



Aichi Biodiversity Target 11 Country Dossier: COSTA RICA

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GLOSSARY

AZEs Alliance for Zero Extinction sites
CEPF Critical Ecosystem Partnership Fund

EBSA Ecologically or Biologically Significant Marine Area

EEZ Exclusive Economic Zone GCF Green Climate Fund

GD-PAME Global Database on Protected Area Management Effectiveness

GEF Global Environment Facility

IBA Important Bird and Biodiversity Area

ICCAs Indigenous and Community Conserved Area Area (may also be referred to as

territories and areas conserved by Indigenous peoples and local communities or

"territories of life")

IPLC Indigenous Peoples and Local Communities

KBA Key Biodiversity Area

MEOW Marine Ecosystems of the World

MPA Marine Protected Area

NBSAP National Biodiversity Strategy and Action Plan
OECM Other Effective Area-Based Conservation Measures

PA Protected Area

PAME Protected Area Management Effectiveness

PPA Privately Protected Area

PPOW Pelagic Provinces of the World ProtConn Protected Connected land indicator

SOC Soil Organic Carbon

TEOW Terrestrial Ecosystems of the World WDPA World Database on Protected Areas

WD-OECM World Database on Other Effective Area-Based Conservation Measures

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This country dossier is compiled by the UNDP and SCBD from publicly available information. It is prepared, within the overall work of the Global Partnership on Aichi Biodiversity Target 11, for the purpose of attracting the attention of the Party concerned and other national stakeholders to facilitate the verification, correcting, and updating of country data. The statistics might differ from those reported officially by the country due to differences in methodologies and datasets used to assess protected area coverage and differences in the base maps used to measure terrestrial and marine area of a country or territory. Furthermore, the suggestions from the UNDP and SCBD are based on analyses of global datasets, which may not necessarily be representative of national policy or criteria used at the national level. The analyses are also subject to the limits inherent in global indicators (precision, reliability, underlying assumptions, etc.). Therefore, they provide useful information but cannot replace analyses at a national level nor constitute a future benchmark for national policy or decision-making.

The preparation of this dossier was generously supported by: the Government of the Federal Republic of Germany, *Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GMbH*; the European Commission; the Government of the United Kingdom of Great Britain and Northern Ireland; and the Government of Japan (Japan Biodiversity Fund). The dossier does not necessarily reflect their views.

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EXECUTIVE SUMMARY

This document provides information on the coverage of protected areas (PAs) and other effective area-based conservation measures (OECMs), as currently reported in global databases (the World Database on Protected Areas (WDPA) and World Database on Other Effective Area-Based Conservation Measures (WD-OECM)). It also includes details on the status of the other qualifying elements of Aichi Biodiversity Target 11 based on this data. These statistics might differ from those reported officially by countries due to difference in methodologies and datasets used to assess protected area coverage, differences in the base maps used to measure terrestrial and marine area of a country or territory, or if global datasets differ from the criteria and indicators used at the national level. Where available, data from national statistics for the elements of Target 11 are included alongside records from these global databases. This dossier also provides a summary of commitments made under Aichi Biodiversity Target 11, and a summary of potential opportunities regarding elements of the target for future planning.

The dossier has been developed in consultation with the UN Environment Programme World Conservation Monitoring Centre (UNEP-WCMC), which manages the WDPA, WD-OECM and Global Database on Protected Area Management Effectiveness (GD-PAME). Parties to the CBD are requested to contact protectedareas@unep-wcmc.org with any updates to the information in these databases.

Aichi Biodiversity Target 11 Elements: Current status and opportunities for action

Coverage - Terrestrial & Marine

- **Status:** as of May 2021 (per the WDPA), terrestrial coverage in Costa Rica is 14,673.3 km² (28.4%) and marine coverage is 15,720.7 km² (2.7%); Nationally reported terrestrial coverage is 25.5% and marine coverage is 2.63%.
- **Opportunities for action:** opportunities for the near-term include updating the WDPA with any unreported PAs, and the recognizing and reporting OECMs to the WD-OECM. In the future, focus on relatively intact areas, while addressing the elements in the following sections, could be considered when planning new PAs or OECMs.

Ecological Representativeness-Terrestrial & Marine

- **Status:** Costa Rica contains 8 terrestrial ecoregions, 4 marine ecoregions, and 2 pelagic provinces (all of which have at least some coverage from PAs and OECMs): the mean coverage by reported PAs and OECMs is 44.5% (terrestrial), 38.2% (marine), and 1.2% (pelagic).
- **Opportunities for action:** there is opportunity for Costa Rica to increase protection in terrestrial and marine ecoregions and pelagic provinces that have lower levels of coverage by PAs or OECMs.

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Areas Important for Biodiversity

- **Status:** Costa Rica has 26 Key Biodiversity Areas (KBAs): the mean coverage of KBAs by reported PAs and OECMs is 44.5%, while 3 KBAs have no coverage by reported PAs and OECMs.
- **Opportunities for action:** there is opportunity for Costa Rica to increase protection of KBAs, and other sites of conservation importance identified nationally, that have lower levels of coverage by PAs and OECMs; priority could be given to those with no current coverage.

Areas Important for Ecosystem Services

- **Status:** coverage of areas important for ecosystem services: In Costa Rica, 46.4% of aboveground biomass carbon, 46.0% of belowground biomass carbon, 36.2% of soil organic carbon, 2.8% of carbon stored in marine sediments is covered by PAs and OECMs.
- **Opportunities for action:** for carbon, there is opportunity for Costa Rica to increase PA and OECM coverage in both marine and terrestrial areas with high carbon stocks, as identified in the map above. Protecting areas with high carbon stocks secures the benefits of carbon sequestration in the area.
- For water, there is opportunity to increase the area of the water catchment under protection by PAs and OECMs, or in cases where there is high levels of protection, focus on effective management for these areas. Protecting the current area of forested land and potentially reforesting would have benefits for improving water security.

Connectivity and Integration

- **Status:** coverage of protected-connected lands is 17.9%. Costa Rica has 51 officially established biological corridors covering over 38% of the country's land area.
- Opportunities for action: there is opportunity to focus on PA, OECM, and biological corridor management for enhancing and maintaining connectivity. Improving connectivity increases the effectiveness of PAs and OECMs and reduces the impacts of fragmentation.
- As well, a range of suggested steps for enhancing and supporting integration are included in the voluntary guidance on the integration of PAs and OECMs into the wider land- and seascapes and mainstreaming across sectors to contribute, inter alia, to the SDGs (Annex I of COP Decision 14/8).

Governance Diversity

- **Status:** the most common governance type(s) for reported PAs in Costa Rica is: 81.2% under Government (Federal or national ministry or agency).
- **Opportunities for action:** explore opportunities for governance types that have lower representation, for Costa Rica this could relate to governance by Indigenous Peoples and/or local communities (IPLC) and shared governance.

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• There is also opportunity for Costa Rica to complete governance and equity assessments, to establish baselines and identify relevant actions for improvement. As well, a range of suggested actions are included in the voluntary guidance on effective governance models for management of protected areas, including equity (Annex II of COP Decision 14/8).

Protected Area Management Effectiveness

- **Status:** 74.7% of terrestrial PAs and 95.2% of marine PAs have completed Protected Area Management Effectiveness (PAME) assessments reported.
- **Opportunities for action:** the 60% target for completed management effectiveness assessments (per COP Decision X/31) **has** been met for terrestrial PAs and **has** been met for marine PAs. There is opportunity to implement the results of completed PAME evaluations, to improve the quality of management for existing PAs and OECMs (e.g. through adaptive management and information sharing, increasing the number of sites reporting 'sound management') and to increase reporting of biodiversity outcomes in PAs and OECMs.

INTRODUCTION

The Strategic Plan for Biodiversity 2011-2020 was adopted at the tenth meeting of the Conference of the Parties (COP) to the Convention on Biological Diversity (CBD) held in Nagoya, Aichi Prefecture, Japan from 18-29 October 2010. The vision of the Strategic Plan is one of "Living in harmony with nature" where "By 2050, biodiversity is valued, conserved, restored and wisely used, maintaining ecosystem services, sustaining a healthy planet and delivering benefits essential for all people" (CBD, 2010). In addition to this vision, the Strategic Plan is composed of 20 targets, under five strategic goals. Aichi Biodiversity Target 11 states that "By 2020, at least 17 per cent of terrestrial and inland water, and 10 per cent 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 landscapes and seascapes."

