



Aichi Biodiversity Target 11 Country Dossier: EGYPT

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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

Disclaimer

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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). 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, terrestrial coverage in Egypt is 129,389.8 km² (13.1%) and marine coverage is 11,715.8 km² (5.0%).
- **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:** Egypt contains 11 terrestrial ecoregions, 2 marine ecoregions, and 2 pelagic provinces: the mean protected coverage by reported PAs and OECMs is 21.0% (terrestrial), 18.8% (marine), and 0.0% (pelagic); 1 terrestrial ecoregion and 2 pelagic provinces have no coverage by reported PAs and OECMs (though the 1 terrestrial ecoregion covers <5 km² within the country)
- **Opportunities for action:** there is opportunity for Egypt to increase protection in terrestrial and marine ecoregions and pelagic provinces that have lower levels of coverage by PAs or OECMs. Ecoregions which currently have no coverage by PAs or OECMs are key areas for action.

Areas Important for Biodiversity

- **Status:** Egypt has 40 Key Biodiversity Areas (KBAs): the mean protected coverage of KBAs by reported PAs and OECMs is 40.3%, while 20 KBAs have no coverage by reported PAs and OECMs.
- **Opportunities for action:** there is opportunity for Egypt to increase protection of KBAs 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 Egypt, 3.7% of aboveground biomass carbon, 10.5% of belowground biomass carbon, 12.1% of soil organic carbon, 4.3% of carbon stored in marine sediments is covered by PAs and OECMs.
- **Opportunities for action:** for carbon, there is opportunity for Egypt to increase PA and OECM coverage in both marine and terrestrial areas with high carbon stocks. 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 7.3%.
- **Opportunities for action:** there is opportunity for the targeted designation of connecting PAs or OECMs and to focus on PA and OECM 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 Egypt is: 48.0% under Government (Federal or national ministry or agency).
- **Opportunities for action:** explore opportunities for governance types that have lower representation, for Egypt this could relate to governance by Indigenous Peoples and/or local communities (IPLC), shared governance, etc. Increase efforts to identify the governance types for the 52.0% of sites that do not have their governance type reported.

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• There is also opportunity for Egypt 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:** 58.8% of terrestrial PAs and 94.3% of marine PAs have completed Protected Area Management Effectiveness (PAME) assessments reported.
- **Opportunities for action:** there is opportunity to develop management plans for PAs, as proposed in Egypt's national policy. The 60% target for completed management effectiveness assessments (per COP Decision X/31) **has not** been met for terrestrial PAs and **has** been met for marine PAs. Therefore, there is opportunity to increase protected area management effectiveness (PAME) evaluations for terrestrial PAs to achieve the target.
- There is also 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 Egypt. Section I of the dossier presents data on the current status of Egypt'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 Egypt, in relation to each Target 11 element. The analyses present options for improving Egypt's area-based conservation network to achieve enhanced protection and benefits for livelihoods and climate change. Section II presents details on Egypt's existing PA and OECMs 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 UN. Furthermore, where data is

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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.

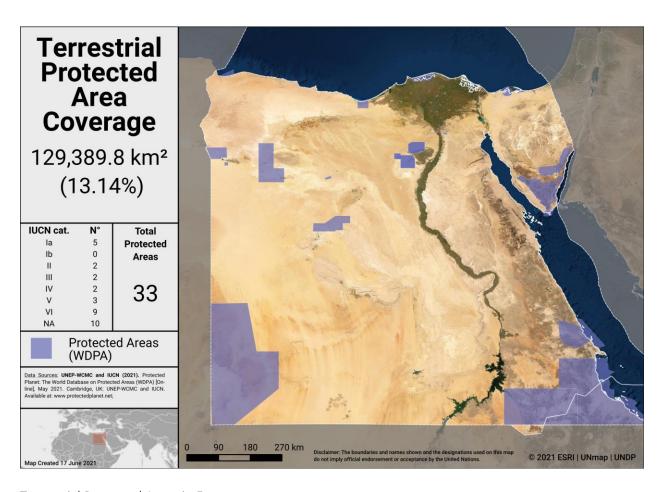
COVERAGE - TERRESTRIAL & MARINE

As of May 2021, Egypt has **50** protected areas reported in the World Database on Protected Areas (WDPA). 13 PAs that are proposed, and a further 2 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**).

