developing appropriate mitigation measures for cultural heritage.

**On-going initiatives:**

Risk Information is fundamental to efforts to reduce the vulnerability of heritage to disasters. The use of multi-hazard risk assessments, forward-looking climate change projections and estimations of potential economic losses are all used to help disaster managers and heritage professionals design mitigation measures, set priorities and make the economic case for investing in resilient heritage. A wide range of quantitative and qualitative tools for risk assessment of movable and immovable cultural heritage are available. Impact assessments that examine the broader economic costs associated with disaster related damage to heritage are also important instruments for guiding and prioritizing efforts to reduce risk to heritage.

Heritage sites are, in some cases protected by broad risk reduction and urban planning initiatives undertaken by national and local governments such as the comprehensive general plan of intervention to protect the city of Venice from floods. Other heritage assets are protected by risk reduction measures that have been tailored to their special characteristics and values. Investments may also be made in developing new technology for protecting cultural heritage from disasters or mitigating their impacts. For example, in Turkey various non-structural interventions have been carried out to mitigate the impact of earthquake on museum collections. Moreover cultural heritage and those responsible for managing it can also benefit from appropriate insurance measures.

**Way Forward:**

Although several initiatives for reducing disaster risks to cultural heritage are already under way, much more needs to be done. With a more concerted effort, the growing commitment for protecting heritage and leveraging the power of heritage for building resilience displayed by local and national governments and the local communities can be harnessed. These would necessitate fostering partnerships that protect and draw on heritage for disaster risk reduction at local level, consolidating available guidance and data on heritage vulnerability and risks, promoting research, building capacities and most importantly aligning heritage needs in disaster risk reduction policies and plans at national and local levels and vice-versa. As stakeholders around the world are considering elements for a post-2015 framework for disaster risk reduction, the opportunity to bring more depth and scope to promoting resilience through heritage should not be missed. Heritage is a cross-sectoral area that has strong links with various development sectors such as shelter, livelihoods, health, education, infrastructure and environment. These links should be reinforced in the global post-2015 agenda for sustainable development.