With the conclusion of the Aichi Biodiversity Targets in 2020, Target 11 on area-based conservation has seen success in the expansion of the global network of protected areas (PA) and other effective area-based conservation measures (OECMs). The negotiation of the post-2020 Global Biodiversity Framework (GBF) and its future targets provide an essential opportunity to further improve the coverage of PAs and OECMs, to improve other aspects of area-based conservation, to accelerate progress on biodiversity conservation more broadly, while also addressing climate change, and the Sustainable Development Goals. This next set of global biodiversity targets are to be adopted at the fifteenth meeting of the Conference of the Parties to the Convention on Biological Diversity. These new targets must aim to build upon lessons learned from the last decade of progress to deliver transformative change for the benefit of nature and people, to realize the 2050 Vision for biodiversity.

The United Nations Development Programme (UNDP) and the Secretariat of the Convention on Biological Diversity have developed the Aichi Biodiversity Target 11 Country Dossiers, which provide countries with an overview of the status of Target 11 elements, opportunities for action, and a summary of commitments made by Parties over the last decade. Each dossier can support countries in assessing their progress on key elements of Aichi Biodiversity Target 11 and identifying opportunities to prioritize new protected areas and OECMs.

This dossier provides an overview of area-based conservation in Costa Rica. Section I of the dossier presents data on the current status of Costa Rica's PAs and OECMs. The data presented in Section I relates to each element of Target 11. Section I also presents the PA and OECM coverage for two critical ecosystem services: water security and carbon stocks. In addition, the dossier presents potential opportunities for action for Costa Rica, in relation to each Target 11 element. The analyses present options for improving Costa Rica's area-based conservation network to achieve enhanced protection and benefits for livelihoods and climate change. Section II presents details on Costa Rica's existing PA and OECM commitments as a summary of existing efforts towards achieving Target 11. This gives focus not only to national policy and actions but also voluntary commitments to the

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UN. Furthermore, where data is available, this dossier provides information on potential OECMs, Indigenous and Community Conserved Areas (ICCAs; also, often referred to as territories and areas conserved by Indigenous peoples and local communities or "territories of life") and Privately Protected Areas (PPAs) and the potential contribution they will have in achieving the post-2020 targets.

The information on PAs and OECMs presented here is derived from the World Database on Protected Areas (WDPA) and World Database on Other Effective Area-Based Conservation Measures (WD-OECM). These databases are joint products of UNEP and IUCN, managed by UNEP-WCMC, and can be viewed and downloaded at www.protectedplanet.net. Parties are encouraged to provide data on their PAs and OECMs to UNEP-WCMC for incorporation into the databases (see e.g., Decisions 10/31 and 14/8). The significant efforts of Parties in updating their data in the build up to the publication of the Protected Planet Report 2020 (UNEP-WCMC and IUCN, 2021) were greatly appreciated. UNEP-WCMC welcomes further updates, following the data standards described here (www.wcmc.io/WDPA_Manual), and these should be directed to protectedareas@unep-wcmc.org. The statistics presented in this dossier are derived from the May 2021 WDPA and WD-OECM releases, unless explicitly stated otherwise. Readers should consult www.protectedplanet.net for the latest coverage statistics (updated monthly).

Some data from the WDPA and WD-OECM are not made publicly available at the request of the data-provider. This affects some statistics, maps, and figures presented in this dossier. Statistics provided by UNEP-WCMC (terrestrial and marine coverage) are based upon the full dataset, including restricted data. All other statistics, maps, and figures are based upon the subset of the data that is publicly available.

Where data is less readily available, such as for potential OECMs, ICCAs and PPAs, data has also been compiled from published reports and scientific literature to provide greater awareness of these less commonly recorded aspects. These data are provided to highlight the need for comprehensive reporting on these areas to the WDPA and/or WD-OECM. Parties are invited to work with indigenous peoples, local communities and private actors to submit data under the governance of these actors, with their consent, to the WDPA and/or WD-OECM.

Overall, PAs and OECMs are essential instruments for biodiversity conservation and to sustain essential ecosystem services that support human well-being and sustainable development, including food, medicine, and water security, as well as climate change mitigation and adaptation and disaster risk reduction. The data in this dossier, therefore, aims to celebrate the current contributions of PAs and OECMs, whilst the gaps presented hope to encourage greater progress, not just for the benefit of biodiversity and the post-2020 GBF, but also to recognize the essential role of PAs and OECMs to the Sustainable Development Goals and for addressing the climate crisis.

SECTION I: CURRENT STATUS

Aichi Biodiversity Target 11 refers to both protected areas (PAs) and other effective areabased conservation measures (OECMs). This section provides the current status for all elements of Aichi Biodiversity Target 11 where indicators with global data are available. Statistics for all elements are presented using data on both PAs and OECMs (where this data is available and reported in global databases like the WDPA and WD-OECM). It is recognized that statistics reported in the WPDA and WD-OECM might differ from those reported officially by countries due to differences in methodologies and datasets used to assess protected area coverage and differences in the base maps used to measure terrestrial and marine area of a country or territory. Details on UNEP-WCMC's methods for calculating PA and OECM coverage area available here. The global indicators adopted here for presenting the status of other elements of Target 11 may also differ from those in use nationally. Where available, results from national reporting are also included.

COVERAGE - TERRESTRIAL & MARINE

As of May 2021, Costa Rica has 164 protected areas reported in the World Database on Protected Areas (WDPA). 4 proposed PAs, and a further 3 UNESCO-MAB Biosphere Reserves, are not included in the following statistics (see details on UNWP-WCMC's methods for calculating PA and OECM coverage here).

As of May 2021, Costa Rica has **0** OECMs reported in the world database on OECMs (WD-OECM).

Current coverage for Costa Rica (per the WDPA):

- 28.4% terrestrial (143 protected areas, 14,673.3 km²)
- 2.7% marine (30 protected areas, 15,720.7 km²)

Currently, Costa Rica has 149 terrestrial and marine protected areas officially recognized by SINAC (National System of Conservation Areas).

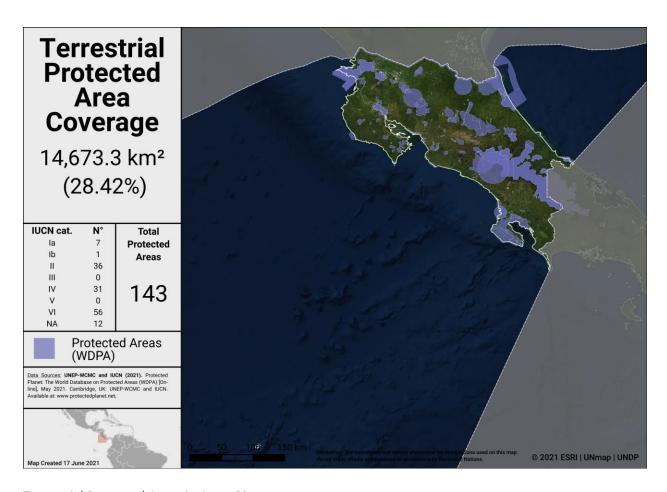
Nationally reported terrestrial coverage is 25.5% (only those private PAs that are up to date with their official files according to the regulations in force in the country are included)

Nationally reported marine coverage is 2.63% (this percentage includes the marine portions of National Parks, Wildlife Refuges, Marine Management Areas, Biological Reserves, Wetlands and Absolute Natural Reserves)

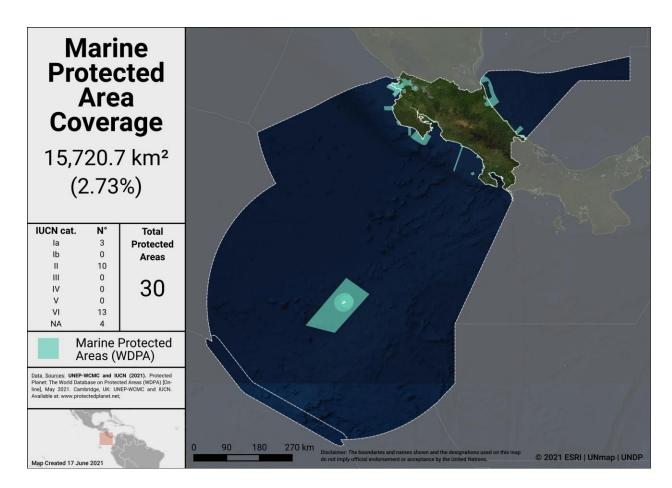
It is important to note that the official layer of terrestrial and marine protected areas of the country is updated annually in the month of August of each year.¹