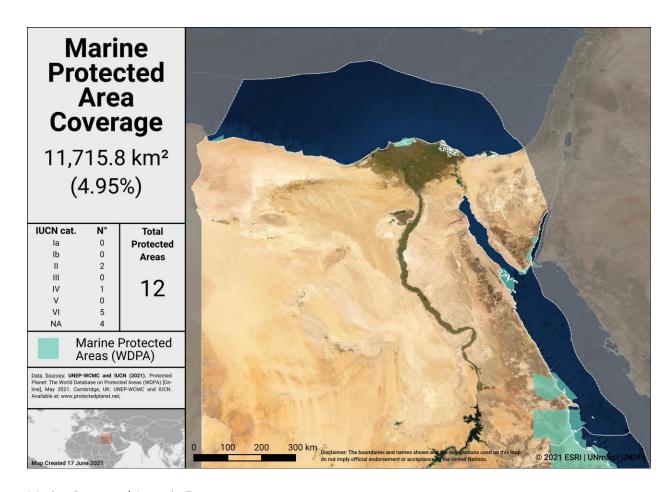
As of May 2021, Egypt has **0** OECMs reported in the world database on OECMs (WD-OECM).

Current coverage for Egypt:

- 13.1% terrestrial (34 protected areas, 129,389.8 km²)
- 5.0% marine (12 protected areas, 11,715.8 km²)



Terrestrial Protected Areas in Egypt

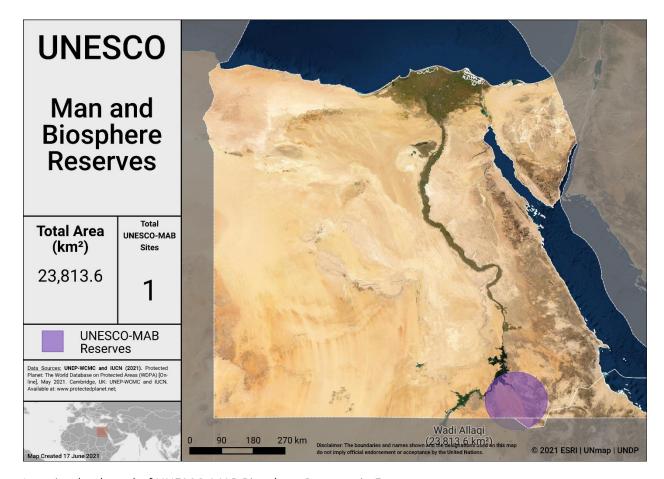


Marine Protected Areas in Egypt

As noted in a recent regional assessment (see details in IUCN-WCPA 2020), if proposed PAs were designated, Egypt's terrestrial PA coverage would exceed 17%, and there would also be a small increase for marine areas.

Potential OECMs

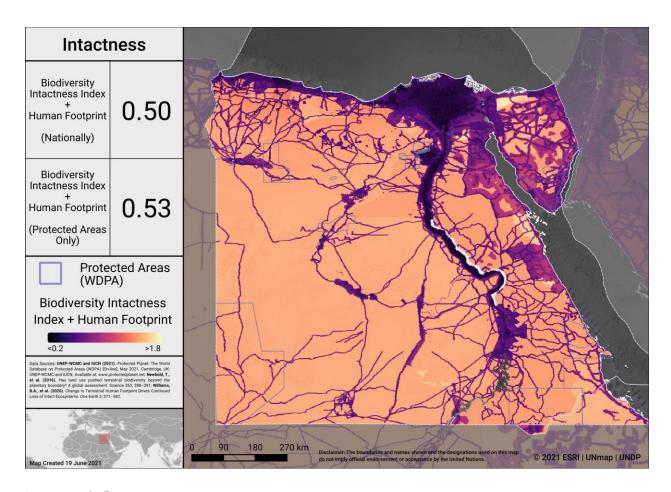
As reported in a recent regional assessment (see details in IUCN-WCPA 2020), potential OECMs in Egypt could include the portion of UNESCO-MAB Biosphere Reserves not overlapping with national PAs (see map below)



Location (and area) of UNESCO-MAB Biosphere Reserves in Egypt

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 Egypt considers where to add new PAs and OECMs, the map below identifies areas in Egypt 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 Egypt

To explore more on intactness visit the UN Biodiversity Lab: map.unbiodiversitylab.org.

ECOLOGICAL REPRESENTATIVENESS – TERRESTRIAL & MARINE

Ecological representativeness is assessed based on the PAs and OECMs coverage of broadscale 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).

