IUCN Conservation Outlook Assessment 2014 **(archived)**
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Please note: this is an archived Conservation Outlook Assessment for Alejandro de Humboldt National Park. To access the most up-to-date Conservation Outlook Assessment for this site, please visit https://www.worldheritageoutlook.iucn.org.

Alejandro de Humboldt National Park

SITE INFORMATION

Country:
Cuba
Inscribed in: 2001
Criteria:
(ix) (x)

Site description:

Complex geology and varied topography have given rise to a diversity of ecosystems and species unmatched in the insular Caribbean and created one of the most biologically diverse tropical island sites on earth. Many of the underlying rocks are toxic to plants so species have had to adapt to survive in these hostile conditions. This unique process of evolution has resulted in the development of many new species and the park is one of the most important sites in the Western Hemisphere for the conservation of endemic flora. Endemism of vertebrates and invertebrates is also very high. © UNESCO

SUMMARY

2014 Conservation Outlook

Good with some concerns

The conservation outlook for the site is positive, largely thanks to the remoteness of the area and its inaccessibility. The main threats to the values of the Park have been the subjects of management program and the site appears to be recovering from the degradation of habitats that occurred before the Park attained World Heritage Status. Mining represents the most serious potential threat to the site’s values. Since 1995 new mining has not been allowed to proceed within the Park. However, until the government has made an unequivocal commitment to revoke the mining concessions granted within the boundaries of the property, or those in its periphery that could affect the property, this remains a very high potential threat to the site’s values.

Current state and trend of VALUES

Low Concern
Trend: Improving

The main threats to the values of the Park have been the subjects of management program and the site appears to be recovering from the degradation of habitats that occurred before the Park attained World Heritage Status. However, certain areas, particularly those on poor soils with high erosion impacts, will require longer time to recover.

Overall THREATS

High Threat

Current threats to the site’s values include invasive and exotic species, fires and climate change, but overall their level is low and the site is well protected by its remoteness. Mining represents the most serious potential threat to the site’s values. Since 1995 new mining has not been allowed to proceed within the Park. However, until the government has made an unequivocal commitment to revoke

the mining concessions granted within the boundaries of the property, or those in its periphery that could affect the property, this remains a very high potential threat to the site’s values.

Overall PROTECTION and MANAGEMENT

Mostly Effective

The site’s protection and management is mostly effective. However, certain aspects could be improved, particularly sustainable finance and monitoring.

FULL ASSESSMENT

Description of values

Values

World Heritage values

► Evolution of communities and species

Criterion:(ix)

The size, altitudinal diversity, complex lithologies, and landform diversity of Alejandro de Humboldt National Park (AHNP) have resulted in a range of ecosystems and species unmatched in the Insular Caribbean. It was a Miocene-Pleistocene refuge site, particularly in the glacial eras, for the Caribbean biota. The fresh water rivers that flow off the peaks of the park are some of the largest in the insular Caribbean and because of this have high freshwater biological diversity. Because of the serpentine, peridotite, karst and pseudokarst geology of the region, AHNP is an excellent example of ongoing processes in the evolution of species and communities on underlying rocks that pose special challenges to plant survival. (Justification for inscription, 2001, Draft SoOUV, 2010).

► Diversity of habitats and species

Criterion:(x)

This Park contains the most important and significant natural habitats for in-situ conservation of terrestrial biological diversity in the entire insular Caribbean. It contains 16 of 28 plant formations defined for Cuba, the largest island in the Caribbean, which is a unique biogeographic province. It is one of the most important sites for conservation of endemic flora in the entire Western Hemisphere – nearly 70% of the 1,302 spermatophytes already described, of an estimated total of 1,800-2,000, are endemic to the park.

AHNP is one of the most biologically diverse terrestrial tropical ecosystems in an island setting anywhere on earth. Endemism rates for vertebrates and invertebrates found in the park are also very high. Many of these are threatened because of their small range. Because of their uniqueness and the fact that they represent unique evolutionary processes, they are of outstanding universal value from the point of view of science and conservation. (Justification for inscription, 2001; Draft SoOUV, 2010).

