

## Natural Capital Stewardship: A Basis for Travel & Tourism Competitiveness

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The rapid growth in international travel projected in the near future has significant implications for the world's natural heritage. This heritage, which includes national parks and monuments, game reserves, wild rivers, mountains and landscapes, has become a major attraction for travelers who wish to view, experience, and engage in nature. More than 100,000 protected areas exist today, covering about 12 percent of the globe's terrestrial surface. Another 4,600 marine protected areas have also been designated, protecting 0.6 percent of the oceans.<sup>1</sup> The doubling of international arrivals between 2005 and 2020 (projected by the World Tourism Organization) means that natural heritage will be put under even greater pressure, but also means that the opportunities to use tourism to fund stewardship of this natural capital also increase dramatically. Natural heritage often forms the foundation for a nation's Travel & Tourism (T&T) industry, particularly in poor developing countries, which tend to have a rich natural heritage.

The rising prominence of natural heritage, along with cultural heritage, as a stimulus for travel is exemplified by the growing number of visitors to World Heritage sites—the 851 places internationally recognized under the World Heritage Convention for incorporating outstanding cultural and natural values that transcend national boundaries. Sites such as the Galapagos Islands in Ecuador, Serengeti National Park in Tanzania, the Great Barrier Reef in Australia, and Sian Ka'an in Mexico have experienced dramatic and sustained growth in visitor numbers over the last decade. The rising popularity of natural heritage has become so significant that it contributes to a nation's competitive advantage as a tourism destination.

The accelerating growth in visitation of course creates certain tensions and raises a number of questions relating to protection and stewardship of our remaining natural heritage. The issues can be environmental, political, or social.

### Indicators of natural heritage sustainability

Within the Travel & Tourism Competitiveness Index described in Chapter 1.1, additional indicators of the level of commitment to the conservation of natural heritage have been introduced this year. These indicators, included in environmental sustainability and natural resources pillars, reflect a country's natural capital and its commitment to conserving it. The IUCN has contributed to the definition of four of these indicators and supports their application by sharing its datasets:

1. total known species (mammals, birds, and frogs) included on the IUCN Red List of Threatened Species;

2. endangered species (as a percentage of total known species: frogs, mammals, and birds) on the IUCN Red List;
3. index of ratified environmental treaties (total number of treaties ratified by each country based on a sample of 25 most relevant treaties); and
4. nationally protected areas (as a percentage of total land area).

The data show substantial variation from country to country in indicator scores. The number of known animal species varies significantly, suggesting that some nations are more endowed in this area than others, and therefore have a natural competitive advantage. The relevant question is how well a country protects that heritage. Countries also vary greatly in their stewardship—in some places, the proportion of species listed as endangered is more than 20 percent, suggesting that significantly more conservation action is needed to safeguard them.

At the same time, some countries have done very well in establishing protected areas, another cornerstone of efforts to conserve their natural wealth. Protected areas include national parks, national scenic areas, game reserves, protected landscapes, forest reserves, and so on (see Box 1). Although the fundamental purposes for which these areas were established differs in many cases, most areas are aimed at conserving landscapes and the biodiversity and natural processes contained within them. They often serve as the foundation of a nation's tourism industry; examples are Kruger National Park in South Africa, the Great Barrier Reef of Australia, or the Amazon Basin of Brazil.

In an era of globalized Travel & Tourism, ratification of environmental treaties and conventions such as the Convention on Biological Diversity, the Ramsar Convention on Wetlands of International Importance, the World Heritage Convention, and the Convention on International Trade in Endangered Species is a key indicator of a nation's willingness to join international efforts to protect the environment. Participation in such agreements is a sign that a nation not only shares