Egypt has 11 **terrestrial** ecoregions. Out of these:

- 10 ecoregions have at least some coverage from PAs and OECMs.
 - The 1 remaining ecoregion covers < 5 km² within the country
- 4 ecoregions have at least 17% protected within the country.
- The average terrestrial coverage of ecoregions is 21.0%.

Egypt has 2 marine ecoregions and 2 pelagic provinces. Out of these:

- 2 marine ecoregions and 0 pelagic provinces have at least some coverage from reported PAs and OECMs.
- 1 marine ecoregion and 0 pelagic provinces have at least 10% protected within Egypt's exclusive economic zone (EEZ).
- The average protected area coverage of marine ecoregions is 18.8% and the average protected area coverage of Pelagic Provinces is 0.0%.

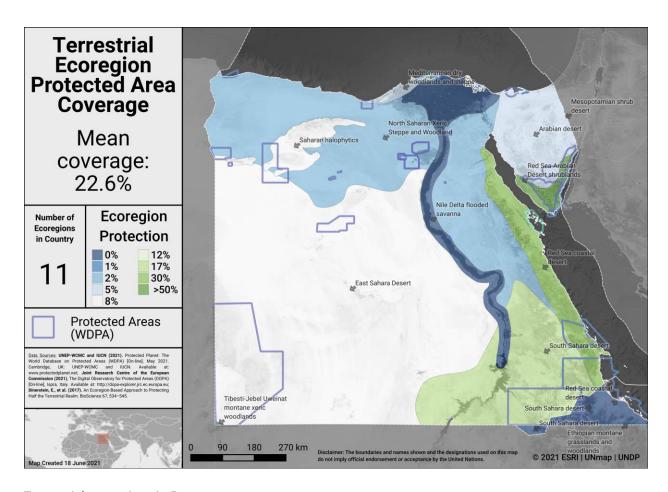
A full list of terrestrial ecoregions in Egypt is available in Annex I.

In addition, a recent regional assessment (see IUCN-WCPA, 2020) evaluated ecological representativeness based on the number and proportion of ecosystem classes within PAs and OECMs (using the EMODnet Seabed Habitat layer, EUSeaMap, for marine ecosystems, and the Land Use/Land Cover data from the Copernicus Global Land Cover map for terrestrial ecosystems).

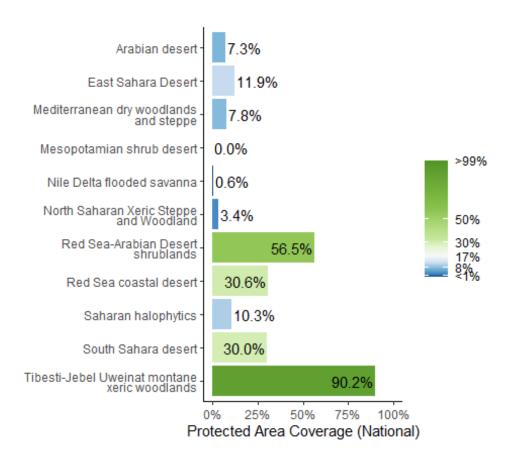
Currently, in Egypt:

- 6 out of 8 ecosystem types have at least 2% coverage from PAs
- Just 1 terrestrial and freshwater ecosystem type (Herbaceous wetland) has at least 17% coverage; 1 other ecosystem type would reach the target with the inclusion of proposed PAs.
- None of the 4 marine ecosystem types have >10% coverage from PAs and OECMs (while 3 have <2% coverage).

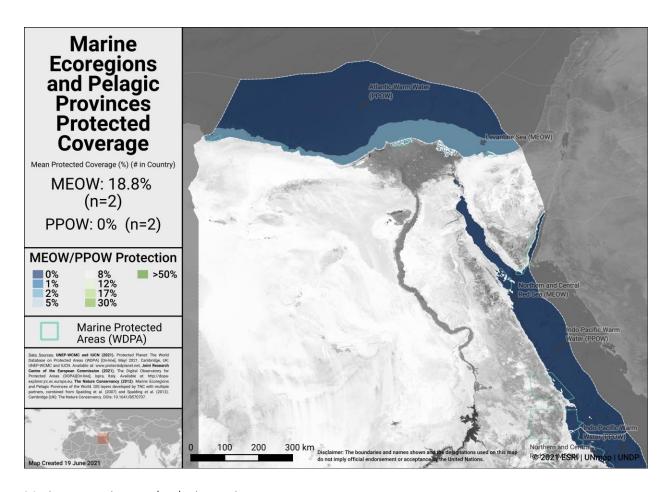
See regional report, *Achieving Aichi Target 11 in the Southern and Eastern Mediterranean Region* (IUCN-WCPA, 2020) for full details.



