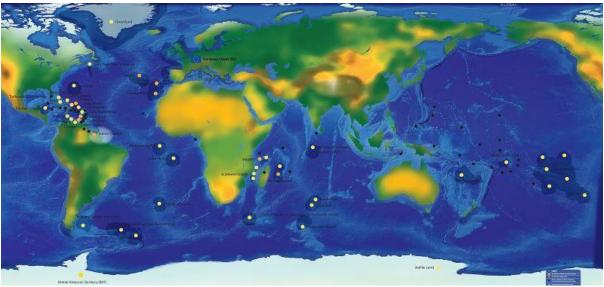
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# EU Overseas entities and their natural capital

Scattered worldwide, the European Union (EU) overseas entities (comprising Outermost Regions (ORs) and Overseas Countries and Territories (OCTs)) are home to an outstanding diversity of species, ecosystems and landscapes. These 34 regions and territories host around 70 % of Europe's species and are recognised as having biodiversity of global significance.

This 'natural capital' supports the daily needs of local communities, their economies and plays a key role in both climate change mitigation and adaptation. In many places, ecosystems and their services are highly vulnerable given existing pressures. The management of these ecosystems is of the utmost importance in view of sustaining human well-being and models of development.

However, much is still unknown about the natural capital in EU overseas entities. There is therefore a pressing need for an improved knowledge base. The 'Message' from the 2008 conference at Reunion Island<sup>2</sup> underlined the critical need for establishing "long-term monitoring programmes as well as biological and socio-economic indicators adapted to the constraints specific to the ORs and OCTs"<sup>3</sup>.



Map of the EU overseas entities (source: IUCN, 2014).

## Introduction

The EU includes 34 overseas entities: 8 ORs<sup>4</sup> and 26 OCTs<sup>5</sup> linked to 6 Member States<sup>6</sup>. They provide the EU with strategic gateways for regional cooperation activities in the Arctic, the Antarctic, the Caribbean, the Indian Ocean, the Macaronesia, the North Atlantic, the Pacific, the Sub-Antarctic, the South Atlantic, and the West African regions. ORs and OCTs are mainly islands and therefore the sea and the coastal areas play a fundamental role in their cultural, social and economic spheres. These regions also contribute to a significant extension of the European Exclusive Economic Zone (EEZ), 60 % of which is adjacent to the EU overseas entities [1] making it the world's largest and most diverse marine EEZ.

## A unique natural capital...

Biodiversity in the EU overseas entities represents a unique and critical part of Europe's natural heritage. Together, they host more than 20 % of the world's coral reefs and lagoons, and host around 70 % of Europe's species - much more than on the European mainland. For example, the islands of New Caledonia (an OCT of France) have a similar number of endemic species if compared to the European Union mainland [2]. Such diversity has led to France being included among the world's 18 'mega diverse countries'- the only European country on the list. Greenland, an OCT of Denmark, has the largest terrestrial protected area on Earth (the Northeast Greenland National Park of 972 000 km²). French Guiana, an OR of France in northern South America, has one of the least disturbed areas of rain forest on Earth. Almost all European territories are located either in Biodiversity Hotspots [3] or in High Biodiversity Wilderness Areas [4] (see also Box 1).

#### Box 1 Natural capital of ORs and OCTs - main facts and figures at a glance

- Combined EEZ of >15 million km<sup>2</sup>, the largest marine domain in the world;
- Hosts over 70 % of the EU's species;
- Located in five global 'Biodiversity Hotspots' (the Caribbean Islands, Madagascar and Indian Ocean Islands, Mediterranean Basin, New Caledonia, Polynesia-Micronesia);
- Located in a 'High Biodiversity Wilderness Areas' (Guiana shield region);
- Include key regions for both polar ecosystems and fish stocks (Falkland Islands, Greenland, South Georgia and South Sandwich Islands, Terres australes et antarctiques françaises (TAAF));
- More than 20 % of the world's coral reefs and lagoons, with 20 % in French Polynesia and the world's largest living coral atoll in the British Indian Ocean Territory;
- Canary Islands: 29 of 83 of the world's cetacean species (i.e. whales, dolphins, and porpoises);
- More endemic species species found nowhere else than continental Europe, with 2 400 alone
  in New Caledonia;
- More than 180 coastal and large Marine Protected Areas (MPAs);
- Seven Natural World Heritage Sites

