

A New Big Plan for Nature: Opportunities for Travel & Tourism

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The year 2010 was a landmark year for charting the way forward for how we value, protect, and respect nature. Designated the International Year of Biodiversity (IYB) by the United Nations, 2010 provided an important opportunity for raising awareness about biodiversity loss and ecosystem degradation but also for understanding the immense value of our natural capital.

Yet despite our growing understanding of the vital role biodiversity plays in supporting human well-being, nature is in crisis: one in five of the world's vertebrate species is facing extinction and many ecosystems are on the verge of collapse. Furthermore, human-induced climate change will magnify existing environmental stresses and contribute to food insecurity, conflict over resources, and loss of livelihood for millions of people.

Thanks to the landmark study *The Economics of Ecosystems and Biodiversity* (TEEB), also launched in 2010, we are beginning to realize the full economic impacts of biodiversity loss and the significant business value of conserving nature.

The attention brought to biodiversity and ecosystems by IYB, together with increased awareness and support for nature conservation from government and business leaders as well as the general public, has generated momentum to take action for safeguarding nature. A new “Big Plan” for nature, with 20 biodiversity targets for 2020, was adopted by the world's governments at the end of 2010; more formally known as the Strategic Plan 2011–2020 of the Convention on Biological Diversity, this document aims to steer public and private decision-making in the next decade.

As one of the world's largest and fastest-growing industries and one that is directly dependent upon healthy ecosystems, Travel & Tourism (T&T) has an important role to play in mainstreaming biodiversity-friendly practices and nature-based solutions, and stands much to gain from capturing these values. Ecotourism, for instance, is a burgeoning section of the fast-growing T&T sector that has a huge potential to act as a catalyst for business, biodiversity, and local development. It is therefore essential for the T&T public and private sectors to work together to ensure that conservation and the sustainable use of biodiversity and ecosystems are part and parcel of their operations.

This chapter describes the state of biodiversity and explains the importance of healthy ecosystems for the prosperity of the T&T industry. It then goes on to outline how recent developments in the biodiversity-policy sphere will affect the T&T sector. The value of nature and the necessity to internalize this value into products and services is also discussed.

The state of nature

Biodiversity—the variety of genes, species, and ecosystems that constitute life on Earth—is essential for human well-being and provides society with many

Box 1: Ecosystem services

The 2005 Millennium Ecosystem Assessment describes four basic types of ecosystem services:

- **Provisioning services:** These are the tangible products that biodiversity provides, including food, fresh water, fuel, and materials such as wood for furniture and construction and fiber for clothing as well as genetic resources for medicines and crop security.
- **Regulating services:** These are the services that keep major ecological processes in balance, such as climate regulation, flood control, disease regulation, and water purification.
- **Supporting services:** These are the services that are necessary for the production of all other ecosystem services, including biomass production, soil formation, nutrient cycling, and provision of habitats.
- **Cultural services:** These are the non-material values that humans derive from nature, including aesthetic, spiritual, educational, and recreational benefits.

important benefits and services: for instance, insects pollinate crops; birds disperse seeds; and fungi, worms, and micro-organisms produce nutrients and fertile soils. Interactions between organisms and the physical environment influence climate, water supplies, and air quality, and help protect from natural disasters. These benefits are collectively known as *ecosystem services* (see Box 1).

Although biodiversity provides society with vital products and services, and despite the fact that the UN Convention on Biological Diversity is one of the most widely ratified treaties in the world, human activities are increasingly causing damage to ecosystems and species around the world. The third edition of the *Global Biodiversity Outlook* demonstrates that the target agreed by the world's governments in 2002, "to achieve by 2010 a significant reduction of the current rate of biodiversity loss at the global, regional and national level as a contribution to poverty alleviation and to the benefit of all life on Earth," has not been met.¹ In fact, the report shows that biodiversity loss is continuing at unprecedented rates, with many species moving toward extinction, with natural habitats becoming increasingly fragmented and degraded, and with genetic diversity continuing to decline in agricultural systems.

According to the International Union for Conservation of Nature (IUCN) Red List of Threatened Species™, the world's most authoritative and objective

source of information on the conservation status of species, one in three amphibians, one in three coral species, one in four mammals, and one in eight birds are threatened with extinction. Another major study, based on the IUCN Red List, concluded that one-fifth of the world's vertebrate species—nature's "backbone"—are facing extinction. At the same time, the rate of biodiversity loss is now at least 20 percent less than it would have been without global environmental efforts—showing that targeted conservation action works.