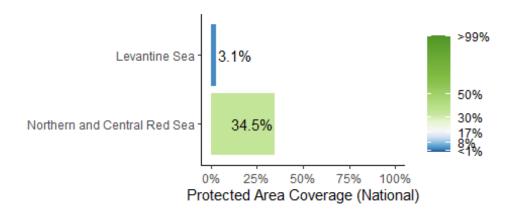
Terrestrial ecoregions in Egypt



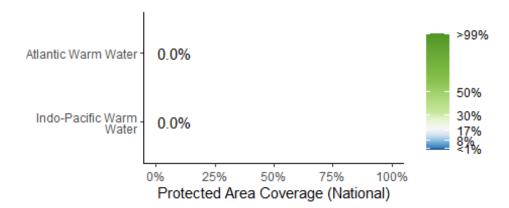
Terrestrial ecoregions of the World (TEOW) in Egypt



Marine ecoregions and pelagic provinces



Marine Ecoregions of the World (MEOW) in Egypt



Pelagic Provinces of the World (PPOW) in Egypt

Opportunities for action

There is opportunity for Egypt to increase protection in terrestrial and marine ecoregions and pelagic provinces that have lower levels of coverage by PAs or OECMs. Ecoregions which currently have no coverage by PAs or OECMs are key areas for action.

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.

Egypt has **41** Key Biodiversity Areas (KBAs).

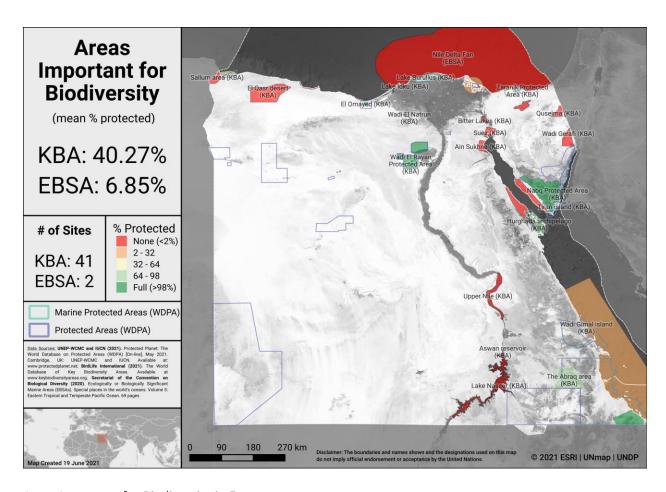
- Mean percent coverage of all KBAs by PAs and OECMs in Egypt is **40.3%**.
- **11** KBAs have full (>98%) coverage by PAs and OECMs.
- **9** KBAs have partial coverage by PAs and OECMs.
- **20** KBAs have no (<2%) coverage by PAs and OECMs.

Several additional KBAs would have improved coverage if Egypt's 13 proposed PAs were designated (see IUCN-WCPA, 2020).

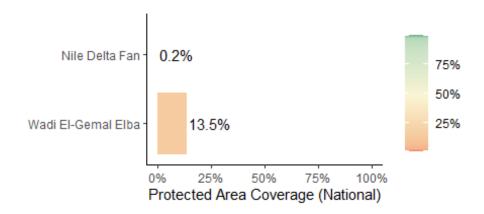
Ecologically or Biologically Significant Marine Areas (EBSAs)

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.

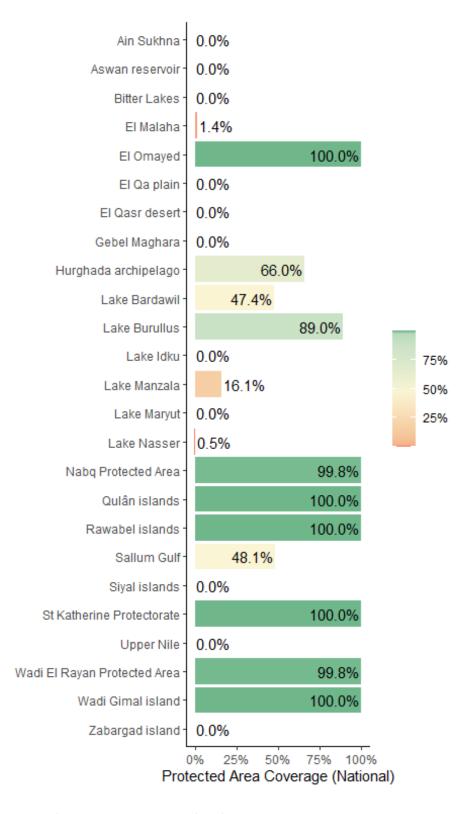
There are 2 EBSAs with some portion of their extent within Egypt's EEZ, both of which have at least some coverage from PAs or OECMs.



