

A PLAN FOR EFFECTIVE MANAGEMENT OF

CHILE'S MARINE PROTECTED AREAS



MARINE PROTECTED AREAS PROGRAM
CHILE NATURE FUND



OCEANA



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The Marine Protected Areas Program Planning
Committee of the Chile Nature Fund**



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Executive summary

Chile's marine and coastal ecosystems are among the most diverse and productive in the world. Habitats such as the Humboldt Current and the Patagonian and Antarctic Seas are home to half of the world's cetacean species¹ and up to a third of the planet's macroalgae².

Chilean authorities and local communities have made substantial progress in creating marine protected areas (MPAs) to reduce the degradation of these ecosystems as a result of anthropic pressures; to strengthen adaptation to the effects of the climate crisis that impacts marine biodiversity and the human communities that depend on it; to contribute to blue carbon initiatives; and to provide sustainable development opportunities to the communities linked to the ocean.

As of 2022, 41% of Chile's jurisdictional waters is covered by marine protected areas. Although the percentage covered by MPAs in Chile may be indeed encouraging, the country still faces the challenge of moving from the official designation of these areas to effective implementation. Studies carried out in the last decade show significant gaps, both in management effectiveness (at least six of eight key management aspects were absent or showed major deficiencies in MPAs during 2015, with progress only in certain MPAs in more recent years); as well as in the financing of the country's MPAs (with a financial gap estimated at 98.3% in 2018).

Chile has recently taken on important national and international commitments to address marine conservation and climate change, which have triggered a number of concrete actions. Along with efforts to increase public funding for MPAs, the country started the exploration and creation of complementary financial mechanisms that are adequately articulated with the country's conservation policies.

In 2018, the Ministry of the Environment (MMA) convened various public and private organizations (CONAF, SERNAPESCA, and the NGOs: CODEFF, TNC, Oceana, WCS, and WWF) to form a working group aimed at promoting the creation of a conservation trust fund, which will operate as a financially and legally independent platform to support biodiversity conservation initiatives. This fund, officially established in 2021 as the "Fondo Naturaleza Chile" or Chile Nature Fund, will have several programs designed to address specific national conservation priorities. The first of these is the Marine Protected Areas Program. To set out a detailed framework for this program, a Planning Committee comprised of the Ministry of Environment, the National Fisheries and Aquaculture Service, Oceana, the Wildlife Conservation Society, and the World Wildlife Fund wrote an Effective Management Plan for Marine Protected Areas, which we present in this summary.

¹ Perrin, W.F. 2021. World Cetacea Database. <http://www.marinespecies.org/cetacea> [accessed March 23, 2020].

² Mora-Soto, A., Palacios, M., Macaya, E.C. Gómez, I., Huovinen, P., Pérez-Matus, A., Young, M., Golding, N., Toro, M., Yaqub, M., & M. Macias-Fauria. 2020. A High-Resolution Global Map of Giant Kelp (*Macrocystis pyrifera*) Forests and Intertidal Green Algae (Ulvophyceae) with Sentinel-2 Imagery. *Remote Sensing*, 12(4):694.

The Plan for Effective Management of Chile's Marine Protected Areas is a 10-year strategic instrument designed to guide investments towards an effective implementation of MPAs, which are complementary to and synergistic with the actions of the State. In this sense, the Plan is not a new public policy, but rather aligns with and incorporates existing ones.

It also adheres to the priorities of the local MPA planning processes, seeking to strengthen the application of official planning instruments.

The **geographic scope** defined for this first phase of the Marine Protected Areas Program covers 21 MPAs, grouped into 10 clusters: Chañaral Island, Choros and Damas Islands, Nazca Desventuradas, Juan Fernández Archipelago MPA network, Rapa Nui MPA network, Lafken Mapu Lahual, Pitipalena-Añihué, Tortel, Francisco Coloane and Seno Almirantazgo. Jointly, these 10 clusters cover 1,324,906 km², equivalent to 89% of to the total area of Chile's MPA network.

Starting with these areas, the Program will help strengthen the national MPA network with projects to improve and develop, first and foremost, the management of the different MPAs of the **geographic scope**, and promote the involvement of communities in the management of these areas. Support will also be provided for projects that contribute to strengthening the integrated management of MPAs at a system level, and at a regional, ecoregional or national scale.