### Box 1: IUCN Protected Area Management Categories

- **Category Ia: Strict nature reserve/wilderness protection area managed mainly for science or wilderness protection**—an area of land and/or sea possessing some outstanding or representative ecosystems, geological or physiological features and/or species, available primarily for scientific research and/or environmental monitoring.
- **Category Ib: Wilderness area: protected area managed mainly for wilderness protection**—large area of unmodified or slightly modified land and/or sea, retaining its natural characteristics and influence, without permanent or significant habitation, which is protected and managed to preserve its natural condition.
- **Category II: National park: protected area managed mainly for ecosystem protection and recreation**—natural area of land and/or sea designated to (a) protect the ecological integrity of one or more ecosystems for present and future generations, (b) exclude exploitation or occupation inimical to the purposes of designation of the area and (c) provide a foundation for spiritual, scientific, educational, recreational and visitor opportunities, all of which must be environmentally and culturally compatible.
- **Category III: Natural monument: protected area managed mainly for conservation of specific natural features**—area containing specific natural or natural/cultural feature(s) of outstanding or unique value because of their inherent rarity, representativeness or aesthetic qualities or cultural significance.
- **Category IV: Habitat/Species Management Area: protected area managed mainly for conservation through management intervention**—area of land and/or sea subject to active intervention for management purposes so as to ensure the maintenance of habitats to meet the requirements of specific species.
- **Category V: Protected Landscape/Seascape: protected area managed mainly for landscape/seascape conservation or recreation**—area of land, with coast or sea as appropriate, where the interaction of people and nature over time has produced an area of distinct character with significant aesthetic, ecological and/or cultural value, and often with high biological diversity. Safeguarding the integrity of this traditional interaction is vital to the protection, maintenance and evolution of such an area.
- **Category VI: Managed Resource Protected Area: protected area managed mainly for the sustainable use of natural resources**—area containing predominantly unmodified natural systems, managed to ensure long-term protection and maintenance of biological diversity, while also providing a sustainable flow of natural products and services to meet community needs.

Source: IUCN, 1994.

concern about biodiversity issues but is also willing to commit resources for conservation.

In summary, the data show that some nations do better on all four indicators than others, suggesting that they will be much more competitive for Travel & Tourism. These countries contain the resources, environments, and heritage people look for in a holiday destination and have taken some key steps to conserve entire ecosystems and species in an effort to ensure their visitors have a pleasurable visit.

### **Growing interest in natural heritage fuels T&T growth**

Action to protect natural heritage are both cause and consequence of growing public concerns about the environment. Concerns range from unmanaged development to climate change. How the public perceives the stewardship of natural heritage increasingly influences their decisions about destinations for holidays, mini-breaks, and business conferences. There is a major shift in consumer attitudes, spending, and decisions toward more socially responsible behavior and purchasing choices. The growth in concern about fair trade issues from conditions of local workers to the way produce is grown is also changing people's purchasing decisions and behavior.

A range of recent studies documents not only this growing demand for responsible behavior from suppliers, but also a dramatic rise in consumer sensitivity to environmental and protected area issues. For example, in Central America, which is a primary nature-based tourism destination region, tourism has recorded consistent growth since 1999.<sup>2</sup> Central America's share of US outward-bound travel (the United States is the largest source of visitors to Central America) has grown steadily over that time period as well, from 5.7 percent to 8.7 percent. The International Ecotourism Society (TIES) reports that travelers are more interested in and concerned about the environment and the local communities that interact directly with it. A recent study summarizes research on travelers in three countries as follows:

More than two-thirds of U.S. and Australian travelers, and 90 percent of British tourists, consider active protection of the environment, including support of local communities, to be part of a hotel's responsibility. According to a 2002 survey, these travelers are more likely to patronize hotels with a "responsible environmental attitude."<sup>3</sup>

Public awareness about the effects of travel choices on global carbon emissions is also influencing the T&T sector; consumers have begun to rethink the effects of traveling to distant locations. While air transportation contributes only about 2 percent of global carbon emissions,<sup>4</sup> increased sensitivity to climate change may place "long haul" destinations at a disadvantage. This disadvantage may be outweighed if the nation in question

undertakes conservation and shows a commitment to protecting its natural heritage.