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¹ For additional info see: sinac.go.cr



Terrestrial Protected Areas in Costa Rica



Marine Protected Areas in Costa Rica

Potential OECMs

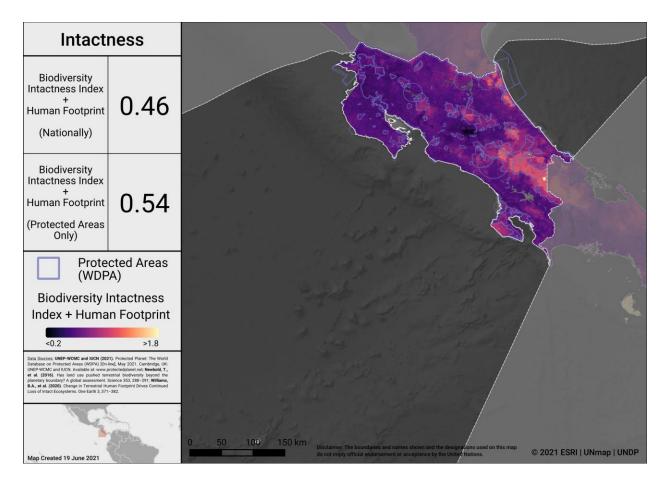
The inclusion of the network of biological corridors officially established in the country, which amounts to more than 38% of the country's land cover, has been considered. There are currently 51 biological corridors identified and characterized in the country. In a second moment, which requires more time and negotiation, it has been thought to count the indigenous territories of the country as possible OECM's, following the established procedure, however, this is an incipient possibility at this time that requires more analysis for its institutional approach.

Regarding the marine surface, the possibility of including responsible fishing marine areas (AMPR) has been analyzed; however, it is necessary to review in detail the criteria of the OECM's and thus assess their viability in the long term.

The country is currently working on the technical and legal review, in order to implement the conservation figure (OECM) in a viable way and thus be added to the national accounting in its efforts to increase the coverage percentages committed by the country before CBD on both surfaces (terrestrial and marine).

Opportunities for action

Opportunities for the near-term include updating the WDPA with any unreported PAs, and the recognizing and reporting OECMs to the WD-OECM. In the future, as Costa Rica considers where to add new PAs and OECMs, the map below identifies areas in Costa Rica where intact terrestrial areas are not currently protected. Focus on relatively intact areas, while addressing the elements in the following sections, could be considered when planning new PAs or OECMs.



Intactness in Costa Rica

To explore more on intactness, and to better view unprotected intact areas, visit the UN Biodiversity Lab to explore the data in more detail: map.unbiodiversitylab.org.

ECOLOGICAL REPRESENTATIVENESS – TERRESTRIAL & MARINE

Ecological representativeness, globally, is assessed based on the PAs and OECMs coverage of broad-scale biogeographic units. Globally, ecoregions have been described for terrestrial areas (Dinerstein et al, 2017), marine coastal and shelf ecosystems (to a depth of 200m; Spalding et al 2007) and surface pelagic waters (Spalding et al 2012).

Costa Rica has 8 **terrestrial** ecoregions. Out of these:

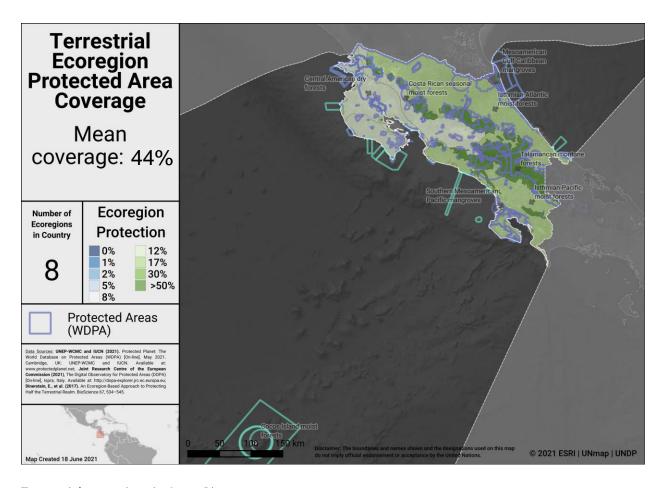
- All 8 ecoregions have at least some coverage from PAs and OECMs.
- 6 ecoregions have at least 17% protected within the country.
- The average coverage of terrestrial ecoregions is 44.5%.

Costa Rica has 4 **marine** ecoregions and 2 **pelagic provinces**. Out of these:

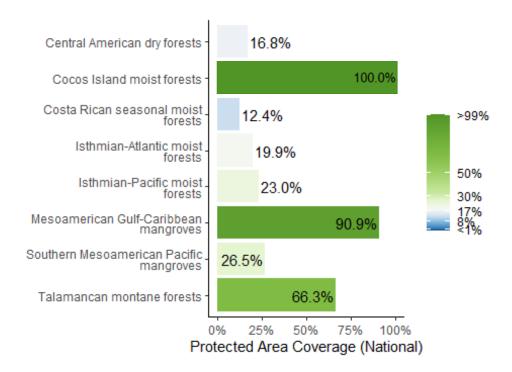
- All 4 marine ecoregions and 2 pelagic provinces have at least some coverage from reported PAs and OECMs.
- 4 marine ecoregions and 0 pelagic provinces have at least 10% protected within Costa Rica's exclusive economic zone (EEZ).
- The average coverage of marine ecoregions is 38.2% and the average coverage of pelagic provinces is 1.2%.

A full list of terrestrial ecoregions in Costa Rica is available in Annex I.

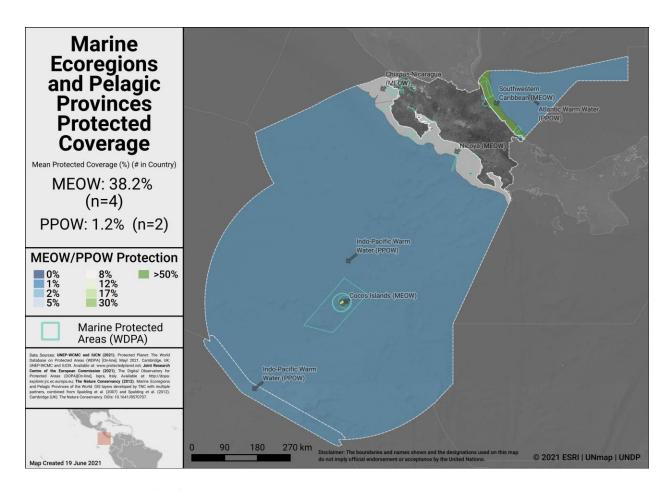
For this element, it is important to indicate that Costa Rica's efforts have focused on improving the ecological representativeness of its identified areas on land and sea surfaces through technical and scientific studies that have already been prepared over time.



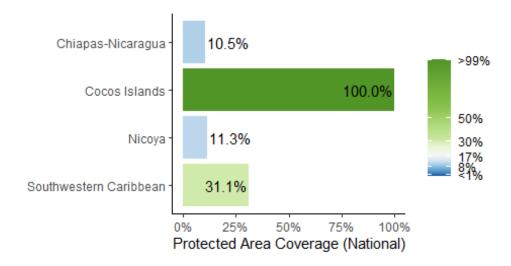
Terrestrial ecoregions in Costa Rica



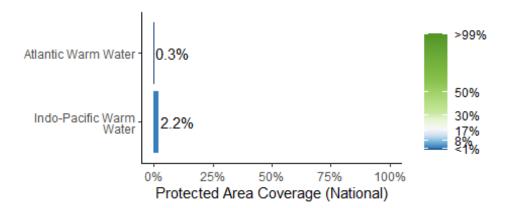
Terrestrial ecoregions of the World (TEOW) in Costa Rica



Marine ecoregions and pelagic provinces



Marine Ecoregions of the World (MEOW) in Costa Rica:



Pelagic Provinces of the World (PPOW) in Costa Rica:

Opportunities for action

There is opportunity for Costa Rica to increase protection in terrestrial and marine ecoregions and pelagic provinces that have lower levels of coverage by PAs or OECMs.

