

Blue finance

Mamuhunan sa mga MPAs ('responsible investment in MPAs')

Development and Investment Facilities for
Coral Reef Marine Protected Areas in the
Philippines

*Prepared for the Global Fund for Coral Reef,
October 2021*



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<p>Programme Title: Mamuhunan sa mga MPAs ('responsible investment in MPAs')</p> <p>Sub-Title: Development and Investment Facilities for Coral Reef Marine Protected Areas in the Philippines</p>	<p>Recipient Organisation(s):</p> <p>Blue Finance UNCDF Blue Bridge</p>
<p>Programme Contact: Nicolas Pascal, Executive Director, Blue Finance Npascal@blue-finance.org</p>	<p>Programme Location: Philippines Verde Island Passage Calamian Islands Tañon Strait</p>
<p>Programme Description: The programme will contribute to the protection and resilience of over 30,000 ha of coral reefs through the effective management and financial sustainability of 3 high-biodiversity Marine Protected Area (MPA) networks (total 80 MPAs). MPAs are a proven tool in the fight to reduce the various drivers of coral reef ecosystem degradation.</p> <p>The approach relies on arranging long-term management concessions for the MPAs structured as Special Purpose Entities, on developing tangible revenue models for the management of these MPAs and on securing their up-front financing needs through private investment capital. The approach will be implemented through a Development Facility and Blended Finance Investment Facilities for MPAs.</p> <p>Initial revenue models include MPA user fees, visitor center and sales of blue carbon credits. The MPA SPEs will invest also in reef-first businesses linked to eco-tourism, coastal aquaculture of overfished reef species and reef fisheries transition. This allows the MPA SPEs to contribute to the design of the reef-first businesses to ensure synergies with MPA management and receive dividends that contribute to MPA SPE management costs.</p>	<p>18-month Grant Cost: USD 3,372,399 Convening Agent: USD 574,135 GFCR Blue Bridge: USD 2,798,264</p> <p>As per GFCR Executive Board decision, disbursements will be determined based on fiduciary assessment, expenditures and GFCR Secretariat's performance review.</p> <p>Proposed Start Date: November 2021</p> <p>Proposed End Date: December 2029 (8y)</p> <p>The project start date will be triggered by the first tranche of disbursement from GFCR.</p>
<p>Key expected results:</p> <ol style="list-style-type: none"> 1. Enabling environment created for improved coral reef resilience (>30,000ha) with a sustainable flow of financing for reef conservation, threat abatement actions and improved policy compliance 2. Improved biodiversity in priority sites and climate refugia (+50% increase in biomass of key reef fish) 3. More viable sustainable reef positive livelihood options for coastal communities, with a focus on women and poor communities (new jobs and incomes for >1,700 coastal community members) 4. Increased recovery potential and climate resilience of 250,000 individuals from reef communities (Approx. 2.5% of 1,000,000 households benefited from enhanced protection against coastal flooding and erosion) 	



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<p>Signature of Recipient Organisation:</p> <p>Print: Organisation _____</p> <p>Name _____</p> <p>Title _____</p> <p>Signature _____</p> <p>Date _____</p>	<p>Signature of Recipient UN Organisation (UNCDF):</p> <p>Print: Organisation <u>UNCDF</u> _____</p> <p>Name <u>Preeti Sinha</u> _____</p> <p>Title <u>Executive Secretary</u> _____</p> <p>Signature _____</p> <p>Date _____</p>
<p>Signature of Executive Board UN Partner:</p> <p>Print: Organisation <u>UNDP</u> _____</p> <p>Name <u>Andrew Hudson</u> _____</p> <p>Title <u>Head, W</u> _____</p> <p>Signature _____</p> <p>Date <u>08-Dec-20</u> _____</p>	

BUDGET BY UNDG CATEGORIES

18-month Budget Breakdown	Convening Agent	UNCDF	Total
1. Staff and other personnel	\$429,575	\$259,700	\$689,275
2. Supplies, Commodities, Materials	\$-	\$-	\$-
3. Equipment, Vehicles, and Furniture (including Depreciation)	\$-	\$-	\$-
4. Contractual services	\$27,000	\$-	\$27,000
5. Travel	\$50,000	\$83,250	\$133,250
6. Transfers and Grants to Counterparts	\$-	\$2,272,250	\$2,272,250
7. General Operating and other Direct Costs	\$30,000	\$-	\$30,000
Total Direct Costs	\$536,575	\$2,615,200	\$3,151,775
8. Indirect Support Costs (Max. 7%)	\$37,560	\$183,064	\$220,624
TOTAL Budget	\$574,135	\$2,798,264	\$3,372,399



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GOVERNMENT SIGNATURE PAGE:

National Coordinating Authority Republic of the Philippines, Department of Environment and Natural Resources

Name of representative: ANALIZA REBUELTA-THE, Undersecretary Finance, Information Systems and Climate Change

Date: September 30th 2021

Official support letter(s) attached



Republic of the Philippines
Department of Environment and Natural Resources
Visayas Avenue, Diliman, Quezon City
Tel. Nos. 929-6626 to 29; 929-6633 to 35
926-7041 to 43; 929-6252; 929-1669
Website: <http://www.denr.gov.ph> / E-mail: wcb@denr.gov.ph

30 September 2021

ALAIN M. MAULION
Country Director
Blue Finance
<http://blue-finance.org/>

Dear **Director Maulion**:


This refers to your request for endorsement of the proposed project on “Mamuhunan sa mga Marine Protected Areas” (Responsible Investments in MPAs) of Blue Finance for funding under the Global Finance for Coral Reefs (GFCR).