Regardless of growing consumer concern, we are both witnesses to and agents of a continuous and dramatic loss of our natural heritage. The Convention on Biological Diversity has set the goal of a significant reduction in the rate of biodiversity loss by 2010, just two years from now. The main factors driving biodiversity loss are habitat fragmentation and destruction, invasive species (both plant and animal), unacceptable harvest levels, pollution, and climate change—all potential effects of poorly planned tourism development.

Tourism development, if not well managed, has several effects on our natural heritage at varying scales. In some locations, inappropriate, large-scale, and poorly located tourism facilities can lead to habitat loss, thereby destroying the very foundation of nature-based tourism. Developments that are not sensitive to minimizing energy consumption or waste may pollute local habitats, particularly in freshwater and marine settings. Visitors who engage in inappropriate behavior may also have an impact on the environment leading to unacceptable levels of erosion or disturbance of wildlife.

### **Benefits of a healthy, nature-based T&T sector**

A healthy, vibrant, nature-based T&T sector has three distinct benefits that, taken together, further a nation's competitive advantage. First, nature-based tourism has become an engine of economic growth. Visitors to a national park, for example, spend money on accommodation, food, transport, park entrance and user fees, gifts and crafts, and other services. This transfer of wealth helps develop social capacity, strengthens labor skills, and provides opportunities for people living in or adjacent to the protected area. In many cases, visitor spending results in hundreds of new jobs for local communities, ranging from accountants to guides and protected area managers as well as more traditional employment such as catering services and housekeeping.

Such economic growth also provides tax revenues that provide funding for critical services such as education and health care, and generates financial support for management of the natural heritage upon which tourism is based. In some places, revenues from Travel & Tourism provide 50 percent or more of the operating costs of managing a national park or other protected area.

This financial benefit is particularly important for residents of biophysically rich, but economically poor, regions. Natural heritage, as a basis for Travel & Tourism, can become important for the alleviation of poverty and its associated challenges. By providing income-generating opportunities for local residents, incentives are developed for supporting and participating in conservation.

Second, natural heritage areas serve as "learning laboratories" for visitors. Through interpretive programs and learning centers (often employing local residents),

environmental awareness of visitors is increased: tourists can come away from their visit more aware of their natural heritage and the issues facing biodiversity. Well-designed interpretive programs, trained guides, and inspiring books and videos can lead to a better understanding of the relationship between people and their environments. Such awareness and understanding are the foundation not only for support for the particular protected area visited but also for more informed consumer decisions back home.

Third, successful conservation helps ensure the sustainable delivery of ecosystem services necessary for life on Earth. These ecosystem services include provision of clean air and water, climate regulation, and genetic material. Places where the integrity of natural heritage has been maintained—or restored—tend to be more attractive for tourists and for people who want live in a high-quality environment.

In short, a vibrant, nature-based T&T economy leads to many benefits extending well beyond protection of a country's natural heritage.

### Conservation makes good economic sense

Given the significant contribution that natural heritage makes to national economies through nature-based Travel & Tourism, conservation makes sense, both economically and socially. Conservation that underlies nature-based tourism provides the setting in which many knowledge industries such as accounting, education, and medical care choose to locate for reasons of quality of life. And, by preventing degradation of habitats that are later found essential, conservation reduces the cost of managing human impacts on the environment in the longer term.

By protecting natural capital, including the ecological forces that generate that capital, countries ensure their current competitiveness and lay the foundation for more resilient and competitive economies in the future. Actions such as designating conservation areas, building the technical capacity for their management, regulating harvest of wildlife and removal of vegetation, prohibiting pollution, and managing development are all essential to good conservation practice.

The Travel & Tourism Competitive Index in 2007 showed strong correlations between resources (human, cultural, and natural) and the business environment and regulatory framework. This means that nations doing well in one pillar of the Index also tend to do well in other pillars, suggesting that conservation needs to be well integrated with other dimensions of tourism development. Focusing solely on macroeconomic or large-scale regulatory issues is not enough to score highly on the Index.