AREAS IMPORTANT FOR BIODIVERSITY

Key Biodiversity Areas (KBAs)

Protected area and OECM coverage of Key Biodiversity Areas (KBAs) provide one proxy for assessing the conservation of areas important for biodiversity at national, regional and global scales. KBAs are sites that make significant contributions to the global persistence of biodiversity (IUCN, 2016). The KBA concept builds on four decades of efforts to identify important sites for biodiversity, including Important Bird and Biodiversity Areas, Alliance for Zero Extinction sites, and KBAs identified through Hotspot ecosystem profiles supported by the Critical Ecosystem Partnership Fund. Incorporating these sites, the dataset of internationally significant KBAs includes Global KBAs (sites shown to meet one or more of 11 criteria in the Global Standard for the Identification of KBAs, clustered into five categories: threatened biodiversity; geographically restricted biodiversity; ecological integrity; biological processes; and irreplaceability), Regional KBAs (sites identified using pre-existing criteria and thresholds, that do not meet the Global KBA criteria based on existing information), and KBAs whose Global/Regional status is Not yet determined, but which will be assessed against the global KBA criteria within 8-12 years. Regional KBAs are often of critical international policy relevance (e.g., in EU legislation and under the Ramsar Convention on Wetlands), and many are likely to qualify as Global KBAs in future once assessed for their biodiversity importance for other taxonomic groups and ecosystems. To date, nearly 16,000 KBAs have identified globally, and information on each of these is presented in the World Database of Key Biodiversity Areas: www.keybiodiversityareas.org.

Costa Rica has 27 Key Biodiversity Areas (KBAs) [26 KBAs included in analysis]

- Mean percent coverage of all KBAs by PAs and OECMs in Costa Rica is **44.5%**.
- **1** KBAs have full (>98%) coverage by PAs and OECMs.
- **22** KBAs have partial coverage by PAs and OECMs.
- **3** KBAs have no (<2%) coverage by PAs and OECMs.
- 1 KBA lacks spatial data to allow PA and OECM coverage to be determined

Ecologically or Biologically Significant Marine Areas (EBSAs)

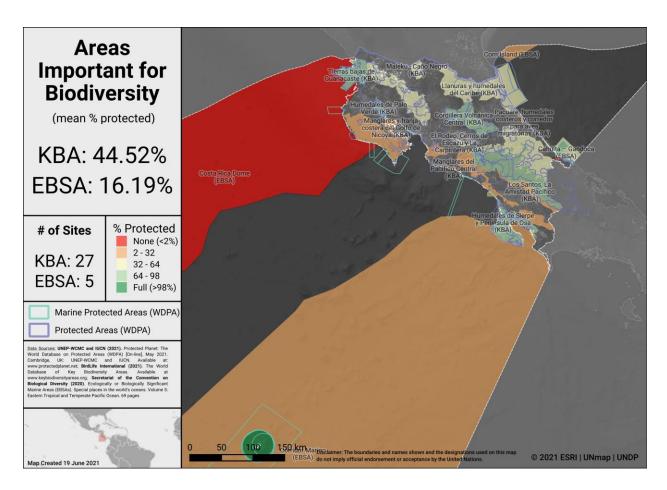
Other important areas for biodiversity may also include Ecologically or Biologically Significant Marine Areas (EBSAs), which were identified following the scientific criteria adopted at COP-9 (Decision IX/20; see more at: https://www.cbd.int/ebsa/). Sites that meet the EBSA criteria may require enhanced conservation and management measures; this could be achieved through means including MPAs, OECMs, marine spatial planning, and impact assessment.

There are 5 EBSAs with some portion of their extent within Costa Rica's EEZ, of which 2 EBSAs have no coverage from PAs or OECMs

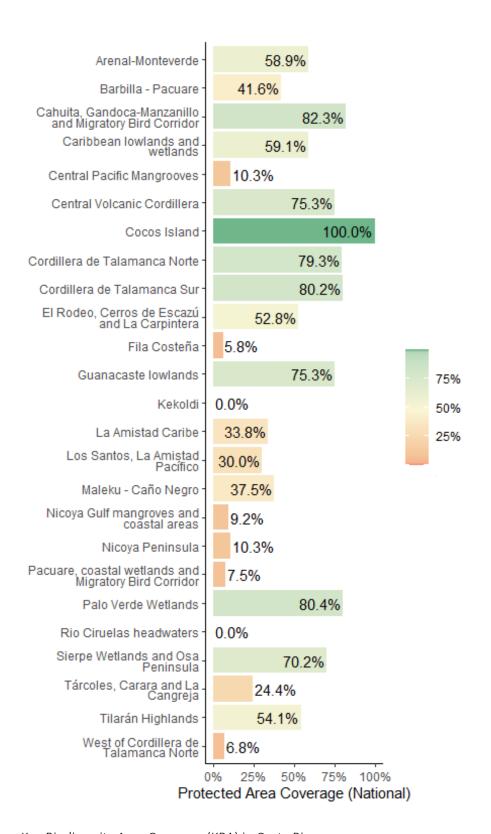
Other details:

Costa Rica notes that the areas of importance for the country's terrestrial and marine biodiversity have been identified and well documented, however, progress has not been made towards the creation of new PAs or conservation strategies such as (OECMs), given that the consultation processes with the actors involved are extensive and require a comprehensive approach, in order to meet the sustainability requirements implicit in this type of national initiatives.

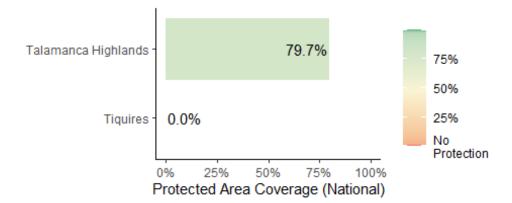
It is important to indicate that for this element of Target 11, Costa Rica follows up on the fulfillment of the sites of importance for conservation (SIcOS; *sitios de importancia para la conservación*) identified through the project: *Proposal of Territorial Planning for the conservation of the biodiversity of Costa Rica* (GRUAS I and II) that identifies the SICs.



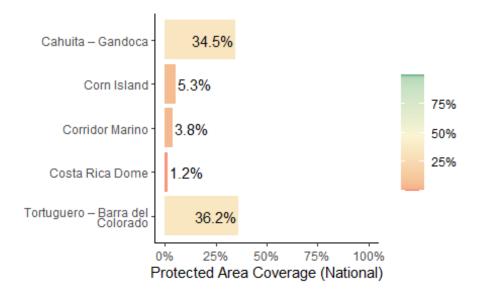
Areas Important for Biodiversity in Costa Rica



Key Biodiversity Area Coverage (KBA) in Costa Rica



Key Biodiversity Area Coverage (KBA) in Costa Rica



Ecologically or Biologically Significant Marine Areas (EBSAs) in Costa Rica

Opportunities for action

There is opportunity for Costa Rica to increase protection of KBAs, and other sites of conservation importance identified nationally, that have lower levels of coverage by PAs and OECMs; priority could be given to those with no current coverage

AREAS IMPORTANT FOR ECOSYSTEM SERVICES

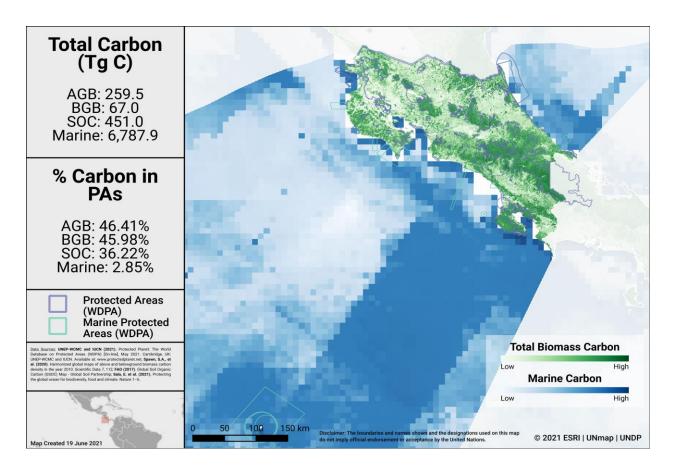
There is no single indicator identified for assessing the conservation of areas important for ecosystem services. For simplicity, two services with available global datasets are assessed here (carbon and water). In future, other critical ecosystem services could be explored.

Currently in Costa Rica, through the National System of Conservation Areas (SINAC), work is being done on a national strategy for the identification, economic valuation and generation of economic mechanisms for Ecosystem Services. Likewise, through the update of the national forest inventory to begin in 2022, it is planned to define with more precision in the field the percentages of carbon present in vegetation, terrestrial biomass and soil

Carbon

Data for biomass carbon comes from temporally consistent and harmonized global maps of aboveground biomass and belowground biomass carbon density (at a 300-m spatial resolution); the maps integrate land-cover specific, remotely sensed data, and land-cover specific empirical models (see Spawn et al., 2020 for details on methodology). The Global Soil Organic Carbon Map present an estimation of SOC stock from 0 to 30 cm (see FAO, 2017). Data is also presented from global maps of marine sedimentary carbon stocks, standardized to a 1-meter depth (see Sala et al., 2021, and Atwood et al., 2020).