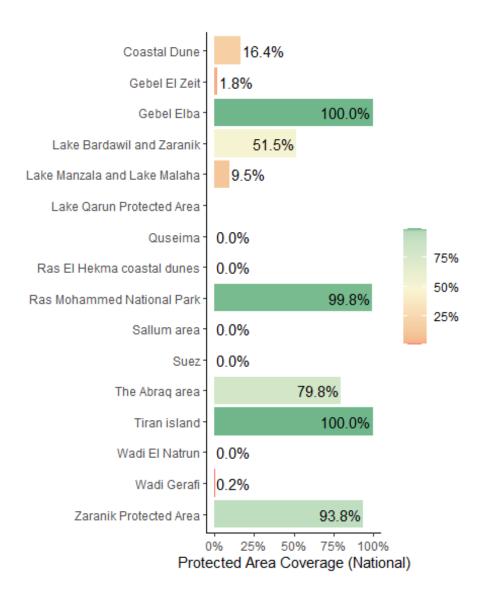
Areas Important for Biodiversity in Egypt



Ecologically or Biologically Significant Marine Areas (EBSAs) in Egypt



Key Biodiversity Area Coverage (KBA) in Egypt



Key Biodiversity Area Coverage (KBA) in Egypt (continued)

Opportunities for action

There is opportunity for Egypt to increase protection of KBAs that have lower levels of coverage by PAs and OECMs; priority could be given to those with no current coverage.

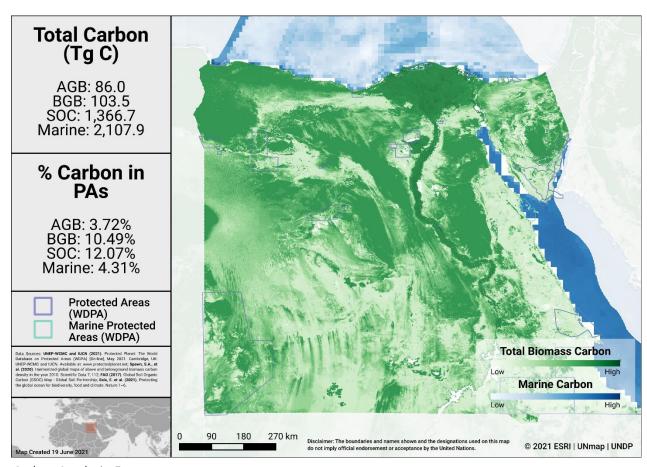
AREAS IMPORTANT FOR ECOSYSTEM SERVICES

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.

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 Egypt and the percent of carbon in protected areas. The total carbon stocks is 86.0 Tg C from aboveground biomass (AGB), with 3.7% in protected areas; 103.5 Tg C from below ground biomass (BGB), with 10.5% in protected areas; 1,366.7 Tg C from soil organic carbon (SOC), with 12.1% in protected areas; and 2,107.9 Tg C from marine sediment carbon, with 4.3% in protected areas.