Such globally significant biodiversity plays a key role for the continued provisioning of the many ecosystem goods and services that benefit local economies and people. In most EU overseas entities communities rely directly on the natural capital these ecosystems provide. For example, ecotourism and fisheries activities illustrate the critical role of biodiversity and ecosystem services in some of the entities: i.e. income from fisheries makes up more than 60 % of the GDP of the Falkland Islands [1].

### ...is under pressure...

Having developed in relative isolation and protection, island biodiversity and ecosystems are particularly vulnerable to changes in the environment. Human induced pressures generate threats in the form of habitat change, pollution, over-exploitation, invasive alien species (IAS) and climate change. Cumulatively, these threats exert considerable impacts causing biodiversity loss, ecosystem degradation, loss of ecosystem services and generally weakening ecosystem resilience. This is illustrated by available information on the number of endangered species (see table 1).

Table 1 The EU overseas entity per Member State with the highest number of endangered species

EU overseas entities	Number of endangered species	
New Caledonia (F)	1891	
Canary Islands (SP)	699	
British Indian Ocean Territory (UK)	676	
Aruba ( NL)	391	
Madeira (P)	347	
Greenland (D)	202	

Source: IUCN, Red List, 2014

In particular, IAS represents one of the primary threats to biodiversity and ecosystem services, especially in geographically and evolutionary isolated ecosystems, such as small islands. IAS is a much higher threat to the EU overseas entities' biodiversity compared to continental Europe (see Figure 1)

1400 200 1200 150 1000 800 100 600 400 50 200 0 0 Europe overseas Continental Europe Europe overseas Continental Europe Number of extinct species ■ Number of threatened species ■ IAS mentioned as a threat ■ IAS mentioned as a cause of extinction

Figure 1 The threat to biodiversity by IAS (EU overseas entities compared to continental Europe).

Source: IUCN, RedList, 2013

There has been an increase in conservation efforts in marine ecosystems in recent years resulting in the EU's overseas waters hosting some of the largest MPAs in the world. The expansion of the network of MPAs in EU overseas entities has increased the percentage of European waters under protection. This means that the Convention on Biological Diversity's Aichi target for global coverage of protected areas by 2020 of at least 10 % of the coastal and marine areas has progressed thanks in part to successes in EU overseas entities. However, conservation efforts are far from being represented equally as current MPAs are insufficient or entirely lacking in some EU overseas entities.

Table 2 Largest MPAs in EU overseas entities

EU overseas – large MPAs	Area (km²)	Year of creation
British Indian Ocean Territory marine reserve	544 000	2010
Mayotte and Glorieuses marine parks	110 000	2010 and 2012
South Georgia and South Sandwich Islands	1,000 000	2012
New Caledonia marine park	1,300 000	2014

Source: C.Martinez, C.Vieux, IUCN, 2014 [5].

## ...with climate change adding to the pressures

The EU overseas entities are at the sharp end of current and future climate change impacts. For example, floods and landslides, which are expected to occur more frequently due to extreme rainfall and coastal flooding, will be magnified by sea-level rise and increased sea storms [6]. In Mayotte, where the population is three times higher than in 1985, a strategy for climate change adaptation has yet to be defined. Here sea level rise is predicted to be between 20 and 60 cm by 2100. In addition, ongoing and extensive coastal deforestation will expedite the soil erosion process. Changing sea temperatures and ocean acidification and the subsequent impacts on coral reef and marine organisms, will change the composition of fish stock and have the potential to limit catch size [7]. In Madeira it is expected that the annual volume of water available to replenish water resources will be halved by the end of the century. More extreme precipitation events will occur due to climate change. Meanwhile, heath forests have been reduced to a very small fraction of its potential area,