The map below presents the total carbon stocks in Costa Rica and the percent of carbon in protected areas. The total carbon stocks is 259.5 Tg C from aboveground biomass (AGB), with 46.4% in protected areas; 67.0 Tg C from below ground biomass (BGB), with 46.0% in protected areas; 451.0 Tg C from soil organic carbon (SOC), with 36.2% in protected areas; and 6,787.9 Tg C from marine sediment carbon, with 2.8% in protected areas.



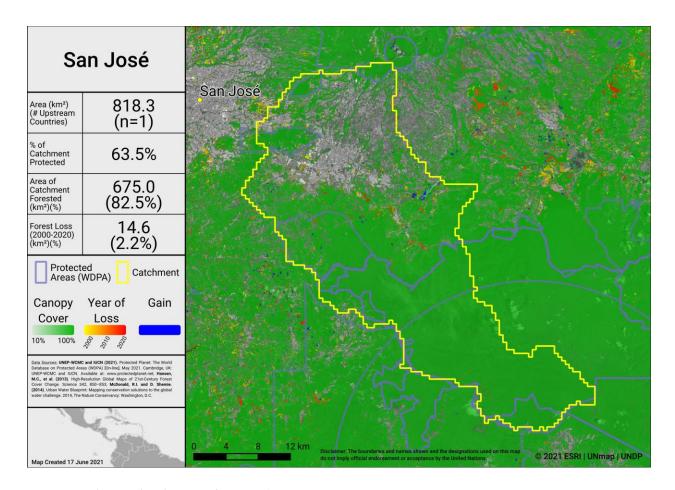
Carbon Stocks in Costa Rica

Water

Information on the water sources for 534 cities is available via the City Water Map (CWM) and provides details on the catchment area of the watershed that supplies these cities (see McDonald et al., 2014 for details on methodology).

Forests support stormwater management and clean water availability, especially for large urban populations. Research that has examined the role of forests for city drinking water supplies shows that of the world's 105 largest cities, more than 30% (33 cities) rely heavily on the local protected forests, which provide ecosystem services that underpin local drinking water availability and quality (Dudley & Stolton, 2003).

Drinking water supplies for cities in Costa Rica may similarly depend on protected forest areas within and around water catchments. The map below shows the percentage forest and PA cover and the forest loss from 2000-2020 in the most heavily populated water catchment of Costa Rica. Intact catchments can support more consistent water supply and improved water quality.



Water supply area for the city of San José

Opportunities for action

For carbon, there is opportunity for Costa Rica to increase PA and OECM coverage in both marine and terrestrial areas with high carbon stocks, as identified in the map above. Protecting areas with high carbon stocks secures the benefits of carbon sequestration in the area.

For water, there is opportunity to increase the area of the water catchment under protection by PAs and OECMs, or in cases where there is high levels of protection, focus on effective management for these areas. Protecting the current area of forested land and potentially reforesting would have benefits for improving water security.

CONNECTIVITY & INTEGRATION

Two global indicators, the Protected Connected land indicator (ProtConn; EC-JRC, 2021; Saura et al., 2018) and the PARC-Connectedness indicator (CSIRO, 2019), have been proposed for assessing the terrestrial connectivity of PA and OECM networks. To date there is no global indicator for assessing marine connectivity, though some recent developments include proposed guidance for the treatment of connectivity in the planning and management of MPAs (see Lausche et al., 2021).

Protected Connected Land Indicator (Prot-Conn)

As of January 2021, as reported in the Joint Research Centre of the European Commission's Digital Observatory for Protected Areas (DOPA) (JRC, 2021), the coverage of protected-connected lands (a measure of the connectivity of terrestrial protected area networks, assessed using the ProtConn indicator) in Costa Rica was 17.9%.²

PARC-Connectedness Index

In 2019, as assessed using the PARC-Connectedness Index (values ranging from 0-1, indicating low to high connectivity), connectivity in Costa Rica is 0.56.³ This represents no significant change since 2010.

Corridor case studies

The country has 51 officially established biological corridors that cover a little more than 38% of the country's land area (almost 20,000 km²). Of the 51 current biological corridors, 40 of them have a local monitoring committee and 24 corridors have a current planning instrument for their technical monitoring over time. By 2019, the institutional instrument that evaluates⁴ the effectiveness of management was applied in 15 biological corridors.

Below are details from case studies on corridors and connectivity in Costa Rica:

Case study title	Type of study region	Greatest threat to connectivity	Approaches to conserving ecological corridors
Connectivity, ecosystem services and Nature-based Solutions in land-use planning in Costa Rica	terrestrial,	human	municipal land
	rural	development	management plans

² Indicator does not currently include the coverage of biological corridors, which are not currently reported in the WDPA (corridors may in future be considered for inclusion as OECMs – see above) ³ Indicator does not directly include the coverage of biological corridors, which are not currently reported in the WDPA, though it does account for the role of intact ecosystems in maintaining connectivity (see details for indicator here)

⁴ In Costa Rica, biological corridors are evaluated based on elements such as: structure, composition and ecological functionality mainly.

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Case study title	Type of study region	Greatest threat to connectivity	Approaches to conserving ecological corridors
The Jaguar Corridor Initiative: A rangewide species conservation strategy	terrestrial, rural	human land-use changes	 modelled ecological corridors prioritised populations and ecological corridors validated modelled corridors using a rapid assessment interviewbased methodology varied implementation action at local level

Further details are available in Hilty et al 2020.

Opportunities for action

There is opportunity to focus on PA, OECM, and biological corridor management for enhancing and maintaining connectivity. Improving connectivity increases the effectiveness of PAs and OECMs and reduces the impacts of fragmentation.

As well, a range of suggested steps for enhancing and supporting integration are included in the voluntary guidance on the integration of PAs and OECMs into the wider land- and seascapes and mainstreaming across sectors to contribute, inter alia, to the SDGs (Annex I of COP Decision 14/8)

GOVERNANCE DIVERSITY

There is a lack of comprehensive global data on governance quality and equity in PAs and OECMs. Here, we provide data on the diversity of governance types for reported PAs and OECMs.

As of May 2021, PAs in Costa Rica reported in the WDPA have the following governance types:

- 81.2% are governed by **governments** (by federal or national ministry or agency)
- 0.6% are under **shared** governance (by joint governance)
- 7.3% are under **private** governance (by individual landowners)
- 0.0% are under **IPLC** governance
 - 0.0% by Indigenous Peoples
 - 0.0% by local communities
- 10.9% **do not** report a governance type
 - (All of which are international designations)

OECMs

As of May 2021, there are **0** OECMs in Costa Rica reported in the WD-OECM, therefore there is no data available on OECM governance types.

Privately Protected Areas (PPAs)

From Gloss et al. (2019), a UNDP study on PPA data for Costa Rica:

- PPAs registered within the national park system, which comprise 572,099 ha.
- PPAs **are** formally defined in PA legislation.
- PPAs are directly identified in Costa Rica's recent NBSAP.
- PPAs **are** included as part of the current PA network.

See full details in Costa Rica's country profile and summarized in Annex II.

Territories and areas conserved by Indigenous Peoples and local communities (ICCAs)

From Kothari et al. (2012) potential ICCAs (or similar designation) in Costa Rica include:

- 22 Indigenous reserves; and 24 Indigenous territories
- These cover a total of 3,344.0 km².
- This ICCA figure does not include many unrecognized sites, and many PAs overlap Indigenous territories.

Other Indigenous lands

Lands managed and/or controlled by Indigenous Peoples cover an area of $5,961.0~\rm km^2$, of which $4,203.0~\rm km^2$ falls outside of formal protected areas. Indigenous lands with a human

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footprint less than 4 (considered as 'natural landscapes') cover an area of 1,019.0 km² (for details on analysis see Garnett et al., 2018).

For Costa Rica, evidence for the presence of Indigenous Peoples comes from: Indigenous Work Group on Indigenous Affairs. Indigenous World 2017 (Indigenous Working Group on Indigenous Affairs, 2017).

Boundaries of the lands Indigenous Peoples manage or have tenure rights over come from: International Union for Conservation of Nature. Map of Indigenous Peoples, protected areas and natural ecosystems of Central America.

http://www.burness.com/pressrooms/iucn-map-briefing/ (2015).