Other important biodiversity values

► Species of particular conservation concern

The Park is recognised as an Important Bird Area (IBA) by Birdlife International, and as an Alliance for Zero Extinction (AZE) site.
Critically Endangered Birds: Ivory billed woodpecker (last sighted in 1986); and Cuban Kite (sighted in 2011)..
Threatened Birds: Masked Duck, Gundlach’s Hawk, Sharpe-shinned Hawk, Grey-fronted Quail-dove, Cuban Parrot, Cuban Parakeet, Giant Kindgbird, Cuban Crow, Bee Hummingbird (the world’s smallest bird).
Threatened Mammals: Cuban Solenodon (endemic), 2 endemic species of Hutia, Caribbean Manatee
Other Species of Concern: 2 species of endemic bats, 3 new species of Anolis lizard; Gervais’funnel-eared bat (the world’s smallest); endemic Iberia frog, the world’s smallest (Rapid Biological Inventory, 2005)
The site has the richest endemism of the country and the biggest conserved mountainous ecosystem remaining in Cuba. (UNDP, 2011)

Assessment information

Threats

Current Threats

Low Threat

Current threats to the site’s values include invasive and exotic species, fires and climate change, but overall their level is low.

▶ Industrial/ Military Effluents

Low Threat
Inside site
Outside site

Effluents from artisanal mining, old mining areas and roads, from the erosion of deforested areas are continuing problems, though their effects on the biota at not well understood. (Rapid Biological Inventory, 2005)

▶ Housing/ Urban Areas

Very Low Threat
Inside site
Outside site

There is a total of 43 local communities, of which 11 are living inside the park, but in a very limited area – 10 in the buffer zone and 22 in the influence zone – a total of 5.450 habitant, which have a relatively low impact on the park (Management Plan 2009-2013).

▶ Fire/ Fire Suppression

Low Threat
Inside site
Outside site

An ever present and increasing danger because of climate change, though there have been no fires during the past 3 years. (World Heritage Committee, 36.Com.SOC, 2012)

▶ Invasive Non-Native/ Alien Species

Low Threat

Inside site
Outside site

Widespread predation of native species by invasive mice, rats, dogs, cats, pigs, and mongoose (Rapid Biological Inventory, 2005). Replacement of native tree species though faster growing Casuarina, used for restoration of degraded mining areas and roads in the past.

► Storms/Flooding

High Threat
Inside site
Outside site

The increasing frequency and severity of hurricanes is a major problem for management. (Rapid Biological Inventory, 2005). However, the damage caused by Hurricane Ike, which affected forest areas throughout several sectors of the park, does not appear to have created serious or irreversible impacts to the values and integrity of the property and available evidence appears to confirm that the property is recovering well (SOC report, 2010).

Potential Threats

High Threat

Mining represents the most serious potential threat to the site's values. Since 1995 new mining has not been allowed to proceed within the Park. However, until the government has made an unequivocal commitment to revoke the mining concessions granted within the boundaries of the property, or those in its periphery that could affect the property, this remains a very high potential threat to the site's values.

► Mining/ Quarrying

High Threat
Inside site
Outside site

Previous to becoming a World Heritage site, several mining concessions were granted within the Park; the two largest covered 40% of the Park's terrestrial area. Since 1995 new mining has not been allowed to proceed within the Park. However, until the government has made an unequivocal commitment to revoke the mining concessions granted within the boundaries of the

property, or those in its periphery that could affect the property, this remains a very high potential threat to the site's values (Rapid Biological Assessment, 2005; SOC report 2010).

Protection and management

Assessing Protection and Management

► Relationships with local people

Mostly Effective

There is a total of 43 local communities, of which 11 are living inside the park area – 10 in the buffer zone and 22 in the influence zone – a total of 5.450 inhabitants, which have a relatively low impact on the park.. Participatory approaches to management by the National Center for Protected Areas and on-going environmental education programmes have helped to reduce the impacts of local communities' activities on the Park's natural values (Rapid Biological Inventory, 2005; World Heritage Committee, 34.COM.SOC 2012; 36.COM.SOC, 2012).

► Legal framework and enforcement

Some Concern

The Park was legally established in 1996 bringing together the management of the Jaguani and Cupeyal del Norte Natural Reserves, Cuchillas del Toa Biosphere Reserve, and Ojito de Agua Wildlife Refuge in one management unit of the National Center for Protected Areas.. In 2001 the Agreement 4262 of the executive committee of the ministerial board (Comité Ejecutivo del Consejo de Ministros) approved the area officially as a National Park. The Law on Environment, the Decree-Law on Forest Heritage and Wild Fauna (136/93), and the regulations for the Realization and Approval of Environmental Impact Assessments and for the State Environmental Inspection (168/95) provide the legal framework for protection of the Park (Rapid Biological Inventory, 2005)

► Integration into regional and national planning systems

Data Deficient

The Park is a priority area for the National Environmental Strategy and for the National Biodiversity, Protected Areas and Environmental Education Strategies (Rapid Biological Inventory, 2005). Information on its integration into other regional and national planning systems, such as minerals planning, is currently lacking.