only about 2 km<sup>2</sup>. Protecting these will be important not only for biodiversity, ecological and tourism purposes, but also for maintaining the water resources supply as well as for preventing soil erosion and landslides. Thus, integrated management of the watershed as well as the protection and restoration of high altitude ecosystems are critical. Overall, protection of ecosystems can offer valuable nature-based solutions to climate change adaptation. For example, coastal protection provided by healthy wetlands, marshes, coral reefs, sea grass and mangroves is key for the local climate change adaptation strategies while expensive seawalls show counter-productive effects [8].

## **Policy context**

The issues and challenges facing the European overseas entities rarely receive the same political exposure or resources that continental Europe does. Nevertheless several EU policy documents support EU entities. The EU biodiversity strategy invites Member States to "work with the outermost regions and overseas countries and territories through the BEST (Biodiversity and Ecosystem Services in Territories of European overseas) initiative to promote biodiversity conservation and sustainable use".

The LIFE+ fund<sup>8</sup> is open to the ORs and some of the OCTs, but the EU Nature Directives are only applicable to the Spanish and Portuguese ORs. Meanwhile, the voluntary scheme for the protection of species and habitats, inspired by the Natura 2000 approach advocated by the Message from Reunion Island is still not in place.

A dedicated legislative instrument on IAS was approved in 2014 and is applicable to the ORs, but further efforts are necessary for tackling this critical issue in all the EU overseas entities. Large-scale IAS eradication programmes have commenced in some overseas entities (e.g. South Georgia) and if successful, these will have benefits for a range of threatened and endemic wildlife especially seabirds of many species. There are, however, limited funding options for large-scale projects like this in the overseas entities. Biosecurity frameworks are also lacking in many places, which would contribute to mitigating new invasions.

Global conservation programmes such as BirdLife International's Albatross Task Force are having a positive impact in the overseas entities, with some species (e.g. the black-browed albatross) being classified as less threatened on the IUCN red list. However, many endemic species are still critically endangered with little chance of recovery.

The overwhelming importance of maritime issues is clear in European initiatives, such as the Marine Strategy Framework Directive<sup>9</sup>. This Directive, a powerful tool aimed at implementing an ecosystem-based approach to the management of human activities, is only applicable to the Macaronesia ORs of Portugal and Spain. Regarding the Common Fisheries Policy, the creation of a dedicated regional committee for ORs has been debated.

#### **Challenges**

Addressing the natural capital challenges of the EU Overseas entities means strongly supporting an appropriate implementation of the EU Biodiversity Strategy to 2020 as well as Europe's response to international targets (i.e. the Strategic Plan and Aichi targets of the Convention on Biological Diversity). Because of their geographical location, better management and restoration of ecosystems should be the corner stone of any development strategy for the EU overseas entities. They can be pilots for integrating biodiversity concerns into sectors such as agriculture, forestry and fisheries (the aim of targets 3 and 4 of the EU Biodiversity Strategy to 2020), increasing ecosystem resilience and providing nature-based solutions to climate change adaptation.

The European Commission Communication (COM(2012) 287) on "The outermost regions of the European Union: towards a partnership for smart, sustainable and inclusive growth" takes particular note of the need to support biodiversity and ecosystem services and identifies paths for sustainability across an array of traditional sectors (e.g. tourism, agriculture and rural development, fisheries, etc.). A 2013 European Council decision on the association of the overseas countries and territories with the European Union ('Overseas Association Decision') indicated that "the association should aim at ensuring the conservation, restoration and sustainable use of biological diversity and ecosystem services as a key element for the achievement of sustainable development" As an example, the annual total economic value (TEV) of the natural environment of the Caribbean Netherlands is estimated to be USD 122 million. This is the equivalent of USD 5 800 per capita of residents in the Caribbean Netherlands (Bonaire, Sint Eustatius, Saba) [9]. Healthy ecosystems such as the forests on St Eustatius, Saba's Mount Scenery, or the corals reefs of Bonaire are critical to the society of the Caribbean Netherlands.