### Use of best conservation practice tools underlies T&T competitiveness

Travel & Tourism is the classic double-edged sword: it can be both a tremendous source of financial and political support for conservation as well as a threat to natural heritage if not properly managed. Good conservation practice also means attending to the potential negative consequences of Travel & Tourism, particularly with respect to natural heritage. Rapidly increasing visitation, which many sites have experienced recently, testifies to the growing interest in natural heritage but also has an impact on the area, and on the very values that attract visitors in the first place.

The impacts of tourism occur at several scales: the micro scale where the behavior of individual tourists, such as littering or walking on sensitive areas, has an impact on the environment; the site scale where the accumulated impacts of thousands of tourists, including solid and liquid waste, congestion, and air pollution from vehicle use may not be managed appropriately; and at larger scales that concern the location, scale, and character of development.

### Stewardship of protected areas: An important cornerstone of conservation

Impacts at all three scales interact and accumulate, moving a relatively benign area of economic development into one that may have particularly pernicious consequences if not carefully and sensitively managed. Countries can take a number of actions to safeguard their natural heritage. An important one is to designate areas for protection—national and regional parks, reserves, landscapes, and so on.

While designation of protected areas is a cornerstone of conservation, stewardship of those areas is equally necessary and has many dimensions. One is the development of technically proficient managers—professionally trained individuals who have the capacity to manage both natural systems and tourism development. Another is a system of revenue generation that supports a continuing investment in stewardship. Conservation should be a long-term investment, and sustainable financing mechanisms are needed to support that investment. Mechanisms can include entry and user fees for visitors, concession license fees, local taxes on tourist “luxury” items, and endowments built from country entry or exit fees. In general, visitors accept paying user and entrance fees for parks if they know that these will go to support the park, rather than to a country's general treasury. Although there are significant equity and distribution questions associated with user fees, there is no question that with careful consideration they can be a sustainable source of revenue.

Development of public use plans, where all uses of natural heritage in a protected area—such as tourism, education, and science—are identified and administered

in an integrated and cohesive way, is an important aspect of stewardship. Such plans identify key values, unique resources, and ecosystem services and identify actions to protect them while allowing recreation and tourism on a limited basis. Plans developed in collaboration with local communities have been found to be particularly effective in developing social and financial support for implementation.

A fourth component is a set of tools, both regulatory and managerial, that provide the legal and technical foundation for stewardship. Regulatory tools impart the authority and legal basis for managing tourism development and the use of fees. Methods to manage congestion, provide high-quality interpretation, and ensure a pleasurable experience for visitors are essential to develop and sustain a competitive tourism product. Guidelines for sustainable tourism development provide managers with the tools needed for good stewardship.

A fifth component is the development of a cohesive and integrated science program that promotes research on both natural heritage and visitors to it. Understanding how to attract visitors, market an area's values, and manage visitor experience is essential to sound management and to global competitiveness. Knowledge about the ecological consequences of tourism and development helps planners identify places where tourism developments, ranging from trails to lodges, should or should not be built, how pollution should be managed, and, where necessary, infrastructure should be located.

### **Developing an integrated strategy for conservation of all natural heritage**

Although the legal and managerial tools for stewardship of protected areas and biodiversity conservation are key components of an integrated national conservation strategy involving tourism, other aspects also need to be considered.

Conservation can begin with landscape-level planning that identifies key sites and areas that need protection, and creative ways of implementing conservation. Connecting protected areas with corridors, open spaces, sensitively designed transportation, and utility routes can reduce the impacts of infrastructure. For example, designing highways with wildlife crossings (such as tunnels) has been a successful method in mitigating habitat fragmentation, thereby maintaining wildlife populations. National protected areas can be combined with locally administered parks and open spaces to create a mosaic of conserved landscape that sustains wildlife populations and is attractive to visitors. Tourists visiting locally conserved landscapes are also more likely to interact with residents of the local community, enhancing their experience.