To guide the decision-making process for the initiatives under the MPA Program, the Chile Nature Fund will employ **social and environmental safeguards**, principles of equity and transparency for the administration of the Program, as well as the following **strategic principles** that are part of the Plan's fundamental framework:

Strategic principles of the Plan for Effective Management of Chile's Marine Protected Areas

- ▶ *Respect for established MPA priorities*
- ▶ *Involvement of indigenous and local communities and civil society*
- ▶ *Resilience to the effects of climate change*
- ▶ *Consistency and synergy with public policies*
- ▶ *Value of scientific and traditional knowledge*
- ▶ *Chile Nature Fund resources complement state funding*
- ▶ *Territorial equity and maximization of conservation benefits*



Through the implementation of these principles, special attention should be paid to the impacts and handling of the MPA Program in three aspects identified as cross-cutting values of the Plan: ***safeguarding of cultural heritage; equity of treatment, in its different dimensions; respect of the rights and interests of indigenous communities.***

The central element of the Plan for Effective Management is its action plan, which establishes conservation and threat-control objectives, the **strategies** that the Marine Protected Areas Program aims to support, the goals to be achieved for each strategy, and examples of specific actions for each strategy.

The **action plan** includes a goal and specific activities related to the administrative and strategic management for the operation of the MPA Program, and the evaluation of the Plan for Effective Management.

The Plan for Effective Management is a tool that sets out a pathway to channel private and public resources to scale up ocean action and achieve the implementation of MPAs. It is designed for an initial 10 year period, during which it will contribute to the protection and resilience of Chile's natural and cultural heritage, and to the well-being of the people who make MPAs their home.



Current situation of marine protected areas in Chile

Chile's marine and coastal ecosystems are among the most diverse and productive in the world. Habitats such as the Humboldt Current and the Patagonian and Antarctic Seas are home to half of the world's cetacean species and up to a third of the planet's macroalgae.

Although the percentage covered by MPAs in Chile may be indeed encouraging, the country still faces the challenge of moving from the official designation of these areas to effective implementation.

Marine Parks, Marine Reserves, and Multiple-Use Marine and Coastal Protected Areas in the country cover 1,469,423 km², or close to 43% of Chile's maritime zone, including its exclusive economic zone, territorial sea, and inland waters.

Why we must protect Chile's marine ecosystems

Chile's marine ecosystems are facing degradation under an onslaught of threats, including intensive unsustainable fishing, illegal fishing, trawling, mining and port activities, domestic sewage and industrial waste water discharged into the ocean, aquaculture activity, and the introduction of invasive species.

These threats are only exacerbated by the current and predicted global effects of climate change, which include acidification and a decrease in ocean productivity, alterations in the marine food webs and trophic levels, a reduction in the abundance of habitat-forming species, changes in the geographic distribution of species, and a greater incidence of diseases in marine organisms.



The story of the Chile Nature Fund and its Marine Protected Areas Program

2018

The Ministry of the Environment (MMA) convened a working group with the World Wildlife Fund (WWF), Oceana and the Wildlife Conservation Society (WCS) to promote the creation of a legally independent, private conservation trust fund that would focus on attracting and channeling funding toward Chile's biodiversity, complementing government funding. At the same time, these institutions decided to design a program of the fund dedicated to the implementation of marine protected areas.

Two additional NGOs joined the initial working group: The National Committee for the Defense of Flora and Fauna (CODEFF) and The Nature Conservancy (TNC).

2019

The National Budget Law established a specific allocation for the MMA to manage marine protected areas, which has been renewed to this day.

In addition, the National Fisheries and Aquaculture Service (SERNAPESCA) established a Conservation and Biodiversity Unit, which seeks to strengthen the protection and administration of Marine Reserves and Parks, rescue protected marine species and address related biodiversity concerns.

2020

Thanks to the contribution of the Packard Foundation, in 2020, the working group finalized a feasibility analysis for a conservation trust fund in Chile, which concluded that it was possible to create the fund and that it would have the legal, institutional, and financial conditions to achieve its objectives efficiently and effectively.

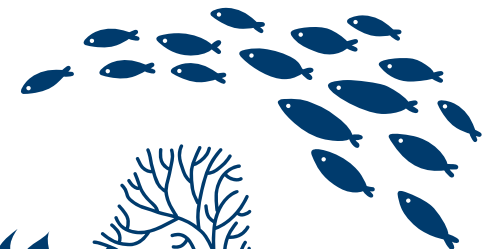
Given the feasibility of the initiative, the working group invited two other government agencies with a major role in managing protected areas to join the group: SERNAPESCA and the National Forestry Corporation (CONAF).

2021

The Chile Nature Fund was formally created with by-laws that align with the new Practice Standards for Conservation Trust Funds. The establishment of the governance was prepared such that in early 2022 a board of directors and a council would be in place. Both governance bodies are made up of leaders in conservation, finance, climate change, and sustainable development of local and indigenous communities.