#### Box 2 Importance of the EU overseas entities' natural capital, Bonaire case study [8]:

- 288 km2 + 6 km2 for the adjacent island of Klein Bonaire.
- 17 000 permanent inhabitants approximately.
- GDP 2012: USD 364.2 million
- TEV of ecosystem services: USD 105 million / year
- Protected area: 8 300 hectares
- Coral reefs area: 27 km2

Healthy ecosystems such as coral reefs and mangroves are critical to a small island society, such as Bonaire. According to the Economics of Ecosystems and Biodiversity (TEEB) study in the Caribbean Netherlands, the TEV of the ecosystem services provided by the marine and terrestrial ecosystems of Bonaire is USD 105 million per year. This TEV, and its underlying components, are very important for informing decision-making. The current threat of an unmanaged sewage system illustrates this as the TEV of Bonaire's nature could decrease from USD 105 million today to around USD 60 million in ten years and to less than USD 40 million in 30 years.

After extensively analysing different scenarios for future ecosystem services, the TEEB study clearly underlined that "an ounce of prevention is worth a pound of cure" and that it is more cost-efficient to prevent extensive environmental damage than trying to revitalize the environment while threats exist. The decline of several crucial ecological functions of the terrestrial ecosystems will have serious consequences for the major source of income of the island at risk: marine tourism. The study delivered these important insights to the local and national government. This allowed for greater understanding that interventions and policies are crucial in order to prevent damage to Bonaire's nature.

### Improving the knowledge base

Much is still unknown when it comes to the status and trends of Europe's overseas biodiversity and its relationship to the functioning of ecosystems and the long-term delivery of ecosystem services. In 2008, the 'Message' from the conference at Reunion Island underlined the critical need for establishing "long-term monitoring programmes as well as biological and socio-economic indicators adapted to the constraints specific to the ORs and OCTs". The current situation shows how it is difficult to analyse to what extent conservation action is sufficient to protect EU overseas biodiversity and the impact of EU policies and funds in this regard. A dedicated common set of indicators to monitor status and trends of EU overseas natural capital will be important to ensure sustainable development. Such an effort should build on ongoing activities and initiatives and should contribute to improve the effectiveness of the European policies and programmes.



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### **Related European documents**

European Commission, 2008, *Green Paper, 'Future relations between the EU and the Overseas Countries and Territories'* (COM(2008) 383 final of 25 June 2008).

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European Union, 2013, Council Decision 2013/755/EU of 25 November 2013 on the association of the overseas countries and territories with the European Union ('Overseas Association Decision') (OJ L 344, 19.12.2013, p. 1–118).

#### **Related publications**

Benzaken, D. and Renard, Y., 2011, Future Directions for Biodiversity Action in Europe Overseas: Outcomes of the Review of the Implementation of the Convention on Biological Diversity, Gland, Switzerland.

Churchyard, T., Eaton, M., Hall, J., Millett, J., Cuthbert, R. and Stringer, C., 2014, *The UK's wildlife overseas: a stocktake of nature in our Overseas Territories*, RSPB, Sandy, UK.

#### **Endnotes**

<sup>1</sup> European Environment Agency (EEA) briefing on 'The EU overseas entities and their natural capital' for the International Conference on Biodiversity and Climate Change, 22 to 25 October 2014, Guadeloupe (<a href="http://quadeloupe2014.com">http://quadeloupe2014.com</a>). This briefing is prepared by the EEA with IUCN and partners (French Committee of IUCN, RSPB, and FRC) through the EEA contract 'Technical support to EEA on biodiversity in Europe overseas' (EEA/NSV/14/005).