► Management system

Highly Effective

A management plan for the 2009-2013 period provides overall guidance on management; this is complemented by annual Operational Plans. The Park currently has a staff of 65 and an annual budget of about 350,000 Cuban Pesos (World Heritage Committee, 32.COM.SOC, 2008; 34.COM.SOC, 2010; 36.COM.SOC, 2012)

► Management effectiveness

Highly Effective

In 2004, Cuba adopted a system to evaluate management effectiveness. The baseline score for the Park was 3.10 (out of a maximum of 4). The score advanced to 3.76 in 2007, but was set back to 3.60 in 2008 as a result of damages suffered from Hurricane Ike. By 2010 the effectiveness score had rebounded to 3.66. (World Heritage Committee, 32.COM.SOC,2008; 34.COM.SOC, 2010; 36.COM.SOC, 2012)

► Implementation of Committee decisions and recommendations

Mostly Effective

In response to the Committee’s requests regarding the existing mining licenses within and in the vicinity of the site, the State Party has reiterated “its clear and unequivocal commitment not to explore or exploit in the boundaries of Alexander von Humboldt National Park” (State Party Report, 36.COM, 2012).

► Boundaries

Mostly Effective

The boundaries of the World Heritage Site follow the recommendations of the

World Heritage Committee at the time of its listing in 2001.

► Sustainable finance

Some Concern

Regular finance by the Cuban Government at a level of about 350,000 Cuban Pesos per year for management of the Park is inadequate. Project support from the GEF, UNESCO MaB funding, Green Gold (a German NGO), and WWF/Canada have served to support management activities during specific periods, but do not represent a permanent solution (World Heritage Committee, 34.COM.SOC, 2010; 36.COM.SOC, 2012).

► Staff training and development

Mostly Effective

With the support of international projects, the National Center for Protected Areas has carried out training programs for staff. However, more consistent and diversified capacity building efforts are still required (World Heritage Center, 33.COM.SOC, 2009; 34.COM.SOC, 2010).

► Sustainable use

Mostly Effective

The environmental education program seeks to educate communities in terms of sustainable development and climate change with specific programs in sustainable agriculture, forest management, erosion control, reforestation, and fire control. Educational activities are reinforced with practical applications on the ground (World Heritage Committee, 32.COM.SOC, 2008; 33.COM.SOC, 2009;34.COM.SOC, 2010; 36.COM.SOC, 2012).

► Education and interpretation programs

Mostly Effective

An on-going environmental education program with communities in and around the Park has produced positive results with communities recognizing that the Park is an asset for their wellbeing and development (World Heritage Committee, 32.COM.SOC, 2008; 33.COM.SOC, 2009; 34.COM.SOC, 2010; 36.COM.SOC, 2012).

► Tourism and interpretation

Mostly Effective

Visitors to the Park are mainly nationals. Occasional foreign visitors are brought to the Park by travel agencies, academic institutions, and international organizations. Hotels are being developed along the coastal zone of the Park. Interpretive facilities include two small visitor centers and campsites, hiking trails (some self-interpreted and some where guides are available), and boat excursions in the Bahia de Taco (Rapid Biological Inventory, 2005)

► Monitoring

Some Concern

The only monitoring carried out on a regular basis are the observations and reports of Park Rangers during their regular patrols. (Rapid Biological Inventory, 2005). Rapid biological inventory was undertaken The Field Museum y Cornell Lab of Ornitology and Cuban institutions (Republica de Cuba, 2009)

► Research

Some Concern

Some basic research is carried out by Park staff; occasional research is also carried out be external institutions; the largest, most systematic research was a 2004 Rapid Biological Assessment of the Park with the participation of 48 Cuban and foreign scientists (Rapid Biological Assessment, 2005). Additional research is needed on the state of the Park’s values.

Overall assessment of protection and management

Mostly Effective

The site’s protection and management is mostly effective. However, certain aspects could be improved, particularly sustainable finance and monitoring.