Tourism and nature: A double-edged sword

Tourism and nature are intimately related. In fact, the prosperity of the tourism industry is directly dependent on healthy ecosystems and the many services they provide—whether these are related to ecotourism, beach holidays, skiing, or visiting national parks. These recreational values offered by ecosystems have been recognized as one of the main cultural services that nature provides to humankind, along with spiritual, aesthetic, and educational values. However, from the nature conservation perspective, tourism development represents a double-edged sword. Often acclaimed for its ability to reconcile conservation and development goals, it can rapidly get out of control and become the driving force for ecosystem degradation and biodiversity loss.

Tourism has major negative impacts on biodiversity and the natural environment. These result from:

- the loss of habitat to tourism developments, including new resorts and tourism facilities;
- disturbance and damage to wildlife and habitats caused by tourism activities, such as scuba diving;
- high levels of the use of non-renewable energy and water supplies;
- the disposal of solid and liquid wastes from accommodation, bars, and restaurants;
- the use of unsustainable sources for food supplies, including of fish, seafood, and agricultural products;
- the sale of souvenirs produced from threatened or protected plant and animal species; and
- the production of an estimated 5 percent of global CO₂ emissions, for which tourism is responsible.

At the same time, tourism also has the potential to make positive contributions to conservation, by:

- providing an economic incentive to governments and communities to protect biodiversity and natural environments that attract tourists and provide high-quality ecosystem services for tourism;
- raising awareness about biodiversity and conservation among tourists; and
- supporting conservation activities, through access and use fees for biodiversity-based activities, such as scuba diving or wildlife watching in protected areas, and through voluntary financial contributions from tourism companies and tourists.

In order to capitalize on the positive contributions made by T&T to biodiversity, it is important to fully include this sector in the conservation agenda. It is also essential that the industry strive to reduce its impact on nature through the integration of the value of biodiversity into its products and services.

A new “Big Plan” for nature

As part of the International Year of Biodiversity, numerous events drawing attention to biodiversity and ecosystems were organized on all continents, culminating with a special session of the United Nations General Assembly dedicated to biodiversity and the 10th meeting of the Conference of the Parties to the Convention on Biological Diversity (CBD COP10) in Nagoya, Aichi Prefecture, Japan.

During the CBD COP10, nearly 200 governments adopted a new Strategic Plan for 2011–20. The 20 Aichi Biodiversity Targets, which are part of the Strategic Plan, will help shape the conservation agenda going forward with an emphasis on integrating biodiversity into all sectors. The 20 biodiversity targets, which are split into five strategic goals, set out a roadmap for reducing pressures on biodiversity and restoring ecosystems as well as informing and enhancing national and international policymaking on biodiversity and ecosystems (see Table 1). The Strategic Plan’s vision is that:

By 2050 biodiversity is valued, conserved, restored and widely used, maintaining ecosystem services, sustaining a healthy planet and delivering benefits essential for all people.²

Collective action to conserve biodiversity and implement the global vision and targets is a shared responsibility of governments, the private sector, and civil society. The T&T industry has an important role to play in implementing the CBD Strategic Plan. The T&T public sector can create an enabling policy framework that, among other things, provides incentives for biodiversity-friendly practices in the sector. At the same time, the T&T private sector can bring to the table perspectives that are complementary to those of governments. In particular,

knowledge of markets and management experience can be valuable assets when applied to conservation.

Capturing the value of nature

The failure to include the value of the services provided by ecosystems and biodiversity into economic and other decision-making processes is believed to be one of the principal factors leading to the overuse and degradation of such services. The TEEB study, launched in 2010, applies economic thinking to the use of biodiversity and ecosystem services in order to correct this failure. The aim of TEEB is to catalyze the development of a new economy “in which the values of natural capital, and the ecosystems services which this capital supplies are fully reflected in the mainstream public and private decision-making.”³ TEEB is explained in more detail in Box 2.

TEEB is probably the most comprehensive review of the value of biodiversity and ecosystems to society. It appeals for systematic appraisal of the contribution of nature for human well-being and makes a number of recommendations that will bring us closer to the CBD’s 2050 vision for biodiversity. TEEB also outlines opportunities for capturing the value of nature and simultaneously finding nature-based solutions to current challenges. Because T&T is a biodiversity-dependent industry, the opportunities outlined in TEEB are perhaps the most apparent and easily realized. A summary of T&T-related TEEB findings is found in Box 3.