Based on the evaluation of the Biodiversity Management Bureau (BMB) and Foreign Assisted and Special Projects Service (FASPS), we support the development of this project. It is aligned with the Philippine Biodiversity Strategy and Action Plan (PBSAP) 2015-2028, as well as the Coastal and Marine Ecosystems Management Program. It will also help fill the country’s financing gap on biodiversity conservation in the marine environment.

May we provide you the suggestions/recommendations of BMB and FASPS, for your consideration in the full project proposal development.

Thank you.

Very truly yours,


ATTY. ANALIZA REBUELTA-TEH
Undersecretary
Finance, Information Systems and Climate Change



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FACT SHEET

Title of the proposed Programme: Mamuhunan sa mga MPAs ('responsible investment in MPAs')

Convening Agent: Blue Finance represented by *Nicolas Pascal, Executive Director, npascal@blue-finance.org*

Co-Implementing recipient organisation(s):
UNCDF Blue Bridge

Name of coral reef site(s) or project area(s): Philippines

Verde Island Passage MPA network (adjacent to Vibrant Oceans BCU "Central Philippines"),
Calamian Island MPA network (adjacent to Vibrant Oceans BCU "Palawan")
TaFon Strait MPA network (Part of Vibrant Oceans BCU "Mindanao")

Period of implementations (years and months): 8 y
Start date (month, year): November 2021
End Date (month, year): December 2029

Total grant programme amount from GFCR
GFCR Grant Window contribution: **US\$18.6M**
First 18 months cash request : US\$3M, Blue Finance: US\$0.6M , UNCDF:US\$2.8M

Leverage and co-financing ambition:

Total revenues expected: **US\$92M**

Total co-financing expected: **US\$23.5M** Identified: **US\$6.1M (see below)**

Total investment capital leverage: **2.3X**

Public investment if any: *no*

Co-financing from Private investment already identified:

Debt/Refundable grants:

US\$3M, Mirova Natural Capital, senior debt, committed. Term sheet under discussion;

US\$1M, UBS optimus, impact loan, soft committed for the VIP MPA network investment facility. Under final review from their IB.

US\$1M, Rockefeller foundation, under discussion for grants and refundable grants for the VIP MPA network investment facility.

The presence of anchor junior capital and grant funds from GFCR is a key factor in their decision to participate.

Grants:

US\$0.25M, IUCN Global EBA facility

US\$0.25M, Convergence, confirmed

US\$0.6M, IUCN BNCFF.



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Relevant objective/s from national strategic document/s:

The Project is anchored in key national development priorities, including:

1) Philippine Development Plan (PDP) 2017-2022.

Goal: Ensuring ecological integrity, clean and healthy environment.

The PDP goal on ensuring ecological integrity sets-out the following key strategies:

- (i) expansion of sustainable management of natural resources through the adoption of ridge to reef approaches and Sustainable Integrated Area Development (SIAD);
- (ii) expansion of sustainable resource-based enterprises;
- (iii) mainstreaming of ecosystem values into national and local development planning.

Goal: Expanding economic opportunities in agriculture, forestry and fisheries

The project is aligned with the following PDP priorities:

- (i) increase economic opportunities of small fisherfolk;
- (ii) pursue ecosystems approach to fisheries management;
- (iii) provide capacity building to small fisherfolk;
- (iv) expand financial inclusion for small fisherfolk, including access to innovative financing options.

Goal: Accelerating human capital development.

The project will advance the following PDP priorities:

- (i) increase income earning ability;
- (ii) strengthen skills development;
- (iii) implement programmes that encourage women to participate in the labour market.

2) Philippine Biodiversity Strategy and Action Plan (PBSAP) 2015 – 2028

The PBSAP is the biodiversity roadmap of the country anchored in the following vision: "By 2028, biodiversity is restored and rehabilitated, valued, effectively managed and secured, maintaining ecosystem services to sustain healthy, resilient Filipino communities and delivering benefits to all."

For the coastal and marine sector, the PBSAP targets no net loss in the presence and area of distribution of live coral cover, mangrove and seagrasses by 2028.

3) Public-Private Partnership for Conservation 2021-2023

The Department of Environment and Natural Resources – Biodiversity Management Bureau (DENR-BMB) and the Public-Private Partnership (PPP) Center signed a Memorandum of Agreement (MOA) to ensure that the use of protected areas (PAs) in developing PPPs is consistent with the principles of biological diversity and sustainable development. Under the MOA, the formulation of guidelines for PPPs in PAs will highlight resiliency, safety, as well as conservation and protection of PAs and natural resources. The DENR-BMB is currently working with the UNDP-Biodiversity Finance Initiative (BIOFIN) on addressing biodiversity finance challenges and designing finance solutions for implementation in biodiversity conservation in the country."



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SDG targets and relevant gender markers on which progress will be accelerated (includes targets from a range of SDGs and development pillars):

- Goal 14: Life below water, the proposal is centred on coral reefs and the blue economy. SDG 14 is severely underfunded and requires additional resources and innovative projects to safeguard biodiversity rich ecosystems and reef-dependent communities, as found in the Philippines. (SDG 14 targets to be addressed: 14.1, 14.2, 14.3, 14.4, 14.5, 14.6, 14.A, 14.B.)