► Assessment of the effectiveness of protection and management in

addressing threats outside the site

Data Deficient

Data deficient

State and trend of values

Assessing the current state and trend of values

World Heritage values

▶ **Evolution of communities and species**

Low Concern
Trend:Improving

Enough untouched habitat of all types remains to assure that evolutionary processes will continue, but additional habitat conversion could tip the balance the other way. (Rapid Biological Inventory, 2005; World Heritage Committee, 32.COM.SOC, 2008; 33.COM.SOC, 2009;34.COM.SOC, 2010; 36.COM.SOC, 2012).

▶ **Diversity of habitats and species**

Low Concern
Trend:Improving

The site appears to be recovering from the degradation of habitats that occurred before the Park attained World Heritage Status. However, certain areas, particularly those on poor soils with high erosion impacts, will require longer time to recover. (Rapid Biological Inventory, 2005; World Heritage Committee, 32.COM.SOC, 2008; 33.COM.SOC, 2009;34.COM.SOC, 2010; 36.COM.SOC, 2012)

Other important biodiversity values

▶ **Species of particular conservation concern**

The Park is recognised as an Important Bird Area (IBA) by Birdlife International, and as an Alliance for Zero Extinction (AZE) site.
Critically Endangered Birds: Ivory billed woodpecker (last sighted in 1986);

and Cuban Kite (sighted in 2011)..
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The site has the richest endemism of the country and the biggest conserved mountainous ecosystem remaining in Cuba. (UNDP, 2011)

Summary of the Values

► Assessment of the current state and trend of World Heritage values

Low Concern

Trend: Improving

The main threats to the values of the Park have been the subjects of management program and the site appears to be recovering from the degradation of habitats that occurred before the Park attained World Heritage Status. However, certain areas, particularly those on poor soils with high erosion impacts, will require longer time to recover.

► Assessment of the current state and trend of other important biodiversity values

Low Concern

Trend: Data Deficient

Law enforcement and environmental education program have resulted in increases in the populations of terrestrial species of particular conservation concern, but much work remains to sustain and enhance these positive trends into the future. (Rapid Biological Inventory, 2005; World Heritage Committee, 32.COM.SOC, 2008; 33.COM.SOC, 2009;34.COM.SOC, 2010; 36.COM.SOC, 2012).

Additional information

Key conservation issues

▶ Invasive species

National

Exotic species present in the site include rats, cats, dogs, feral pigs. Prevention of introduction of new species is of particular importance.

Benefits

Understanding Benefits

▶ Is the protected area valued for its nature conservation?

With its relatively large area, and high levels of biodiversity and endemism, Humboldt is one of the premier conservation sites in the insular Caribbean.

▶ Traditional agriculture, Livestock grazing areas

The site provides sustenance to local communities through subsistence agriculture and livestock grazing.

▶ Outdoor recreation and tourism

Tourism is currently at a relatively low level, but has the potential to increase significantly

▶ Water provision (importance for water quantity and quality)

Water provisioning is of major importance for the region (Welt hunger hilfe, 2012)

Summary of benefits

Conservation is by far the major benefit of the Site at all levels, but the Park also benefits local communities though subsistence agriculture, livestock grazing. Water provision is of major importance for the region. Further benefits could potentially be generated through nature oriented tourism.

Projects

Compilation of active conservation projects

№	Organization/ individuals	Project duration	Brief description of Active Projects
1	GEF		A project entitled “Enhancing the prevention, control, and management of invasive alien species in vulnerable ecosystems in Cuba” was begun in June, 2011 and includes activities in the Park. http://www.thegef.org/gef/sites/thegef.org/files/documents/document/3-15-11%20Cuba%203955-webdocs.pdf
2	German Agro Action		The project Sustainable Management of Natural Resources from the Buffer Zone of the Alexander von Humboldt National Park, Guantánamo Province is currently under development by Cuban Association of Agricultural and Forest Technicians (ACTAF) with support from German Agro Action (UNEP, 2012, Welt hunger hilfe. 2012. Annual Report 2011).
3	The Rufford Foundation		Butterflies and Moths of Monte Iberia, Cuba. Filling Gaps and Capacity Building toward its Conservation. http://www.rufford.org/projects/rayner_n%C3%BA%C3%B1ez

Compilation of potential site needs

№	Site need title	Brief description of potential site needs	Support needed for following years
1	N.A.	Institution of long-term mechanisms to regularly raise funding for conservation activities that are in addition to what the Government can provide	
2	N.A.	Training for different skill levels and increase in staff numbers	

№	Site need title	Brief description of potential site needs	Support needed for following years
3	N.A.	Information on the current state of the marine component of the site is insufficient and better monitoring programmes are needed.	

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