Biodiversity conservation as a competitive advantage for Travel & Tourism

There is a growing demand for responsible tourism products and services, and such products and services will be rewarded by increased market differentiation and competitiveness. Biodiversity-friendly goods and services will also begin to penetrate into new markets as well as to secure a premium for their offer. *The Time for Biodiversity Business* study carried out by IUCN in 2009 demonstrated that there are numerous possibilities for creating biodiversity businesses linked to tourism and that these can be good for business and good for nature conservation. Those destinations and businesses setting the trend will most certainly gain a competitive advantage.

In the past, much work has been carried out by nature conservation organizations, industry associations, and UN agencies on sustainable tourism and nature conservation, including:

- strategies and tools for the integration of sustainability/conservation in public policy/decision-making processes;
- guidelines for tourism development and operations in sensitive and protected areas (mountain, desert, coastal areas, wildlife watching in protected areas, etc.);

Table 1: The Aichi Biodiversity Targets**Strategic Goal A: Address the underlying causes of biodiversity loss by mainstreaming biodiversity across government and society.**

Target 1	By 2020, at the latest, people are aware of the values of biodiversity and the steps they can take to conserve and use it sustainably.
Target 2*	By 2020, at the latest, biodiversity values have been integrated into national and local development and poverty reduction strategies and planning processes and are being incorporated into nation accounting, as appropriate, and reporting systems.
Target 3*	By 2020, at the latest, incentives, including subsidies, harmful to biodiversity are eliminated, phased out or reformed in order to minimize or avoid negative impacts and positive incentives for the conservation and sustainable use of biodiversity are developed and applied, consistent and in harmony with the Convention and other relevant international obligations, taking into account national socioeconomic conditions.
Target 4*	By 2020, at the latest, governments, business, and stakeholders at all levels have taken steps to achieve or have implemented plans for sustainable production and consumption and have kept the impacts of use of natural resources well within safe ecological limits.

Strategic Goal B: Reduce the direct pressures on biodiversity and promote sustainable use.

Target 5*	By 2020, the rate of loss of all natural habitats, including forests, is at least halved and where feasible brought close to zero, and degradation and fragmentation is significantly reduced.
Target 6	By 2020, all fish and invertebrate stocks and aquatic plants are managed and harvested sustainably, legally and applying ecosystem based approaches, so that overfishing is avoided, recovery plans and measures are in place for all depleted species, fisheries have no significant adverse impacts on threatened species and vulnerable ecosystems and the impacts of fisheries on stocks, species and ecosystems are within safe ecological limits.
Target 7	By 2020, areas under agriculture, aquaculture and forestry are managed sustainably, ensuring conservation of biodiversity.
Target 8*	By 2020, pollution, including from excess nutrients, has been brought to levels that are not detrimental to ecosystem function and biodiversity.
Target 9	By 2020, invasive alien species and pathways are identified and prioritized, priority species are controlled or eradicated and measures are in place to manage pathways to prevent their introduction and establishment.
Target 10*	By 2015, the multiple anthropogenic pressures on coral reefs, and other vulnerable ecosystems impacted by climate change or ocean acidification are minimized, so as to maintain their integrity and functioning.

Strategic Goal C: To improve the status of biodiversity by safeguarding ecosystems, species and genetic diversity.

Target 11*	By 2020, at least 17 percent of terrestrial and inland-water areas and 10 percent of coastal and marine areas, especially areas of particular importance for biodiversity and ecosystem services, are conserved through effectively and equitably managed, ecologically representative and well-connected systems of protected areas and other effective area-based conservation measures, and integrated into the wider landscape and seascape.
Target 12	By 2020, the extinction of known threatened species has been prevented and their conservation status, particularly of those most in decline, has been improved and sustained.
Target 13	By 2020, the genetic diversity of cultivated plants and farmed and domesticated animals and of wild relatives, including other socioeconomically as well as culturally valuable species is maintained and strategies have been developed and implemented for minimizing genetic erosion and safeguarding their genetic diversity.

Strategic Goal D: Enhance the benefits to all from biodiversity and ecosystem services.