<sup>&</sup>lt;sup>1</sup> "Natural capital" – from fertile soil and productive land and seas to fresh water and clean air – as well as the biodiversity that supports it. Natural capital includes vital services such as pollination of plants, natural protection against flooding, and the regulation of our climate (as defined in the 7th EAP).

<sup>&</sup>lt;sup>2</sup> The conference "The European Union and its Overseas Entities: Strategies to counter Climate Change and Biodiversity Loss" took place in Reunion island from 7-11 July 2008. It was an official event organized under the aegis of the French Presidency of the European Union. The Message, adopted by conference participants, contains 21 proposals aimed at the ORs, the OCTs, and their regions of the world. It is strengthened by a portfolio of recommended actions and measures resulting from the 11 roundtables and workshops, in which more than 400 people participated.

<sup>&</sup>lt;sup>3</sup> The EEA wishes to contribute to bridging such a gap. The EEA has initiated a feasibility study on EU overseas biodiversity indicators and also foresee to publish in 2015 a report on biodiversity in EU overseas entities

<sup>&</sup>lt;sup>4</sup> The EU has nine regions that are geographically very distant from the European continent but that form integral part of the EU. The nine outermost regions are: five French overseas departments: Martinique, French Guiana, Guadeloupe, Mayotte and Réunion; one French overseas community: Saint-Martin; two Portuguese autonomous regions: the Azores and Madeira; one Spanish autonomous community: the Canary Islands. EU law (all rights and duties associated with EU membership) applies to the "outermost regions" except for the cases where there are specific measures for these regions. The ORs are part of the European Union, and therefore they are subject to the European Union Treaties and secondary Union legislation but derogation are possible taking into account their remoteness, insularity, small size, difficult topography and climate and economic dependence on a few products.

There are 25 OCTs that are not considered as part of the EU but associated to the EU according to the provisions of the Treaty on the Functioning of the European Union: Anguilla (UK), Aruba (NL), Bermuda (UK), Bonaire (NL), British Antarctic Territory (UK), British Indian Ocean Territory (UK), British Virgin Islands (UK), Cayman Islands (UK), Curação (NL), Falkland Islands (UK), French Polynesia (FR), French Southern and Antarctic Territories (FR), Greenland (DK), Montserrat (UK), New Caledonia and Dependencies (FR), Pitcairn (UK), Saba (NL), Saint Barthelemy, Sint Eustatius (NL), Sint Maarten (NL), South Georgia and South Sandwich Islands (UK), Saint Helena, Ascension Island, Tristan da Cunha (UK), St. Pierre and Miquelon (FR), Turks and Caicos Islands (UK), Wallis and Futuna Islands (FR). While their inhabitants are in principle EU citizens, the territories themselves are not part of the EU and are not subject to EU law, but are subject to special association agreements.

<sup>&</sup>lt;sup>6</sup> Denmark, France, the Netherlands, Portugal, Spain and the United Kingdom.

<sup>&</sup>lt;sup>7</sup> Selected Categories: EX – Extinct, EW – Extinct In The Wild, CR – Critically Endangered, EN – Endangered, and VU – Vulnerable

<sup>&</sup>lt;sup>8</sup> The LIFE programme is the EU's funding instrument for the environment and climate action. The general objective of LIFE is to contribute to the implementation, updating and development of EU environmental and climate policy and legislation by co-financing projects with European added value. (http://ec.europa.eu/environment/life/about/index.htm)

<sup>&</sup>lt;sup>9</sup> Directive 2008/56/EC of the European Parliament and of the Council of 17 June 2008

<sup>&</sup>lt;sup>10</sup> Council Decision 2013/755/EU of 25 November 2013 on the association of the overseas countries and territories with the European Union ('Overseas Association Decision') (OJ L 344, 19.12.2013).