- Goal 8: Sustained, inclusive and sustainable economic growth is targeted specifically through the promotion of and investment in MPAs that provide for new economic activities, decent job creation, entrepreneurship, and as such, encourage the formalization and growth of micro-, small- and medium- sized enterprises that focus on the blue economy and which promote sustainable tourism (SDG 8 targets to be addressed: 8.3 and 8.9).

- Goal 17: Partnerships for the goals is targeted through use of a blended financial instrument that promotes innovation and offers a unique public/private partnership opportunity, bringing together UN organizations, Member States, philanthropy (IUCN, BIOFIN), private investors (e.g., Althelia, Meloy Fund), nonprofit organizations (Blue Alliance, Blue Finance, CI, Rare), private sector (Blueyou, Meliomar, Ubá Institute) and oceans - focused networks in which the UN is an active member or founder (for instance, ICRI and ORRAA). (SDG 17 targets to be addressed: 17.1, 17.3, 17.7, 17.9, 17.15, 17.16, 17.17, 17.19.)

Relevant GFCR outcomes:

Outcome 1: "Protection and effective management of priority coral reef sites and climate change-affected refugia are sustainably financed."

Output 1.1 Increased area of climate refugia and priority sites designated as MPAs and managed by Special Purpose Entities on behalf of Governments.

Activity 1.1.1: Design of the co-management arrangements and set-up of the 2 Special Purpose Entities (SPEs – formed by local partners and Blue Finance) that will co-manage the 2 MPA networks of Calamian Island Group (CIG) and Tañon Strait Protected Seascape (TSPS) on behalf of Governments. Activities in 2022 and 2023 include due diligence on local partners' capacities, consultations with local Governments, alignment with local regulations, legal design, by-laws, sustainable management strategy (rooted in science) and identification of community leadership.

Activity 1.1.2: Consolidation of the SPE 'Blue Alliance VIP' created in 2021 and already managing 12 of the 50 MPAs of the Verde Island Passage (VIP) MPA network. Activities in 2022 include consultations with local Governments, legal arrangements and due diligence on new local partners' capacities.

Activity 1.1.3: Stakeholder engagement and advocacy in the 3 MPA networks. To ensure alignment with all the various stakeholders, a consultation process will be organized with stakeholders from central, provincial and local governments, tourism industry, fishing sector, local communities and other public institutions.



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Activity 1.1.4: Screening, feasibility assessments and selection of 2 additional priority MPA networks in Philippines. Activities in 2024-2025 include identifying MPA networks based on ecological, legal, management and business criteria through a desk study and preliminary consultations with local stakeholders. Priority MPA(s) will be selected in collaboration with Government and partners and based on the 50 reefs priority listing. A scoring decision tool has three major components – Impact Feasibility, Legal Feasibility, and Business Feasibility with a total of 54 indicators.

Output 1.2: Strengthened management, enforcement and monitoring systems of MPAs by SPEs

Activity 1.2.1: Technical & scientific assistance for the three SPEs managing the MPA networks. Activities starting in 2022 include assistance in coral reef conservation and natural resource management, Marine Spatial planning, use of high-resolution mapping to assess coral reef and ecosystem services, habitat & resource monitoring, community based management, MPA compliance plans, mangrove restoration and conservation, fishery management plans, water quality monitoring, etc.

Activity 1.2.2: Commercial and management technical assistance for the three SPEs managing the MPA networks. Activities starting in 2022 include assistance in commercial development, communication and marketing, MPA management, human resources, MPA planning and controlling, resource forecasting, project risks, and capacity building. PMO support includes professional project managers assigned to the projects to inject professionalism into the projects and guarantee a high level of consistency of practice across all projects.

Output 1.3: Preparation and management of public and private investment for MPAs to address key drivers of coral reef degradation

Activity 1.3.1: Financial technical assistance for the three SPEs managing the MPA networks. Design and implementation of business plans for the 3 MPAs with main revenue strategy based on 3 interventions: (i) MPA fees, (ii) visitor center fees and, (iii) sales of blue carbon credits. Activities during 2022-2023 include robust financial projections and scenario analyses for a visitor center, new underwater attractions and set-up of nature fees paid by users, investment structures, detailed commercial strategies, market analyses, tourism international & local expert consultations, mangrove GIS, carbon assessments, carbon ownership, design and development of MRV (Monitoring, Reporting and Verification) carbon methods. Plans will be developed in consultations with local stakeholders.

Activity 1.3.2: Technical assistance for the design of the MPA blended finance investment facilities for the investments in the three MPA SPEs. Activities in 2022 include the design and structuring of 2 blended finance facilities syndicating grants and loans from impact investors, donors and UNCDF for the SPE 'Blue Alliance VIP' and the SPE 'Blue Alliance Calamian island Group'.

Activity 1.3.3: Fundraising with a pool of investors & donors in order to blend donations, concessionary loans and impact investment. Activities include funder mapping (identify long-list of philanthropic institutions, family offices, impact investors, donor agencies, climate funds and development banks), facilitate introductions with short-list of priority funders, pitch material, funder meetings.



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Activity 1.3.4: Design of harmonised Key Performance Indicators (KPIs) and results metrics for MPAs with and for the investment partners. For each MPA network, the social and environmental KPIs will be monitored through >20 impact metrics, following GFCR investment principles and M&E strategy and guided by international best practice impact standards (GIIN, IUCN, BNCFF, SOCMON, METT) verified by independent external partners (such as Verra – VCS and CCB, UNEP).