Target 14	By 2020, ecosystems that provide essential services, including services related to water, and contribute to health, livelihoods and well-being, are restored and safeguarded, taking into account the needs of women, indigenous and local communities and the poor and vulnerable.
Target 15*	By 2020, ecosystem resilience and the contribution of biodiversity to carbon stocks has been enhanced, through conservation and restoration, including restoration of at least 15 percent of degraded ecosystems, thereby contributing to climate change mitigation and adaptation and to combating desertification.
Target 16	By 2015, the Nagoya Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefits Arising from their Utilization is in force and operational, consistent with national legislation.

Strategic Goal E: Enhance implementation through participatory planning, knowledge management and capacity-building.

Target 17	By 2015, each Party has developed, adopted as a policy instrument, and has commenced implementing, an effective, participatory and updated national biodiversity strategy and action plan.
Target 18	By 2020, the traditional knowledge, innovations and practices of indigenous and local communities relevant for the conservation and sustainable use of biodiversity, and their customary use of biological resources, are respected, subject to national legislation and relevant international obligations, and fully integrated and reflected in the implementation of the Convention with the full and effective participation of indigenous and local communities, at all relevant levels.
Target 19	By 2020, knowledge, the science base and technologies relating to biodiversity, its values, functioning, status and trends, and the consequences of its loss, are improved, widely shared and transferred, and applied.
Target 20*	By 2020, at the latest, the mobilization of financial resources for effectively implementing the Strategic Plan for Biodiversity 2011–2020 from all sources and in accordance with the consolidated and agreed process in the Strategy for Resource Mobilization should increase substantially from the current levels. This target will be subject to changes contingent to resources needs assessments to be developed and reported by Parties.

Source: CBD, 2010b.

Note: These targets are part of the CBD's Strategic Plan and were adopted during CBD COP10.

* Targets that are most relevant for the tourism industry.

Box 2: The Economics of Ecosystems and Biodiversity

The Economics of Ecosystems and Biodiversity (TEEB) study was an international initiative bringing together science, economics, and policy. The aim of the study was to analyze and assess the economic, societal, and human value of biodiversity, promoting a better understanding of the true economic value of ecosystem services and offering practical economic tools that take proper account of this value. By highlighting the costs and benefits of biodiversity and ecosystems, the study offers solutions to rebuild traditional market mechanisms and shows how to improve them.

TEEB delivered five major studies from 2009 to 2010, as follows:

- **Ecological and Economical Foundation (D0):** The core science component of TEEB includes a state-of-the-art synthesis of theory and methods for valuing biodiversity and ecosystem services.
- **TEEB for Policymakers (D1):** A key focus of TEEB is to support policies that stem biodiversity loss and encourage conservation, including the reform of harmful subsidies, development of payments for ecosystem services, stronger environmental liability, and increased financing for protected areas.
- **TEEB for local and regional policy (D2):** Biodiversity conservation requires strong support for rural communities and local governments, to help them manage their resources and confront external threats. This component will provide practical tools for local administrators.
- **TEEB for business (D3):** This component identifies business opportunities linked to the conservation and sustainable use of biological resources, and promotes new tools for measuring and reporting the biodiversity impacts of business.
- **TEEB for citizens (D4):** This component aims to find novel ways of communicating the economics of ecosystems and biodiversity to a mass audience around the world.

Box 3: Summary of Travel & Tourism-related findings of the TEEB study

- The global tourism industry generated about US\$5.7 trillion of value-added in 2010 (over 9 percent of global GDP) and employs around 235 million people directly or indirectly.
- Tourism is a key export for 83 percent of developing countries: for the world's 40 poorest countries, it is the second most important source of foreign exchange after oil.
- Many tourism businesses are fully or partially dependent on biodiversity and ecosystem services.
- In 2004, the nature and ecotourism market grew three times faster than the tourism industry as a whole.
- Several biodiversity hotspots are experiencing rapid tourism growth: 23 hotspots have seen growth in tourist visits of over 100 percent in the last decade.
- Whale watching alone was estimated to generate US\$2.1 billion per year in 2008, with over 13 million people undertaking the activity in 119 countries.
- Revenues from dive tourism in the Caribbean (which account for almost 20 percent of total tourism receipts) are predicted to fall by up to US\$300 million per year because of coral reef loss.
- In the Maldives, single gray reef sharks were valued at US\$3,300/year to the tourism industry in contrast to US\$32 for a single catch.
- In the United States in 2006, private spending on wildlife-related recreational activities (e.g., hunting, fishing, and observing wildlife) amounted to US\$122 billion, or just under 1 percent of GDP.