Opportunities for action

Explore opportunities for governance types that have lower representation, for Costa Rica this could relate to governance by Indigenous Peoples and/or local communities (IPLC) and shared governance.

There is also opportunity for Costa Rica to complete governance and equity assessments, to establish baselines and identify relevant actions for improvement. Examples of existing tools and methodologies include: Governance Assessment for Protected and Conserved Areas (Franks & Brooker, 2018), Social Assessment of Protected Areas (Franks et al 2018), and Site-level assessment of governance and equity (IIED, 2020). As well, a range of suggested actions are included in the voluntary guidance on effective governance models for management of protected areas, including equity (Annex II of COP Decision 14/8).

Equator Prize Projects

The Equator Initiative brings together the United Nations, governments, civil society, businesses and grassroots organizations to recognize and advance local sustainable development solutions for people, nature and resilient communities.

The Equator Prize projects provide examples of unique and locally based governance of natural resources. Costa Rica has the following Equator Prize winners that showcase examples of local, sustainable community action:

Organization	Year	Project Description
Fundación Pro Reserva Forestal Monte Alto	2004	Responding to local deforestation pressures on the area surrounding the headwaters of the Nosara River, a source of drinking water and of wellbeing for the inhabitants of the small town of Hojancha in the central highlands of the Nicoya peninsula, local farmers came together in 1994 to enhance local forest conservation and create the co-managed Monte Alto Protected Zone. This 924-hectare area was created by acquiring land for natural regeneration or reforestation. A co-management agreement with the Costa Rican Ministry of Environment ensures local participation in the area's management decisions. Fundación Pro Reserva Forestal Monte Alto (Foundation for Monte Alto Forest Reserve) continues to use monthly contributions from its member farmers to purchase additional land parcels, adding to the forest reserve area. Alternative incomegenerating activities such as ecotourism have helped to decrease reliance on clearing forest for cultivation for the community's 7,250 residents.



Photo from Equator Prize Project: Fundación Pro Reserva Forestal Monte Alto

PROTECTED AREA MANAGEMENT EFFECTIVENESS

This section provides information on the coverage of PAs and OECMs with completed protected area management effectiveness (PAME) assessments as reported in the global database (GD-PAME). The proportion of terrestrial and marine PAs with completed PAME assessments is also calculated and compared with the 60% target agreed to in COP-10 Decision X/31. Information is also included regarding changes in forest cover nationally within PAs and OECMs.

Protected area management effectiveness (PAME) assessments

Costa Rica's official instrument for PAME assesses three areas of management, related to: Social aspects, Administrative aspects, and Natural and Cultural Resources. To do so, 19 indicators have been defined, which are evaluated annually.

It should be noted that the country applies available national instruments to measure this element of Target 11, it is already very difficult to have a single regional or global instrument that meets all the requirements of the countries in this matter.

As of September 2021, Costa Rica has 165 PAs reported in the WDPA; of these PAs, 87 (52.7%) have management effectiveness evaluations reported in the global database on protected area management effectiveness (GD-PAME).

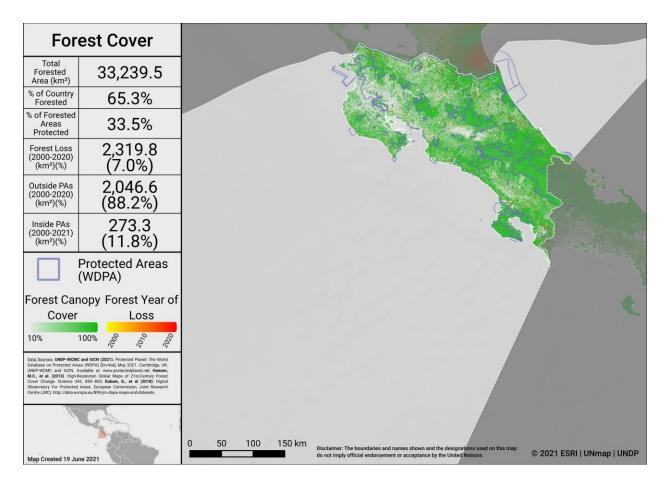
- 21.24% (10,966 km²) of the terrestrial area of the country is covered by PAs with completed management effectiveness evaluations.
 - 74.7% of the area of terrestrial PAs have completed evaluations.
- 2.6% (14,961 km²) of the marine area of the country is covered by PAs with completed management effectiveness evaluations.
 - 95.2% of the area of marine PAs have completed evaluations.

The 60% target for completed management effectiveness assessments (per COP Decision X/31) **has** been met for terrestrial PAs and **has** been met for marine PAs.

As of May 2021, there are 0 OECMs in Costa Rica reported in the WD-OECM and no information available on the management effectiveness of potential OECMs.

Changes in forest cover in protected areas and OECMs

Forested areas in Costa Rica cover approximately 65.3% of the country, an area of 33,239.5 km². Approximately 33.5% (11,147.3 km²) of this is within the protected area estate of Costa Rica. Over the period 2000-2020 loss of forest cover amounted to over 2,319.8 km², or 4.5% of the country (7.0% of forest area), of which 273.3 km² (11.8% of forest loss) occurred within protected areas. The map below shows how forest cover has changed in Costa Rica from 2000-2020 both inside and outside of PAs. This can indicate how effective PAs are in reducing forest cover loss.



Forest Cover and Forest Loss in Costa Rica

Opportunities for action

The 60% target for completed management effectiveness assessments (per COP Decision X/31) **has** been met for terrestrial PAs and **has** been met for marine PAs. There is opportunity to implement the results of completed PAME evaluations, to improve the quality of management for existing PAs and OECMs (e.g. through adaptive management and information sharing, increasing the number of sites reporting 'sound management') and to increase reporting of biodiversity outcomes in PAs and OECMs.

SECTION II: EXISTING PROTECTED AREA AND OECM COMMITMENTS

PRIORITY ACTIONS FROM 2015-2016 REGIONAL WORKSHOPS

National priority actions for Aichi Biodiversity Target 11 were provided by Parties following a series of regional workshops in 2015 and 2016. The Capacity-building workshop for Latin America and the Caribbean on achieving Aichi Biodiversity Targets 11 and 12 took place 28 September - 1 October 2015 in Curitiba, Paraná, Brazil. Progress towards the quantitative targets for marine and terrestrial coverage has been assessed based on data reported in the WDPA and WD-OECM as of 2021. For more information, see the workshop report at: https://www.cbd.int/meetings/

The following actions were identified during the workshops:

Terrestrial coverage: increase by 0.5% terrestrial protected areas 2016-2020

Marine coverage: Increase by 1.4% marine protection 2016-2020

Ecological representation: Increase terrestrial (0.5%) and marine (1.4%) protection - Priority will be given to state properties not occupied.

Areas Important for biodiversity and ecosystem services: No actions were identified for this element of Target 11.

Connectivity:

- 1) By 2020 50% of biological corridors have strategic plans and use effective management tools
- 2) By 2020 creation of terrestrial ecological corridors.

Management effectiveness:

- 1) By 2020 70% of national PAs use management effectiveness tools
- 2) Implementation of a conservation monitoring system, to improve the management in the national system of protected areas
- 3) Implementation of a strategy and priority actions to reduce biodiversity threats in the national system of protected areas.

Governance and Equity: Recognize different forms of governance in protected wilderness areas and will have at least 10% of those with legally recognized and effective functioning governance mechanisms.

Integration: By 2020 define territorial planning and have at least 3 tools, methodology or process to improve biodiversity management in protected areas.

NATIONAL BIODIVERSITY STRATEGY AND ACTION PLANS (NBSAPs)

Costa Rica has submitted an NBSAP during the Strategic Plan for Biodiversity 2011-2020 (most recent NBSAP is available at: https://www.cbd.int/nbsap/search/).

This NBSAP did include a quantitative target for terrestrial PAs or OECMs.

Axis 1. Improve the conditions and resilience of biodiversity, safeguarding the integrity of ecosystems, species and genetic diversity. 1. On-site preservation: sustainability and connectivity - resilience of National ASP System: 1. By 2025, the protected wilderness system will have been consolidated and expanded, and the effectiveness of its management, investment and financial sustainability will be improved. 2. By 2025, the resilience of biodiversity is enhanced through the connectivity of ecosystems and climate refuges. Short term goal: By 2020, the system of state protected areas will be expanded to 0.5% of ecological representation (SICO), in inland and terrestrial water ecosystems.