Output 1.4: MPA blended finance investment facilities mobilise public and private investment for MPAs to address key drivers of coral reef degradation

Activity 1.4.1: Co-fund early-stage CAPEX of the 3 SPEs managing the MPAs through grants and concessional loans (deployed by UNCDF). Investments in 2022 will be centered in the SPE 'Blue Alliance VIP' and the SPE 'Blue Alliance Calamian island Group' with a 2.5X leverage target from the private sector. Investment includes CAPEX such as MPA scientific equipment, vessels, moorings, ecotourism facilities and visitor center. The investment for the SPE 'Tañon Strait' is planned in 2023.

Activity 1.4.2: Co-fund early-stage CAPEX of 2 additional SPEs (identified through Activity 1.1.4). Investment through grants and concessional loans (deployed by UNCDF) include CAPEX such as scientific equipment, vessels for the MPAs, mangrove nurseries, moorings ecotourism facilities and visitor center.

Outcome 2: “Transforming the livelihoods of coral reef-dependent communities”

Output 2.1: A pipeline of reef-positive businesses that generate returns for MPAs and address key drivers of coral reef degradation in & around the MPAs is developed.

Activity 2.1.1: Finalize an investment transaction in a hatchery and extensive aquaculture for mangrove crab in the VIP (around the MPAs of North Oriental Mindoro, VIP). Activities in 2022, include formalizing the agreements with local stakeholders (community organisations, farming and fishing communities), setting-up farmer’s and fisher’s incentives and finalisation of legal and financial arrangements on both project and investment sides.

Activity 2.1.2: Scoping and Development of a pipeline of projects in reef-positive businesses that will produce investment returns to the MPAs. The scoping approach has three major components – Impact Feasibility, Legal Feasibility, and Business Feasibility with a battery of indicators developed for each sector. Interventions to be screened between 2022-2024 include nature-based ecotourism, aquaculture of overfished reef fishes, fishery supply chain improvement project and micro-finance for fisher communities.

Activity 2.1.3: Preparation for investment transactions into the pipeline of reef-positive businesses. Activities between 2023-2025 include technical support in science and management, preparation of all relevant interventions on policy, governance, fishery and farming governance and seafood processing, including the underlying detailed investment and business plans subject to detailed financial analysis and due diligence. It also includes entrepreneurial capacity-building.



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Activity 2.1.4: Technical assistance for investment implementation. Investment is deployed and long-term project management office is agreed. Activities include facilitating the signing of the investment instruments between the SPE managing the MPA and the reef-positive businesses for each intervention and arranging long-term Project Management Office (PMO) contracts for each intervention to ensure “on-the- ground” management focus on revenue and implementation of the strategy to address drivers of coral reef degradation.

Activity 2.1.5: Upskilling local businesses and communities through training and mentorship programmes, including women’s groups and associations, on social & environmental entrepreneurship, sustainable business and financial management.

Output 2.2: The MPA blended finance investment facilities mobilise public and private investments for reef-positive businesses that generate investment returns for MPAs and address specific drivers of coral reef degradation

Activity 2.2.1: Co-fund, in 2022, early-stage CAPEX costs of the mangrove crab aquaculture business. The GFCR co-funding, through grant, will be invested by the SPE ‘Blue Alliance VIP’ as equity into the capital of the aquaculture company to produce investment returns.

Activity 2.2.2: Co-fund early-stage CAPEX costs of the pipeline of nature-based ecotourism. Potential sectors include eco-cruise in CIG and TSPS as well as eco-lodge. The GFCR co-funding will provide grant through the grant window as well as potential future equity investment by the investment window. Investments by the MPA SPEs into equity of the tourism businesses will produce investment returns for the SPEs ‘Blue Alliance VIP’, ‘Blue Alliance CIG’ and ‘SPE TSPS’.

Activity 2.2.3: Co-fund early-stage CAPEX costs of the pipeline of aquaculture of overfished reef fishes. Potential sectors include Sea cucumber hatchery & Grow-out farms, Grouper hatchery and farm with Integrated Multitrophic Aquaculture (IMTA). The GFCR co-funding will provide grant through the grant window which will be invested by the MPA SPEs as equity into the capital of the other aquaculture businesses as well as potential for equity investments by the GFCR investment window. Investments by the MPA SPEs into equity of the aquaculture businesses will produce investment returns for the SPEs ‘Blue Alliance VIP’, ‘Blue Alliance CIG’ and ‘SPE TSPS’.

Activity 2.2.4: Co-fund early-stage CAPEX costs of the pipeline of micro-finance and fishery supply chain improvements for fisher communities. The GFCR co-funding will provide grant through the grant window which will be invested by the MPA SPEs as well as potential equity investments by the investment window. Investments by the MPA SPEs into equity of the businesses will produce investment returns for the SPEs ‘Blue Alliance VIP’, ‘Blue Alliance CIG’ and ‘SPE TSPS’.