Involvement of the private sector in conservation is important because it creates a sense of "ownership" and responsibility in safeguarding the environment and helps

strengthen the link between natural heritage and good tourism business. The private sector can also be engaged by providing opportunities for the creation of private protected areas in which tourism can occur.

Conservancies, in which two or more landowners develop a partnership for conservation, are growing in popularity, particularly in Africa where governments face challenges in meeting conservation objectives. Where such conservancies include attractive landscapes, unique natural features, or charismatic wildlife, there is potential for tourism. In larger such areas, landowners, if legal requirements are met, may be reimbursed for safeguarding the provision of ecosystem services.

It is important to continue to engage local communities in protected area management and planning. Although conservation planning has traditionally been viewed as the domain of experts, recent experience suggests that residents of local communities have much knowledge to contribute, and engaging them in planning decisions leads to more successful conservation. Such engagement again creates a sense of ownership in a protected area, rather than alienation from it, as has happened in many cases. When local residents feel this sense of ownership, they become actively engaged in its stewardship, exert pressure on their peers to obey rules and regulations, and provide a positive community atmosphere for visitors.

Community engagement in stewardship of the area is more likely to ensure a more equitable spread of benefits, not only of nature-based tourism, but also of the ecological services derived from the protected area. This equitable distribution of benefits creates an even greater sense of responsibility and care for the area, as well as a greater understanding of its values. By building the social capacity in the local community, developments—tourism and otherwise—that might threaten natural heritage values can be modified to be more in harmony with them.

A major long-term step is to implement environmental education programs—from school children to adults—as part of a lifelong learning strategy. Environmental education could focus on developing knowledge about ecological processes and the impacts of human activity on nature and could involve on-site nature interpretation. This is likely to lead to a more ecologically literate population, which will then care more about the sustainability of natural heritage and want to visit it, understand it, and protect it. Countries can increase their competitiveness by supporting policies that generate high-quality guiding, interpretation, pre-arrival information, and educational activities. Websites can help provide visitors with realistic expectations about what they might see and experience during a visit, background information to enhance the quality of their visit, and feedback opportunities for protected area managers.

Effective conservation requires a variety of actors in different roles; thus partnerships, particularly with the

private sector, have become increasingly important. Partnerships are an innovative way of implementing conservation. By understanding varying roles and responsibilities, by playing on the unique strengths of each partner, and by working collaboratively toward a commonly defined goal, a great deal can be accomplished. Partnerships help generate enthusiasm for—and a greater sense of ownership in—conservation.

### Conclusion

Travel & Tourism increasingly depend on opportunities to experience high-quality natural environments.

Consumers are becoming ever more sensitive to measures taken by the tourism industry, and by governments, to minimize impacts on those destinations. Attaining a competitive position requires that nations develop strategies that respond to concerns about the protection of natural heritage.

Recognizing that tourism is one of the sectors that directly rely on the quality of the host environment (recreation is one of the ecosystem services underpinned by biodiversity), it is clear that biodiversity conservation should be an essential element of any strategy aimed at raising and strengthening the competitiveness of the tourism industry in any country. Thanks to its potential to provide sustainable alternative livelihoods, tourism can play a strategic role in poverty reduction strategies, which are intimately linked to any country's efforts toward competitiveness.

However, it should be recognized that these efforts could involve taking sometimes difficult and contentious steps in conserving natural heritage and in restoring species and landscapes in danger. It will require integrated approaches that involve people and habitats in ways that both benefit, in ways that are effective, and in ways that create a sense of ownership and pride among local residents, who often feel they pay the price for conservation without receiving the benefits. But the price to pay for inaction will be very high: both the tourism industry and the society as a whole will pay a much higher price in the long term if actions to conserve biodiversity are not adopted in a timely fashion.

### Notes

- 1 IUCN and WCMC 2003.
- 2 CESD and INCAE 2004.
- 3 CESD and TIES 2005.
- 4 IPCC 1999.

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