As of May 2021 (based on the WDPA/WD-OECM) has the target been met: YES

This NBSAP **did** include a quantitative target for **marine** protected areas or OECMs.

By 2020, Costa Rica will increase the protection of its coastal marine ecosystems, up to 4% of the EEZ

- As of May 2021 (based on the WDPA/WD-OECM) has the target been met: NO
- Accounting for other projects, actions and commitments, if this target is met, coverage in the country will increase by >7,000 km².

APPROVED GEF-5, GEF-6, & GCF PROTECTED AREA PROJECTS

Approved GEF-5 and GEF-6 PA-related biodiversity projects

This includes biodiversity projects from the fifth and sixth replenishment of the Global Environment Facility (GEF-5 and GEF-6) with a clear impact of the quantity or quality of PAs; also including some projects occurring within the wider landscapes/seascapes around PAs. Only those with a status of 'project approved' or 'concept approved' as of June 2019 were considered. The qualifying elements likely benefiting from each GEF project is assessed based on a keyword search of Project Identification Forms (PIF). Where spatial data for the proposed PAs was available, further details (based on an analysis by UNDP) regarding their impacts for ecological representation, coverage of KBAs, and coverage of areas important for carbon storage is included.

GEF ID	PA increase?	Area to be added (km²)	Type of new protected area	Qualitative elements potentially benefitting (based on keyword search of PIFs)
4857	No	N/A	N/A	Effectively managed; Equitably managed
4382	No	N/A	N/A	All Qualitative Elements
4836	Yes	5,590 420	Terrestrial Marine	Areas important for biodiversity; Effectively managed; Equitably managed; Integration
4852	No	N/A	N/A	All except Equitably managed and Connectivity
9088	No	N/A	N/A	All except Ecologically representative and Areas important for biodiversity
9416	No	N/A	N/A	All except Ecologically representative

Based on spatial data available for GEF project 4836, benefits will arise for several elements of Target 11:

Coverage of Terrestrial and Marine Ecoregions:

- 7 Terrestrial Ecoregions will have improved coverage: Central American dry forests; Costa Rican seasonal moist forests; Isthmian-Atlantic moist forests; Isthmian-Pacific moist forests; Mesoamerican Gulf-Caribbean mangroves; Southern Mesoamerican Pacific mangroves; Talamancan montane forests.
 - The average increase in coverage of Terrestrial Ecoregions will be 2.75%.

- 3 Marine Ecoregions will have improved coverage: Chiapas-Nicaragua; Nicoya; Southwestern Caribbean.
 - The average increase in coverage of Marine Ecoregions will be 4.31%.

Coverage of KBAs:

• Coverage will improve for 24 KBAs.

Ecosystem services:

- 17.52 % increase in the PA coverage of aboveground biomass.
- 20.46 % increase in the PA coverage of important aboveground biomass areas.
- 19.38 % increase in the PA coverage of soil organic carbon (SOC).
- 25.67 % increase in the PA coverage of areas important for SOC.

Approved Green Climate Fund (GCF) Protected Area-related biodiversity projects

The Green Climate Fund's investments listed as approved projects as of May 2021 were considered. The GCF supports paradigm shifts in both climate change mitigation and adaptation that may impact quality of PAs or contribute to better integration within the wider land- and seascapes around PAs. Only projects with result areas for either or both Forest and Land Use and Ecosystems and Ecosystem Services result areas were included.

GCF ID	Project theme	Result area	Target 11 element
FP144	Mitigation	Forest and land use	Ecosystem services; Effectively managed; Equitably governed; Integration

UN OCEAN CONFERENCE VOLUNTARY COMMITMENTS

Voluntary commitments for the UN Ocean Conference are initiatives voluntarily undertaken by governments, the UN system, non-governmental organizations, among other actors—individually or in partnership—that aim to contribute to the implementation of SDG 14 (here we focus in particular on SDG 14.5). The registry of commitments was opened in February 2017, in the lead up to the first UN Ocean Conference (5 to 9 June 2017).

Other Ocean Actions

Other Ocean Actions submitted as voluntary commitments for SDG 14.5, will also create benefits for the qualifying elements of Aichi Biodiversity Target 11:

#OceanAction19484: Programa de Control y Vigilancia Marítima: programa 1.6 del Plan Nacional de Desarrolloby Viceministerio de Agua, Mares, Costas y Humedales, y Servicio Nacional de Guardacostas (Government).

- Types of actions involved: MPA management and / or enforcement (including Automatic Identification Systems (AIS) and Vessel Monitoring Systems (VMS)).
- Target 11 element addressed: Effectively managed.
- Progress report: No progress report submitted (as of May 2021).
- Further details available at: https://oceanconference.un.org/commitments/?id=19484

#OceanAction19539: Conservación, uso sostenible de la biodiversidad y mantenimiento de los servicios de los ecosistemas de humedales protegidos de importancia internacional-Proyecto Humedalesby Sistema Nacional de Áreas de Conservación (SINAC) (Government).

- Types of actions involved: Local Management Plans; Valuation of ecosystem services.
- Target 11 element addressed: Effectively managed; Ecosystem services.
- Progress report: No progress report submitted (as of May 2021).
- Further details available at: https://oceanconference.un.org/commitments/?id=19539

#OceanAction19579: Aprovechamiento Sostenible de moluscos en Patrimonio Natural del Estadoby Sistema Nacional de Áreas de Conservación (SINAC/MINAE) e Instituto Nacional de Pesca y Acuicultura (INCOPESCA) (Government).

- Types of actions involved: community managed marine areas; develop/implement Management plans; sustainable use; surveillance; restoration.
- Target 11 element addressed: Effectively managed; Equitably managed.
- Progress report: No progress report submitted (as of May 2021).
- Further details available at: https://oceanconference.un.org/commitments/?id=19579

#OceanAction19724: Monitoreo de la biodiversidad marinaby Sistema Nacional de Áreas de Conservación (SINAC)- Ministerio de Ambiente y Energía (MINAE) (Government).

- Types of actions involved: MPA management and/or enforcement; identify ecological indicators for elements of importance for marine biodiversity; participatory monitoring,.
- Target 11 element addressed: Effectively managed; Areas important for biodiversity.
- Progress report: No progress report submitted (as of May 2021).
- Further details available at: https://oceanconference.un.org/commitments/?id=19724

UPDATES ON PROGRESS TOWARDS COMMITMENTS

Coverage: Increase in land coverage through the creation of ASP by 0.5% of the country's land area. Increase in marine coverage by 4% of the country's exclusive economic zone.

• Regarding coverage, no progress has been made in the official creation of new PAs, according to the prioritized areas. However, if the previous technical studies required for its required technical justification have been carried out. The consultation with the local stakeholders involved is pending, and then proceed with the official creation of the proposed PAs according to current national regulations. The same situation exists in the case of the Marine Areas proposed in accordance with the national priorities defined. Therefore, at the end of 2020, the country has a coverage in terrestrial PAs of 25.5% and 2.63% in the marine area, as has been officially reported by the country

Representativeness: Increase of 0.5% of the land cover of the country under some category of protected area management. 1.4% increase in EEZ under some category of protected area management.

 In the land area, the same percentage of increase pending compliance by the country is maintained and the same situation in the case of the marine surface committed by the country before the CBD

Connectivity: By 2020, 50% of the biological corridors have strategic plans and use instruments to evaluate their management effectiveness. By 2020, more terrestrial biological corridors will be created in the country.

• Today the country has 51 officially declared biological corridors, which cover 38% of the country's land surface and are equivalent to 19,418 square kilometers, of which 40 of them (more than 50%) have a duly established local governance committee and operating. In the same sense, 24 biological corridors (47%) have a management plan in force at this time. Finally, in 2019, the management effectiveness instrument was applied in 15 biological corridors of the country.

Management effectiveness of protected areas: 1) By 2020, 70% of the country's protected areas use an instrument for evaluating their management effectiveness. 2) Implementation of a biodiversity conservation monitoring system. 3) Implementation of a strategy of priority actions to address threats to biodiversity in the country's protected areas system.

- 1) In the period from 2016 to 2020, evaluations of management effectiveness of the country's PAs have been applied, making use of the official evaluation instrument defined by the National System of Conservation Areas (SINAC). Said evaluations have been applied in the management categories National Parks, Biological Reserves, National Wildlife Refuges owned by the state and exceeding 100% of the goal proposed at the time (70%) by the country.
- 2) Specific protocols for the monitoring of: coral formations, dynamics of sandy beaches due to the effects of climate change, nesting beaches of sea turtles, cetaceans, sandy beaches, rocky beaches, pelagic species, ecosystems have been

formalized by SINAC at the moment. mangrove. In the process of officialization is the rocky reef protocol. Likewise, the construction, testing and validation of other protocols for the monitoring of terrestrial species and ecosystems is being carried out.