Ecosystem Area Protected



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	Area (ha)
Coral Reefs	30 000
Mangroves	8 622
Seagrasses	15 200
Total	53 822

Types of activities supported:

- Operational management of Marine Protected Areas for improving reef health (Legal Compliance, Biodiversity Conservation & Science, Community Development, Sustainable Revenues)
- Set-up and fundraise for three investment facilities dedicated to provide blended finance for MPAs and reef-first businesses
- Set-up of a Marine Protected Area development facility to construct MPA projects with high-quality environmental, social and financial design
- MPA nature-based tourism programmes
- Blue carbon credits for MPAs
- MPA investments into eco-tourism businesses
- MPA investments into aquaculture of overfished reef species
- MPA investments into micro-finance and fishery Supply chain improvement project for fishers

Estimated Number of Beneficiaries

Benefit	Number of People
Local employment (new jobs created)	585 new jobs in total. For women: 230; (MPA staff, ecotourism, aquaculture)
Increase in income	1,200 individuals (fisher, sea farmers, ecoguides)
Subsistence Fishing (subsistence fishers benefiting from greater yields)	75,000 fishers
Number of homes, businesses and other infrastructure with greater coastal protection	250,000 individuals (Approx. 5% of 1,000,000 households benefited)
Total	Approx. 330,000 ind.



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SELF-ASSESSMENT

Eligibility criteria	Yes/No
The proposal reflects a holistic approach to mitigating various drivers of coral reef degradation	Y
The proposal is based on a blended finance approach, with the goal of creating an enabling environment for private sector engagement and/or developing revenue streams to sustainable finance coral reef conservation and reef-first businesses	Y
The proposed results are aligned with national SDG priorities	Y
The proposed Programme will be endorsed by the government and include key national stakeholders	Y
The proposal is based on country consultations, as explained in the Concept note, and efforts have been or will be made to secure Programme government endorsement of the full proposal (the Letter of Endorsement)	Y
The proposal is based on the standard template for Concept Notes, it is complete, and it includes: <ul style="list-style-type: none"> - Theory of Change demonstrating contribution to GFCR Outcomes - Results-oriented partnerships - Environmental and socio-economic baseline data is available and/or there is a strategy in place to collect this data - Results are measurable and a clear plan exists for monitoring and evaluation - Blended solutions (transactions) and substantive outcome-level results, and - Initial risk assessment and mitigation measures. 	Y
The proposal is expected to leverage resources for the SDGs at scale	Y



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Programme Proposal

Executive Summary

This programme will contribute to the effective management and the financial sustainability of Marine Protected Areas (MPAs) in the Philippines. MPAs have proven to be a valuable tool in the fight to reduce the various drivers of coral reef ecosystem degradation¹. The Philippines has established more than 900 MPAs, which form the core of its national strategy for coastal resource management. However, this effort is undermined by the broad range of challenges faced by MPAs. Many sites struggle to meet minimum standards, due to piecemeal, insufficient, and short-term funding for MPAs, which is largely provided by public bodies and development finance entities. With public finance being a scarce and precious resource, the mobilization of additional funds from impact investors for marine conservation is indispensable for meeting the financing needs of Agenda 2030. With MPAs being accepted as the most effective tool for improving reef health and the primary impediment to improving coral reef health being their ineffective management, the establishment of a facility aimed at generating revenue for MPAs will have therefore direct positive impacts on reef health, as well as the communities that rely on them.

The approach

Our approach relies on developing well-managed and sustainably financed MPAs through: (i) setting-up special purpose entities (SPEs) managing the MPAs on behalf of Governments, (ii) implementing sustainable revenue models for the MPAs and, (iii) structuring blended finance solutions for the initial capital needs of the SPEs.

The programme will demonstrate the potential of this approach by focusing efforts initially on 3 pilot MPA networks (total 80 MPAs)² — where Blue Finance and partners have been working since 2019 — before scaling-up and adding 2 other networks. These initial MPA networks have been mostly inactive since their designation ('paper parks') and our projects will focus on improving their management capacities and financial sustainability, while reducing the various stressors that are the root causes of coral reef degradation. The programme will protect over 30,000 ha of coral reefs, benefit approx. 330,000 vulnerable coastal community members and unlock private investment capital (target >US\$20M) from both domestic and international sources.

The pilot sites

Our pilot sites will help to protect some of the most productive and biodiverse marine ecosystems in the world.

- The Verde Island Passage alone is home to some 319 coral species, more than half of documented fish species worldwide (Carpenter and Springer, 2005). It is also touted as the "center of the center" of the world's marine shorefish diversity, with 1,736 overlapping marine species over a 10-kilometer area; the highest concentration of marine life in the world. In this area alone, >11,500 ha of coral will be protected.
- The Calamian Islands are among the 14 hotspots identified by the Philippine government as "extremely high priority" for marine conservation. With relatively intact fringing reefs, it is considered one of the most biodiverse groups of islands in the Philippines (some MPAs have 95%

¹ Mumby et al (2021) for example was able to demonstrate significant improvements to reef health by banning parrotfish harvesting – only possible within the MPA framework - in under a decade.

² The MPA networks of the Verde Island Passage (50 MPAs), Calamian Islands (15 MPAs) and Tañon Strait Protected Seascape (15 MPAs) were chosen through a comprehensive selection process conducted by Blue finance and UNDP, which included three categories of feasibility criteria: ecological, governance, and bankability, with a total of 54 indicators.



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coral cover). Approximately 5 400 ha of coral reefs in these protected spaces, will be impacted by our projects.