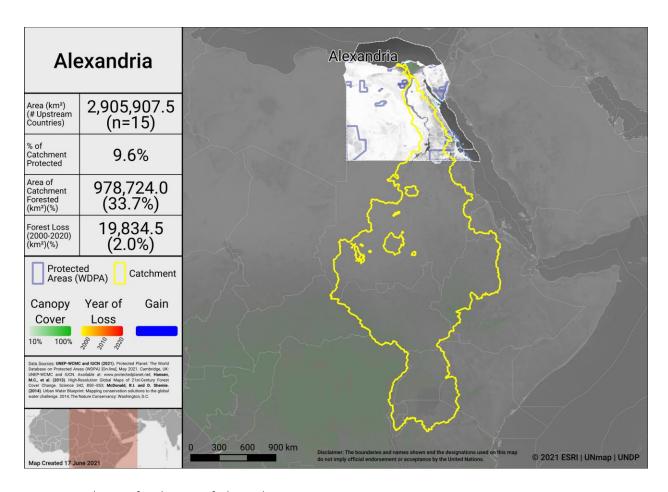
Carbon Stocks in Egypt

Water

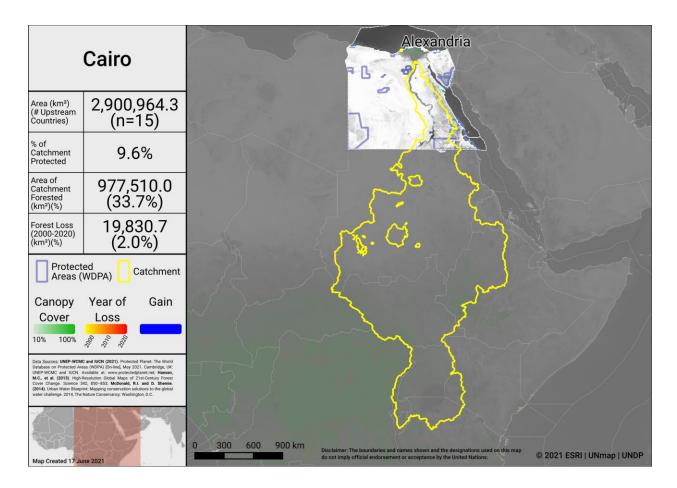
Information on the water sources for 534 cities is available via the City Water Map (CWM) and provides details on the catchment area of the watershed that supplies these cities (see McDonald et al., 2014 for details on methodology).

Forests and intact ecosystems 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 Egypt may similarly depend on protected forest areas within and around water catchments. The maps below show the percentage forest and PA cover and the forest loss from 2000-2020 in the most heavily populated water catchments of Egypt. Intact catchments can support more consistent water supply and improved water quality.



Water supply area for the city of Alexandria



Water supply area for the city of Cairo

Opportunities for action

For carbon, there is opportunity for Egypt 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).

In addition, a recent regional assessment (see IUCN-WCPA, 2020) evaluated connectivity based on the number of connections, less than or equal to 20km, between terrestrial or marine PA patches with a minimum size of 0.5 km² within the PA network of each country. As of 2020, 40.74% of the Egypt's PAs were within a 20km distance from another PA; if proposed PAs were designated, this would increase to 44.74% of the country's PAs.

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 Egypt was 7.3%.

PARC-Connectedness Index

In 2019, as assessed using the PARC-Connectedness Index (values ranging from 0-1, indicating low to high connectivity), connectivity in Egypt is 0.50. This represents no significant change since 2010.

Corridor case studies

There are currently no corridor case studies available for Egypt (but see general details on conserving connectivity through ecological networks and corridors in Hilty et al 2020).

Integration into the wider landscape

Under Egypt's Vision 2030, there is a great window to integrate protected areas into the wider landscape (see details on the goals, pillars, and other aspects of the Vision here).

Opportunities for action

There is opportunity for the targeted designation of connecting PAs or OECMs and to focus on PA and OECM management for enhancing and maintaining connectivity. Increasing 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 Egypt reported in the WDPA have the following governance types:

- 48.0% are governed by **governments**
 - 48.0% by federal or national ministry or agency
 - 0.0% by sub-national ministry or agency
 - 0.0% by government-delegated management
- 0.0% are under **shared** governance
- 0.0% are under **private** governance
- 0.0% are under IPLC governance
 - 0.0% by Indigenous Peoples
 - 0.0% by local communities
- 52.0% **do not** report a governance type

OECMs

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

Privately Protected Areas (PPAs)

There is currently no data available on PPAs for Egypt (see Gloss et al., 2019, and Stolton et al., 2014 for details).

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

There is currently no data available on ICCAs for Egypt (see Kothari et al., 2012 and the ICCA Registry for further details).

Other Indigenous lands

Lands managed and/or controlled by Indigenous Peoples cover an area of 155,213.0 km 2 , of which 132,819.0 km 2 falls outside of formal protected areas. Indigenous lands with a human footprint less than 4 (considered as 'natural landscapes') cover an area of 110,784.0 km 2 (for details on analysis see Garnett et al., 2018).

For Egypt, evidence for the presence of Indigenous Peoples comes from: Dersso, S. Egypt: Constitutional, legislative and administrative provisions concerning Indigenous Peoples (International Labour Organization, 2009).