The team received support from the Inter-American Development Bank (IDB) for this work and the development of an Operations Manual.

At the same time, the **Plan for Effective Management** was designed and is presented in this document.



Plan for Effective Management of Chile's MPAs

The Plan for Effective Management of Marine Protected Areas is a strategic instrument designed so that the **Chile Nature Fund**, as a private entity independent of the State, can plan activities that complement government actions to implement MPAs in the geographic scope over 10 years.

Vision

Chile protects its natural marine heritage through a network of functional and effectively managed marine protected areas that contribute to biodiversity conservation, human well-being, and the resilience of marine and coastal ecosystems to the effects of climate change.

Geographic scope

The Plan encompasses 21 MPAs distributed throughout Chile. These areas were selected by the Planning Committee based on the potential for social impact around the MPAs, their proximity to other MPAs for economies of scale, the potential to work with local communities and the diversity of ecosystems the MPAs were found in. Marine Parks (MP), Marine Reserves (MR), and Multiple-Use Coastal Marine Protected Areas (MU-CMPA) created in Chile up to the date of the preparation of this Plan were considered in the analysis. Among them, the MPs imply strict protection, while the MRs and MU-CMPAs allow some uses.

The prioritization described above was established to ensure that the MPA Program initially supports a significant but manageable number of MPAs at the national level. This does not limit the inclusion of other MPAs or other protection categories in the future.

The 21 prioritized MPAs are grouped into 10 clusters, defined as territorial units made up of one or more contiguous MPAs. The selected clusters represent 9 of the 11 marine ecoregions in Chile that had MPAs as of the date of preparation of this Plan. Together, the clusters cover 1,324,906 km², equivalent to 89% of the area of MPAs declared for Chile by 2021.

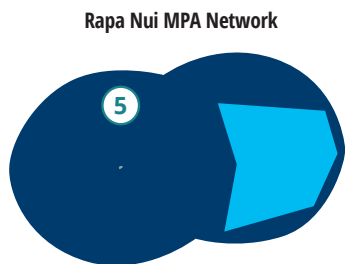


Clusters and MPAs included in the Plan for Effective Management of Marine Protected Areas