• 3) Through the Institutional Program Costa Rica Forever (PCRXS), a line of technical and financial support has been established to support SINAC in addressing the different threats to biodiversity present in the country's protected areas.

OTHER ACTIONS/COMMITMENTS

Leaders' Pledge for Nature

Costa Rica **has** signed onto the Leaders' Pledge for Nature.

Political leaders participating in the United Nations Summit on Biodiversity in September 2020, representing 84 countries from all regions and the European Union, have committed to reversing biodiversity loss by 2030. By doing so, these leaders are sending a united signal to step up global ambition and encourage others to match their collective ambition for nature, climate, and people with the scale of the crisis at hand.

High Ambition Coalition for Nature and People

Costa Rica **co-chairs** the High Ambition Coalition for Nature and People.

The High Ambition Coalition (HAC) for Nature and People is an intergovernmental group of 77 countries (so far) co-chaired by Costa Rica and France and by the United Kingdom, championing a global deal for nature and people with the central goal of protecting at least 30 percent of world's land and ocean by 2030. The 30x30 target is a global target which aims to halt the accelerating loss of species, and protect vital ecosystems that are the source of our economic security.

This global aim is expected to be ratified by parties in the future global framework of the Convention on Biological Diversity (CBD) for the protection of biodiversity, which is to be adopted at the next COP15 to be held in China in early 2022.

Global Ocean Alliance

Costa Rica **has** joined the Global Ocean Alliance: 30by30 initiative.

The Global Ocean Alliance 30by30 is a UK led initiative [currently containing 53 countries as signatories]. Its aim is to protect at least 30% of the global ocean as Marine Protected Areas (MPAs) and Other Effective area-based Conservation Measures (OECMs) by 2030.

Commitments for PAs and OECMs from Other National Policies

Policy document	Ecosystem	Policy text	
Nationally Determined Contribution	Forest ecosystems	Enhancing carbon sinks (land-use and reforestation) is one of the 4 priority options for mitigation	
Nationally Determined Contribution	Forest ecosystems	Creation of a National Territorial Information System (SNIT), within the National Registry, including land use change monitoring systems, which will significantly contribute to the Monitoring, Verifications and Reporting (MRV) systems improvement proposed under FONAFIFO's Emission Reduction Program	
Nationally Determined Contribution	Forest ecosystems	Strengthen FONAFIFO's PES system	
Nationally Determined Contribution	Forest ecosystems	Improvement of the country's forestry resources governance	
Nationally Determined Contribution	Forest ecosystems	Define the rights over forest resources, carbon, and other environmental services provided by forest and agricultural systems	
Nationally Determined Contribution	Grasslands & Agricultural systems	Integration of rural development agenda together with the REDD strategy to allow for an accurate and coordinated management of adaptation and mitigation actions in Costa Rican agriculture.	
National Development Plan	Forest ecosystems	Contribute to carbon neutrality with the contribution of the forestry sector and key sectors such as public transport, agriculture and promoting participation of local governments on climate change mitigation, aiming to maintain 115 million tons of CO2 equivalent captured by 2022.	
National Development Plan	Forest ecosystems	By 2022, reach 40% of increase in biodiversity preserved and used in a sustainable, fair, and equitable way.	
Plan of Action of the National Strategy on Climate Change	Forest ecosystems	Promote the production and consumption of sustainable wood from natural forests (primary and secondary) and reforestation, under some independent or third-party certification system.	
National Development Plan	Wetland ecosystems	Protect new areas of the coastal territory, mainly with potential to host wetlands.	

Policy document	Ecosystem	Policy text	
National Development Plan	Coastal ecosystems	Secure the life, sustainable conservation, and exploitation of marine and coastal resources by increasing the marine-coastal coverage with institutional presence: 17/18.3% in Costa Rica's territorial sea and 51% in the exclusive economic zone by 2022.	
State Policy on the Agri-food Sector and Rural Development	Coastal ecosystems	Implement the Program on marine areas for responsible fishing and aquaculture in order to improve socio-economic conditions of people engaged in fishing and aquaculture	
National Development Plan	Grasslands & Agricultural systems	By 2022, increase to 200 the number of mixed agroforestry projects subject to the Payment fo Environmental Services Program (PPSA)	
Reducing emissions from deforestation and forest degradation	Forest ecosystems	Increase by approximately 233,000 ha under ESP of FONAFIFO PPSA in the year.	
National Biodiversity Strategy Action Plan	Forest ecosystems	By 2020, the State System of Protected Areas will have been expanded by 0.5% of the ecological representativeness, in inland and terrestrial water ecosystems	
Protected Area Plan	Forest ecosystems	Increase by 0.5% the terrestrial protected areas (2016 - 2020)	
Decarbonization National Plan	Forest ecosystems	Maintain forest cover and increase it to 60% by 2030	
National Biodiversity Strategy Action Plan	Wetland ecosystems	By 2020, the area of wetlands under the RAMSAR category will have been increased to 589,742 ha. By 2020, mangroves will recover two points above the coverage determined for this ecosystem (725 ha)	
National Biodiversity Strategy Action Plan	Coastal ecosystems	By 2020 Costa Rica will increase the protection of its coastal marine ecosystems, up to 4% of the EEZ, by incorporating them into the Protected Wildlife Areas System and other marine spatial arrangement instruments	
National Biodiversity Strategy Action Plan	Coastal ecosystems	Increase the percentage of coral reef coverage under protection processes	
Protected Area Plan	Coastal ecosystems	Increase marine protection by 1.4% (2016-2020)	

ANNEX I

FULL LIST OF TERRESTRIAL ECOREGIONS

Ecoregion Name	Area (km²)	% of Global Ecoregion in Country	% of Country in Ecoregion	Area Protected (km²)	% Protected in Country
Central American dry forests	6,148.1	9.1	12.0	1,033.2	16.8
Cocos Island moist forests	24.8	100.0	0.0	24.8	100.0
Costa Rican seasonal moist forests	8,552.6	80.3	16.7	1,058.6	12.4
Isthmian-Atlantic moist forests	16,663.4	28.6	32.6	3,315.2	19.9
Isthmian-Pacific moist forests	9,191.0	31.5	18.0	2,115.7	23.0
Mesoamerican Gulf-Caribbean mangroves	296.7	1.1	0.6	269.6	90.9
Southern Mesoamerican Pacific mangroves	968.1	12.4	1.9	256.5	26.5
Talamancan montane forests	9,137.3	56.1	17.9	6,056.8	66.3

ANNEX II

ADDITIONAL DETAILS ON PPAS

- Costa Rica features private land tenure; >70% of land titles are verified through systematic information gathering/mapping, advancing the process of ensuring secure land tenure
- Section C of the Wildlife Conservation Law No 7317 of 1998 states that the national authority will "promote the establishment of national wildlife refuges on mixed (government-owned and private) or private property."
- National System of Conservation Areas (SINAC) has identified PPAs as an important opportunity for land and biodiversity conservation in the country
- PPAs are defined through several mechanisms: primarily as private nature reserves, both formal and informal; land purchases by NGOs for the goal of conservation; and conservation easements
- Costa Rica has developed very clearly elaborated financial incentives for different forms of private land conservation
- As of 2005, roughly 100 private reserves in Costa Rica that were recognized either by the national government or NGOs
- Privately-owned PAs make up a significant portion of the overall PA network (PPAs registered within the national park system comprise 572,099 ha or 11.2% of the country)
 - the WDPA currently includes 12 National Wildlife Refuges (under private governance) and 1 Conservation Easement.

Case studies/best practices:

- Monteverde Reserve: success in conserving vulnerable cloud forest was due in part
 to NGO collaboration and community participation; coverage expanded to 10,500
 ha; ecotourism activities generate income and local employment opportunities
 within the reserve; the reserve is strategically situated between government
 reserves to the north and the Monteverde-Gulf of Nicoya Biological Corridor to the
 south, serving as a buffer zone between those important conservation zones
- La Selva Biological Station: covers 1,600 ha; currently used as a research station, as well as protecting habitat for local wildlife; serves as a buffer zone to adjacent Braulio Carrillo National Park; La Selva originally began as a private reserve in 1954, then acquired by the Organization for Tropical Studies in the 1960s (as a research station and private biological reserve).

See additional information in country profile.

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