Boundaries of the lands Indigenous Peoples manage or have tenure rights over come from: *Ma'aza, Ababda, Bisharin*: Sidebotham, S. E., Hense, M. & Nouwens, H. M. The Red Land: the

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illustrated archaeology of Egypt's Eastern Desert (American University in Cairo Press, 2008)

Sinai Bedouin: De Jong, R. E. A grammar of the Bedouin dialects of central and southern Sinai (Brill, 2011)

Berber: Maddy-Weitzman, B. Berbers and the Nation-State in North Africa (Oxford University Press, 2017)

Nubians: The Economist. Egypt's Nubians – Let them go home. https://www.economist.com/news/middle-east-and-africa/21707224-nubianshave-given-much-egypt-time-country-give-back-let-them (2016).

Opportunities for action

Explore opportunities for governance types that have lower representation, for Egypt this could relate to governance by Indigenous Peoples and/or local communities (IPLC), shared governance, etc. Increase efforts to identify the governance types for the 52.0% of sites that do not have their governance type reported.

There is also opportunity for Egypt 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. Egypt has the following Equator Prize winners that showcase examples of local, sustainable community action:

Organization	Year	Project Description
Medicinal Plants Association, St. Catherine	2012	The Medicinal Plants Association protects and cultivates endemic species of medicinal plants in the St. Catherine Reserve in Sinai and aims to create livelihood alternatives for the area's economically marginalized Bedouin population. The reserve contains several unique and endangered medicinal plant species which have been threatened by overharvesting, collection for use as fuel, and overgrazing. The association promotes home gardens, provides alternative energy solutions, gives hands-on training on sustainable harvesting techniques, and creates market supply chains for locally produced medicinal herbs, handicrafts and honey. In addition to creating six medicinal plant restoration sites around the reserve, the association has raised local awareness of the importance of biodiversity and ecosystem health for local wellbeing. Alternative livelihood programs focus on Bedouin women. The association has created farms for the cultivation of medicinal plants and supports female farmers through the process of planting through to the marketing of products. Revenues from association activities have been invested in a rotating fund which allows the community to access small loans.
		,



Photo from Equator Prize Project: Medicinal Plants Association, St. Catherine

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.

Currently, 3.2% of Egypt's terrestrial PAs and 1.35% of Egypt's marine PAs have a reported management plan (see IUCN-WCPA, 2020).

Protected area management effectiveness (PAME) assessments

As of May 2021, Egypt has 50 PAs reported in the WDPA; of these PAs, 28 (56.0%) have management effectiveness evaluations reported in the global database on protected area management effectiveness (GD-PAME).

- 7.7% (76,110 km²) of the terrestrial area of the country is covered by PAs with completed management effectiveness evaluations.
 - 58.8% of the area of terrestrial PAs have completed evaluations.
- 4.7% (11,046 km²) of the marine area of the country is covered by PAs with completed management effectiveness evaluations.
 - 94.3% of the area of marine PAs have completed evaluations.

The 60% target for completed management effectiveness assessments (per COP Decision X/31) **has not** been met for terrestrial PAs and **has** been met for marine PAs.

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

Opportunities for action

There is opportunity to develop management plans for PAs, as proposed in Egypt's national policy. The 60% target for completed management effectiveness assessments (per COP Decision X/31) **has not** been met for terrestrial PAs and **has** been met for marine PAs. Therefore, there is opportunity to increase protected area management effectiveness (PAME) evaluations for terrestrial PAs to achieve the target.

There is also 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 Africa on achieving Aichi Biodiversity Targets 11 and 12 took place 21 - 24 March 2016 in Entebbe, Uganda. 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/

Summary from the workshop:

Priority actions and identified opportunities, if completed as proposed, will provide benefits for the qualifying elements of Aichi Biodiversity Target 11.

The following actions were identified during the workshops:

Terrestrial and marine coverage:

- 1) Possibility to increase the number of existing PAs (2,000 km²) [See GEF project #5073].
- 2) 14 future PAs under review.
- 3) Establish a new self-financed Agency for conservation of biodiversity and protected areas.
- 4) Amendment of the law of PAs.
- 5) Implement green economy instruments in PAs.

Ecological representation: The total conservation areas for IBAs is 34 site are covering an area about 35,000 km² which is equivalent to (3.5 %) of the total area of the Egypt. This will need update for available recent information.

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

Connectivity: Currently there is no a clear effort for establishing biological corridors, as 30% of PAs are connected.

Management effectiveness:

- 1) Management effectiveness assessment for 10 PAs will be continued through the following years for improving performance.
- 2) Design and implement performance monitoring system to follow-up of the management activities in each PA.

Governance and Equity: Develop innovative schemes of equitable governance in selected PAs.

Integration:

- 1) Survey for identification of different alternatives for the integrated management of landscapes and seascapes in order to promote sustainable development and connectivity around Protected Areas.
- 2) Involve local community around Wadi El Gemal National park in protected area activities.