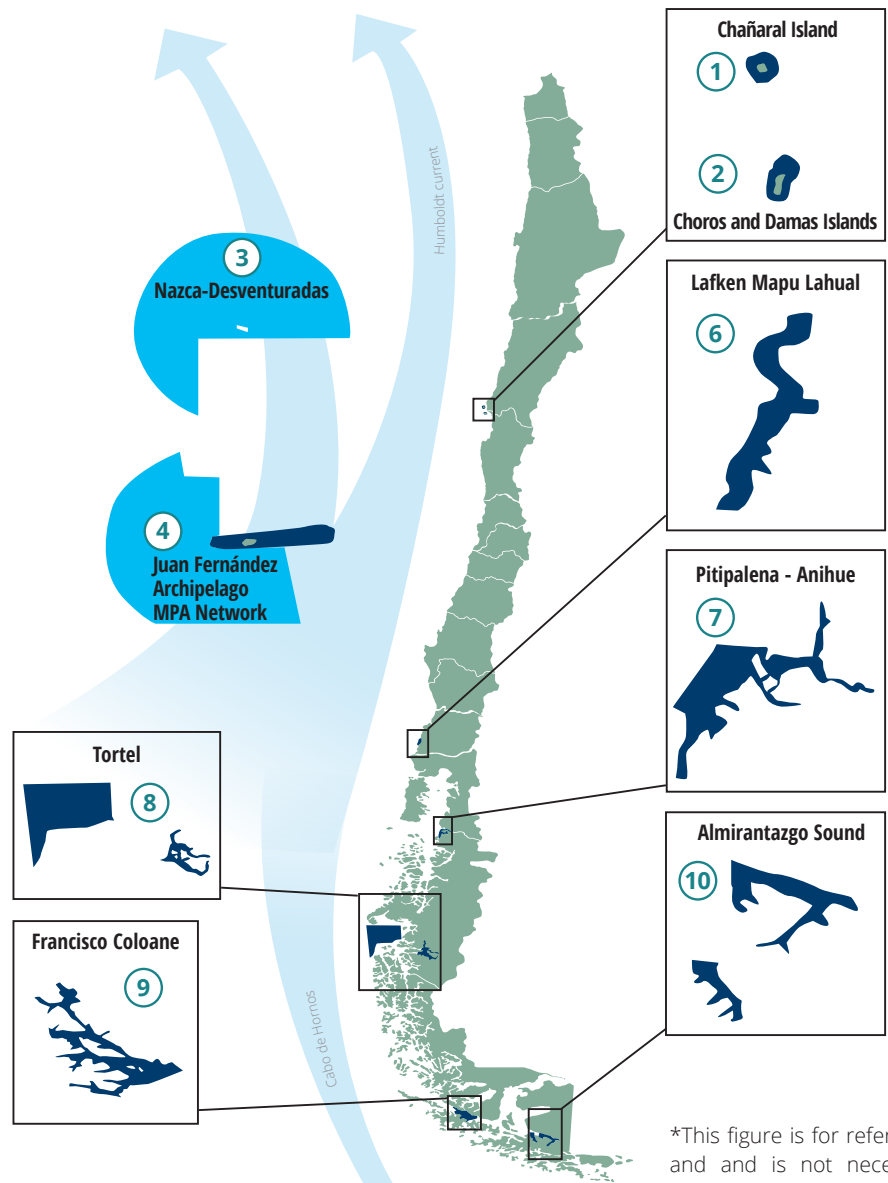
Nº	Cluster	MPA units and categories covered	Ecoregion	Area (km ²)
1	Chañaral Island	MR Chañaral Island	Atacama	27
2	Choros and Damas Islands	MR Choros Island and Damas Island	Atacama	38
3	Nazca-Desventuradas	MP Nazca-Desventuradas	Desventuradas	300,035
4	Juan Fernández Archipelago MPA Network	MP Juan Fernández Sea MU-CMPA Juan Fernández Sea MP Crusoe and Selkirk Seamounts MP Lobería Selkirk MP El Arenal MP Tierra Blanca MP El Palillo	Juan Fernández	287,078
5	Rapa Nui MPA Network	MU-CMPA Rapa Nui MP Motu Motiro Hiva MU-CMPA Coral Nui Nui Submarine Park MU-CMPA Motu Tautara Submarine Park MU-CMPA Hanga Oteo Submarine Park	Easter Island	729,371
6	Lafken Mapu Lahual	MU-CMPA Lafken Mapu Lahual	Chiloé-Taitao	45
7	Pitipalena-Añihue	MU-CMPA Pitipalena-Añihue	Chiloé-Taitao	239
8	Tortel	MU-CMPA Tortel	Southern Pacific Ocean Chiloé-Taitao Kawésqar	6702
9	Francisco Coloane	MU-CMPA Francisco Coloane MP Francisco Coloane	Magellan	673
10	Almirantazgo Sound	MU-CMPA Almirantazgo Sound	Magellan	765

Geographic scope for the Plan for Effective Management of Marine Protected Areas

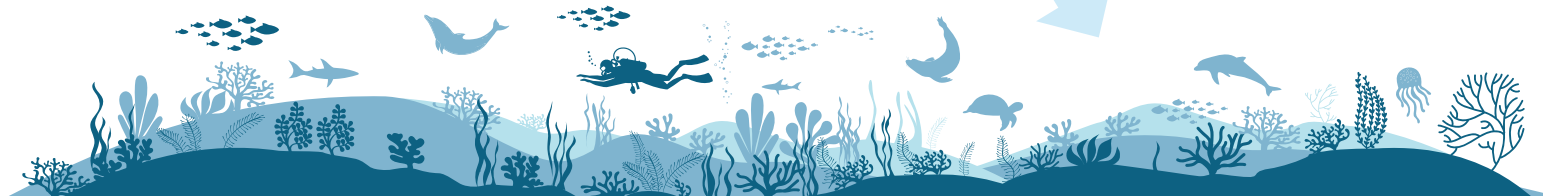
Strict protection
 Some permitted uses



N°	Cluster
1	Chañaral Island
2	Choros and Damas Islands
3	Nazca-Desventuradas
4	Juan Fernández Archipelago MPA Network
5	Rapa Nui MPA Network
6	Lafken Mapu Lahual
7	Pitipalena-Añihue
8	Tortel
9	Francisco Coloane
10	Almirantazgo Sound



*This figure is for reference only and is not necessarily to scale.