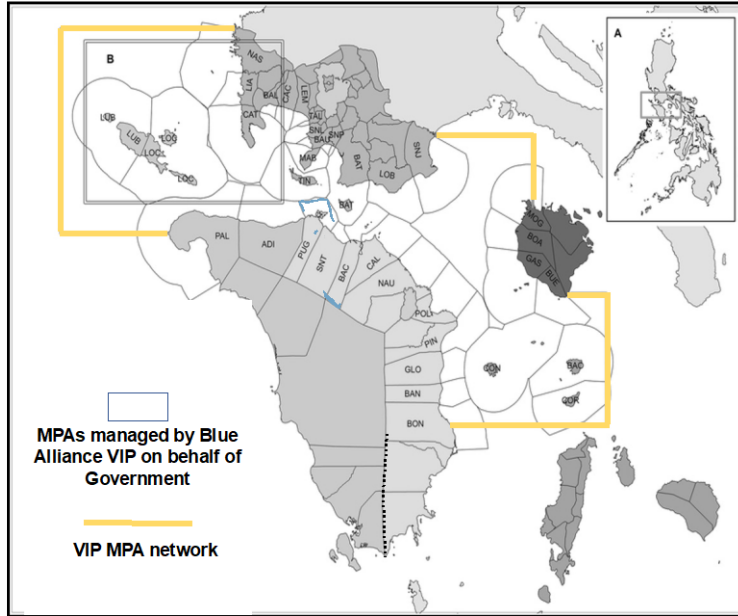
- The Tañon Strait Protected Seascape is known as one of ten most important fishing grounds in the country, its coastline is bordered by fringing reefs home to one of the richest marine ecosystems on Earth. Within the Straits are 16,300 hectares of coral reefs (NOAA 2010) which are mostly fringing reefs along the Negros and Cebu coastline, will be protected.

In 2018, between eight to twenty percent of coastal inhabitants were living below the poverty line (Philippine Statistics Authority, 2020), making them even more vulnerable to environmental degradation and climate change.

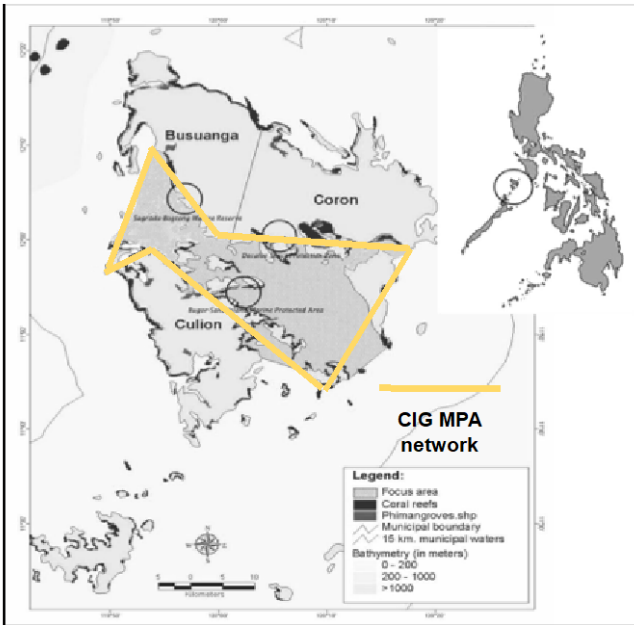


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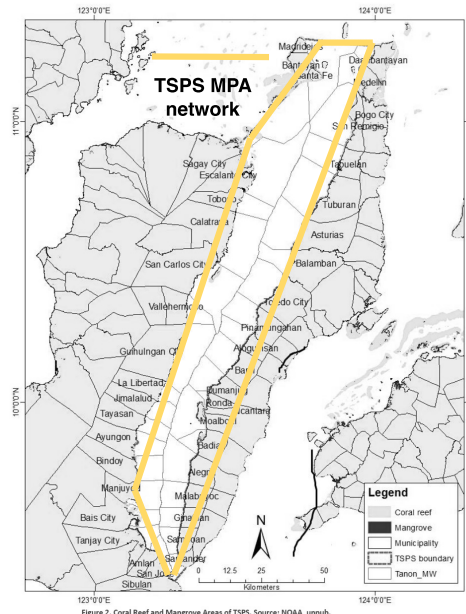
VERDE ISLAND PASSAGE MPA NETWORK



CALAMIAN ISLAND GROUP MPA NETWORK



TAÑÓN STRAIT PROTECTED SEASCAPE MPA NETWORK



The MPA business models

The SPEs will generate sustainable revenues for their operational expenditures from 2 main sources:

1. **Direct MPA incomes:** Income will flow into the SPEs through MPA fees, visitor center entrance tickets and sales of blue carbon credits. The SPE management teams will implement nature-based programmes for visitors incl. new underwater attractions and set-up of nature fees, develop



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innovative and engaging visitor center facilities and certify blue carbon mangrove restoration and conservation projects.

2. **Indirect MPA incomes:** income will flow into the SPEs from investment returns from reef-positive businesses in & around the MPAs. The business sectors include nature-based ecotourism, aquaculture of overfished reef fishes, fishery supply chain improvement projects and micro-finance for fisher communities. Businesses have been selected based on their abilities to reduce specific drivers of coral reef ecosystem degradation and their financial integrity. The businesses will generate investment returns (dividends) and professional fees to the SPEs, improving the MPA effectiveness (and reducing several drivers of coral reef ecosystem degradation). The environmental and social impact of the reef-positive businesses will be monitored and assessed by the MPA SPEs with support from expert impact project developers.