- certification and accreditation schemes;
- development of partnerships, networks, and initiatives; and
- on-the-ground projects for the management and development of tourism.

Building on this previous work and the momentum generated in 2010, the T&T sector is now in a unique position to become a leading industry in mainstreaming biodiversity-friendly practices and nature-based solutions. In order to achieve this, it would be important to focus on four key areas: (1) adoption and integration of biodiversity-friendly operating practices in T&T supply chains; (2) destination stewardship; (3) capacity building and market creation for “biodiversity businesses”;⁴ and (4) emerging businesses and markets based on biodiversity-friendly goods and services.

In terms of the adoption and integration of biodiversity-friendly operating practices in T&T supply chains, examples include following good practice guidelines for siting and designing tourism facilities and developments to avoid damage to biodiversity; ensuring that food supplies and other natural resource products come from sustainably harvested and/or sustainably produced sources; and raising the awareness of tourists about the biodiversity of the places they visit and the actions they can take to help protect it.

With regard to destination stewardship, a holistic approach is needed to integrate biodiversity and ecosystems into tourism products and services at the destination or landscape level. Achieving significant and lasting improvements in biodiversity and the quality of a destination’s environment requires coordinated action by all parts of the tourism supply chain and the involvement of all stakeholders.

In particular, it is essential that the public sector creates an enabling environment that rewards biodiversity-friendly practices; the private sector can respond by raising the bar within their operations, but also by raising awareness of their consumers and within their supply chains. Partnerships are central to the implementation of destination stewardship, and need to be built through dialogue and the mobilization of key stakeholders in the destination. Often it is easiest to start with local business leaders and public authorities, but it is also important to broaden partnerships to include small- and medium-sized enterprises in the destination by working through their local business networks, which are generally different from those of large enterprises and may be informal.

In terms of emerging markets, there are numerous opportunities to establish payments for ecosystem services schemes in the tourism sector as well as to support the restoration of coral reefs and other ecosystems for tourism and to support protection against the effects of climate change. There is also the opportunity to support

mechanisms for supply chain management by methods that include certification and standard development. This should, of course, be backed by capacity building to ensure that local businesses implement the standards of sustainable tourism and improve their business skills. Finally, the development and marketing of biodiversity-based tourism products is paramount in ensuring the success and proliferation of these businesses.

The way forward

The year 2010 represented a milestone in terms of increasing public awareness of biodiversity loss and ecosystem degradation, but also in furthering global efforts on biodiversity conservation. During the year, important decisions were taken to safeguard biodiversity and a global plan of action was agreed upon by the world’s governments. This plan requires its adoption and implementation by all sectors of society, including governments, businesses, and civil society. The T&T sector, as the largest and fastest-growing sector in the world, can have considerable influence in ensuring that the targets are met and that biodiversity is protected for future generations.

Biodiversity is vital for T&T, as many tourism products and services owe their attractiveness to surrounding natural environments. Yet the value of the natural assets used by the industry is often not internalized, leading to serious biodiversity impacts. If T&T is to support global biodiversity goals, threats to nature must be minimized through the integration of biodiversity considerations into tourism management systems. On the other hand, there are many opportunities for the industry to reap the rewards of being biodiversity-friendly, including market differentiation and increased competitiveness, the development of premium products and services, and new business propositions as well as emerging markets.

Beyond 2010, there needs to be increased focus on not only integrating biodiversity into policymaking but also on creating the enabling conditions for such policies to be implemented, with an emphasis on recognizing and internalizing the value of biodiversity. IUCN sees tourism as a priority sector in achieving this because, if it is well planned and managed, it has considerable potential to support biodiversity conservation and ecosystem service restoration. IUCN has been involved with and has supported the development of most of the key processes and documents outlined in this chapter. As such, IUCN is in an unmatched position to provide guidance for the industry and craft a way forward for Travel & Tourism to help implement the Big Plan for nature.

Notes

- 1 SCBD 2010, p. 3.
- 2 CBD 2010a.
- 3 TEEB 2010.
- 4 *Biodiversity businesses*, as defined by a 2008 IUCN report entitled *Building Biodiversity Business*, are “commercial enterprises that generate profits via activities which conserve biodiversity, use biological resources sustainably and share the benefits arising from this use equitably.”

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