OECMs:

- 1) Conserve and management of wild species under the pressures of illegal hunting.
- 2) Develop effective tools for combating illegal hunting of wild animals (e.g. illegal birds hunting).
- 3) Improve the licensing procedure for hunting of migratory birds.
- 4) Define hunting quotas for migratory birds and conduct studies on hunting.
- 5) Understand and implement the concept of sustainable legal hunting.
- 6) Mainstreaming of biodiversity in energy and tourism sectors (2 MOU).

NATIONAL BIODIVERSITY STRATEGY AND ACTION PLANS (NBSAPs)

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

NATIONAL TARGET 1: By 2030, PAs network secured and expanded to cover 17% of total terrestrial and inland water and at least 5% of coastal and marine representative areas, especially priority sites of particular importance for biodiversity and key ecological processes, and Effective management of PAs.

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

- As of May 2021 (based on the WDPA/WD-OECM) has the target been met: No (but post-2020 target date)
- Accounting for other projects, actions and commitments, if this target is met, coverage in the country will increase by **16,898.5** km² by 2030.

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

- As of May 2021 (based on the WDPA/WD-OECM) has the target been met: No (but post-2020 target date)
- Accounting for other projects, actions and commitments, if this target is met, coverage in the country will increase by 114.6 km² by 2030.

Actions from the NBSAP will also address other elements of Aichi Biodiversity Target 11:

NBSAP Action #	Action (original language from NBSAP)
1.2	Establish coherent network of PAs with especial attention to marine PAs.
1.5	Define and implement proper criteria for proper management of key biodiversity hotspots.
1.6	Establish standardized national monitoring systems within PAs based on the current monitoring efforts.
2.19	Establish criteria for monitoring of pollution inside protected areas and associated buffer zones.
2.28	Enhance the infrastructure and natural resource base of all protected areas to make them attractive destinations for tourists and tourism investors and to improve the working environment.

In addition, to address NBSAP targets: New PAs will be added; Management effectiveness will be conducted; and digital monitoring programs.

APPROVED GEF-5 & GEF-6 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 PA	Qualitative elements potentially benefitting (based on keyword search of PIFs)
5073	Yes	21,161	Terrestrial	All except Equitably managed and Connectivity
9671	No	N/A	N/A	Areas important for biodiversity; Effectively managed; Equitably managed
9928	No	N/A	N/A	None

Based on spatial data available for GEF project 3209 and 5073, benefits will arise for several elements of Target 11:

Coverage of Terrestrial and Marine Ecoregions:

- 10 Terrestrial Ecoregions will have improved coverage. These Ecoregions are: Arabian desert; East Sahara Desert; Ethiopian montane grasslands and woodlands; Nile Delta flooded savanna; North Saharan Xeric Steppe and Woodland; Red Sea coastal desert; Red Sea-Arabian Desert shrublands; Saharan halophytics; South Sahara Desert; Tibesti-Jebel Uweinat montane xeric woodlands.
 - The average increase in coverage of Terrestrial Ecoregions will be 5.82%.
- 2 Marine Ecoregions will have improved coverage. These Marine Ecoregions are: Levantine Sea; Northern and Central Red Sea.
 - The average increase in coverage of Marine Ecoregions will be 0.24%.

Coverage of KBAs:

• Coverage will improve for 21 KBAs.

With additional GEF project, *New MPA will be declared* **Other National Policies** include the development of management plans for PAs

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
Arabian desert	47,805.3	5.9	4.9	3,503.5	7.3
East Sahara Desert	477,986.3	31.1	48.8	56,899.6	11.9
Mediterranean dry woodlands and steppe	3,664.8	1.3	0.4	287.2	7.8
Mesopotamian shrub desert	3.9	0.0	0.0	0.0	0.0
Nile Delta flooded savanna	50,754.9	100.0	5.2	300.4	0.6
North Saharan Xeric Steppe and Woodland	216,384.8	13.5	22.1	7,243.3	3.3
Red Sea-Arabian Desert shrublands	9,420.4	3.0	1.0	5,322.1	56.5
Red Sea coastal desert	39,059.7	66.4	4.0	11,938.6	30.6
Saharan halophytics	20,774.3	38.6	2.1	2,148.2	10.3
South Sahara desert	113,372.8	3.9	11.6	33,966.4	30.0
Tibesti-Jebel Uweinat montane xeric woodlands	175.6	0.2	0.0	158.3	90.2

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