Conservation targets

The Plan for Effective Management considers 7 Conservation Target groups:



Species of commercial interest



Benthic ecosystems of high ecological value



Kelp forests



Cetaceans



Seabirds



Coastal mammals



Pelagic ecosystems of high ecological value

Threats

Threat category	Direct threat groups by category
Unsustainable fishing practices	Overexploitation of species of commercial interest
	Illegal, unreported and unregulated fishing
	Unsustainable fishing gear
Dumping, discharge, spill, emission, or presence of pollutants	Solid waste
	Domestic sewage and industrial waste water
Presence of invasive alien species	Presence of invasive alien species
Inappropriate recreational practices	Inappropriate recreational practices
Problems associated with the transit and anchoring of vessels	Noise produced by boat traffic
	Collisions with marine fauna
	Harmful anchoring practices

Action plan

The action plan details the MPA Program priority strategies to implement MPAs in the next 10 years, with goals, the actions required to achieve them, target dates, indicators, means of verification, and potential entities in charge of carrying them out. The action plan also establishes specific activities to measure progress on the goals of the Plan for Effective Management.

Conservation strategies and goals

The action plan is structured around nine conservation strategies. The plan details actions under each strategy to achieve defined goals by addressing key intervention points, integrating opportunities, and reducing constraints.

The following is a summary of each of the strategies defined in the Plan for Effective Management of Marine Protected Areas.

Strategies

- 1 Financial sustainability of marine protected areas
- 2 Governance for management decision-making
- 3 Monitoring of conservation targets, their threats, and the effects of climate change
- 4 Priority research for marine protected areas management
- 5 Surveillance, control, prosecution and follow-up of infractions
- 6 Sustainable livelihoods for communities and users
- 7 Community engagement, education, and awareness
- 8 Planning tools and operational capabilities
- 9 Conservation in the field





STRATEGY 1: Financial sustainability of MPAs

The financial sustainability strategy seeks to ensure that the financial needs for the implementation and operation of these areas are covered with certain stability over time in each MPA cluster, in accordance with the specific management plans of the respective cluster.



STRATEGY 2: Governance for management decision making

This strategy is aimed at implementing and strengthening the governance of each MPA to achieve legitimized decisions with the most relevant MPA stakeholders, with equitable treatment and inclusion of different interest groups, in order to drive forward effective biodiversity conservation.



STRATEGY 3: Monitoring of conservation targets, their threats, and the effects of climate change

This strategy is designed to support monitoring and evaluation of the state of the Conservation Targets and their threats, as per the MPA management plans. It also includes complementary activities that, although not currently included in the management plans, are necessary to comply with national commitments, and to understand the effects of certain potential threats, including the effects of climate change.



STRATEGY 4: Priority research for MPA management

This strategy promotes the generation and valuation of complementary knowledge beyond baselines and monitoring of conservation targets and threats, including local knowledge identified as relevant for MPA management.

STRATEGY 5: Surveillance, control, prosecution and follow-up of infractions

This strategy focuses on strengthening coordinated and focused programs for surveillance, inspection, reporting, and follow-up to reduce legal infractions committed to the detriment of MPAs and has been designed to complement what is already being done by government agencies in these matters.



STRATEGY 6: Sustainable livelihoods for communities and users



This strategy is aimed at strengthening sustainable livelihoods among local indigenous peoples, local communities more generally, and other permanent MPA users. Livelihoods are understood as “the set of activities, assets, capacities, and strategies required and employed to meet people’s fundamental needs.” From this point of view, livelihoods refer to “ways of living” and not only to “ways of earning a living.” Accordingly, the degree to which these fundamental needs are satisfied will determine community well-being.

STRATEGY 8: Planning tools and operational capabilities



This strategy focuses on actions related to planning, including the development of MPA management plans, as well as the capacity for their planning and operation.

STRATEGY 7: Community engagement, education, and awareness



This strategy is oriented towards the development of community outreach, education, and awareness programs, aimed mainly at local and indigenous communities, to strengthen appreciation of the natural and cultural heritage of the MPAs as well as of the impacts and opportunities of human activities associated with these areas.

STRATEGY 9: Conservation in the field



This strategy focuses on actions in the field to manage priority threats in the MPAs. It excludes monitoring, research, and other activities covered in other strategies.



Cost model

The cost model is a strategic tool that provides added value to the Plan for Effective Management of Marine Protected Areas. It is noteworthy as it results from a collaborative effort and the compilation of information provided by over 40 thematic experts from more than 15 public and private institutions in the country.

This is a dynamic model, and as such it can be updated with the best available information, and will serve as a tool to evaluate the progress of the implementation of the Program. It establishes a fundraising target to be able to implement the Plan for Effective Management of Marine Protected Areas, which will facilitate fundraising from private, multilateral and bilateral donors, as well as from potential public sources and financial mechanisms.

For more information about the model and the funding goal, please contact us at contacto@fondonaturaleza.org.





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Coral Reef, Hanga Roa Bay on Easter Island