The impacts

Direct impacts on coral reef health and communities from MPAs:

The programme will strive to improve coral reef health by enhancing MPA management capabilities and reducing the primary anthropogenic drivers of degradation of coral reef ecosystems:

- (i) Reduction of overfishing and destructive fishing, as well as contributing to the recovery of herbivore and endangered fish species via enhanced law enforcement, long term community engagement programmes and development of new jobs for fishing communities in the MPAs;
- (ii) Reduction of land-based pollution (e.g. agrochemicals, sewage from coastal communities, solid wastes) via improved enforcement of illegal activity, engaging the communities and companies responsible and collectively developing mitigation mechanisms, and enhancing technology transfer
- (iii) More Sustainable tourism (avoiding overcrowding, anchor damage, etc.) via effective and science-based partitioning of guests (e.g. based on carrying capacities), permanent moorings etc.

Impacts on coral reef health of reef-positive businesses in & around the MPAs

The identified business sectors include nature-based ecotourism, aquaculture of overfished reef species, fishery supply chain improvement project and micro-finance for fisher communities.

Beyond improving MPA effectiveness through investment returns from dividends, each of the interventions will reduce specific drivers of coral reef ecosystem degradation. The specific drivers addressed are:

- (i) Reduction of overfishing of specific reef species through development of aquaculture hatcheries for mangrove crabs, endangered sea cucumber and groupers;
- (ii) Reduction of overfishing of reef species through development of incentives for small-scale fishers for sustainable practices via micro-credit and fishery supply chain improvement ;
- (iii) More Sustainable tourism (avoiding overcrowding, anchor damage, etc.) through responsible eco-tourism companies with sustainable code of conducts
- (iv) Reduction of negative impacts on coral reef use through awareness and marine conservation education for scholars, residents and visitors in the visitor center.

For each MPA, the environmental and social Key Performance Indicators (KPIs) will be developed and monitored following GFCR investment principles and align with the GFCR fund-level M&E Strategy for capturing core fund indicators. An initial selection of >20 impact metrics on coral reef health and resilience, fish populations, livelihood enhancement and MPA management effectiveness has been identified. KPIs and monitoring will follow GFCR investment principles and international best practice



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impact standards (GIIN, IUCN, BNCFF, SOCMON, METT) and will be verified by independent external partners (such as Gold Standard, Verra, CCB, UNEP).

The MPA investments

The GFCR will invest in the 3 SPEs managing the 3 MPA networks. GFCR investment will be centered on (1) early-stage CAPEX of the MPA to set-up management structures and develop sustainable revenue streams (MPA equipment, MPA eco-tourism facilities and mangrove restoration programmes) and (2) early-stage CAPEX of the reef-positive businesses that generate returns for MPAs. GFCR investment will be realized through grants and loans deployed by UNCDF and potential equity deployed by the investment window into Blended Finance Financing Facilities.

In 2022, the GFCR will invest, through grants and loans deployed by UNCDF, in the 'Blue Alliance VIP' and 'Blue Alliance CIG', the 2 SPEs managing the MPA networks of VIP and CIG. GFCR investment will be centered on:

1. MPA vessels, moorings and scientific equipment for effective law enforcement and conservation of the 2 MPAs as well as MPA eco-tourism facilities and services to improve visitors' experience, and mangrove restoration programmes;
2. A mangrove crab aquaculture (hatchery and grow-out farms) in the VIP MPA network. The investment will produce and sell crabs on local, national and international markets. The 'Blue Alliance VIP' will have an equity investment into the project and receive part of the dividends of the businesses as well as professional fees for enforcement and scientific monitoring assistance. Beyond improving MPA effectiveness, the intervention will reduce pressure on the natural population of mangrove crab and develop extra revenues for fisher community members.

In early 2022, after 6 months preparation, the first blended finance investment facility will be structured for the SPE Blue Alliance VIP. The facility will syndicate loans and grants from impact investors such as Mirova Natural Capital (Natixis), UBS Optimus and from grantors such as IUCN. For all, their investment decision is triggered by the GFCR support, which is viewed positively and seen as playing an instrumental role in reducing commercial and ESG risk.

The implementation

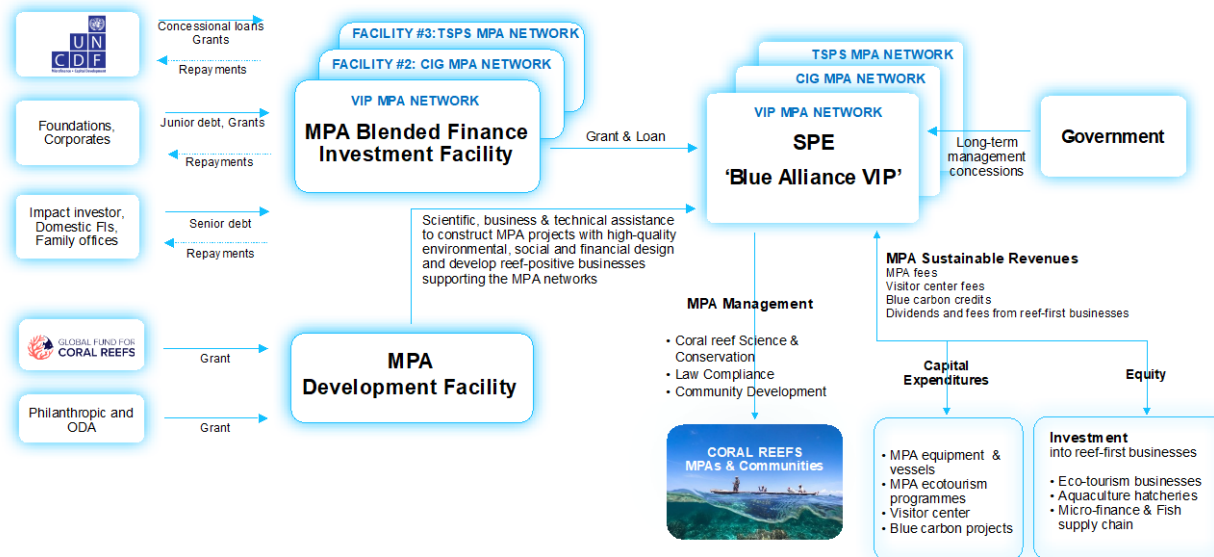
The approach is proposed to be implemented through:

1. A **MPA Development Facility** led by a consortium of 3 project developers providing scientific & technical assistance to construct MPA projects with high-quality environmental, social and financial design, and providing technical assistance for the development of investment-ready reef-first business models;
2. **MPA blended finance investment facilities** (BF-IFs) set-up for each MPA as the central vehicle through which concessionary and commercial capital will be channeled to the projects under each MPA network. the blended finance strategy will be implemented Each BF-IF syndicates investments from impact investors, donors and UNCDF, reducing transaction costs and improving the risk profile of the transaction thus attracting private sector investors.

The approach is summarised in the following diagram:



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The approach is already being successfully implemented in the VIP network where the SPE 'Blue Alliance VIP' is managing 12 of the 50 MPAs on behalf of Government. Since mid-2021, GFCR support (circa US\$218k channeled through UNCDF as a performance grant) has already been utilized in accelerating the implementation of early-stage on the ground MPA activities, as well as preparing a pipeline of reef-positive bankable interventions.

UNCDF Blue Bridge will be channeling grants and concessional loans from the GFCR grant window. An anchor impact investor is also confirmed (the Sustainable Ocean Fund, Mirova Natural Capital-Natixis). Several other impact investors are under discussion (UBS Optimus, Rockefeller foundation). Different grantors have also confirmed their initial interest (BNCFF-IUCN, Convergence, IUCN-EBA facility)³. For all (incl. anchor investor), their investment decision will be triggered by the GFCR support, which is viewed positively and seen as playing an instrumental role in reducing commercial and ESG risk.

In addition to international donors and investors, the project will also seek to unlock capital from domestic financial institutions through technical advisory services to local financial institutions and credit enhancements where appropriate.

Implementing Capacities

The Development Facility (DF) is led by a consortium of 3 project developers and UNCDF Blue Bridge:

1. Blue Finance - a non-profit organisation specializing in the management of MPA concessions, the development of sustainable revenue streams and the implementation of impact investment solutions for MPAs in South East Asia and globally; BF acts as the convening agent and will be

³ In 2021, financing has been secured for the initial activities with GFCR, IUCN-Blue Natural Capital Financial Facility and the BIOFIN-UNDP project. Convergence is providing co-financing for the design of the blended finance facility.



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leading all the DF activities linked to MPA management, science, MPA fee revenues, community engagement and reef-positive businesses linked to ecotourism

2. Uba Sustainability Institute - specializing in blue carbon projects with work ongoing with mangroves in the Philippines. Uba will be coordinating the DF activities linked to blue carbon credits for MPAs.
3. Blueyou - specialized in private sector led, coastal community-based, sustainable aquaculture and fisheries improvement programs, with a 10-year track record in developing projects for impact investment and ongoing program implementation in the Philippines; Blueyou will be coordinating the DF activities for reef-positive businesses linked to aquaculture of overfished reef species.
4. UNCDF Blue Bridge is a development-focused financial services entity to support the Global Fund for Coral Reefs, its implementers and partners. Blue finance and UNCDF have already structured an initial performance grant for the SPE 'Blue Alliance VIP' (from GFCR funding). UNCDF will be leading also the due diligence process for the investments and will provide on-demand financial advice.

The DF works in close partnership with Rare, UNDP, Conservation International Philippines and the University of the Philippines, which hold extensive track records in conservation activities across the 3 MPA networks. Strong partnerships have been built with the Government, local NGOs, private sector companies such as MELIOMAR and Community Organizations.

GFCR support

Between 2022-2029, GFCR support will contribute to:

1. Co-funding a Development Facility providing scientific & technical assistance to construct MPA concessions and bankable projects with high-quality environmental, social and financial design;
2. Co-funding early-stage CAPEX of 3 MPA networks with grants and concessional loans channeled through UNCDF to Special Purpose Entities. In 2022, the GFCR will invest in 2 MPA networks to improve their management and develop sustainable revenue streams based on MPA fees, visitor center fees and sales of blue carbon credits.
3. Co-funding early-stage CAPEX of reef-positive businesses that generate dividends and fees for MPA SPEs. Businesses include nature-based ecotourism, aquaculture of overfished reef fishes, fishery supply chain improvement projects and micro-finance for fisher communities. In 2022, the GFCR will invest in a mangrove crab aquaculture business in one of the MPA network.
4. Crafting MPA long-term management concessions, and establishing the SPEs with local partners. The programme will initially focus on 3 MPA networks: the Verde Island Passage (where the SPE has already been established for managing some of the MPAs), Calamian Island Group and Tañon Strait Protected Seascape later scaling-up with 2 additional MPA networks;
5. Designing and developing revenue streams for the SPEs through MPA user fees, visitor centres and blue carbon credits;
6. Designing and preparing a pipeline of reef-positive bankable interventions, with investment returns for the MPAs;
7. Provision of project management office services to the SPEs, to ensure a management focus on conservation and revenue strategy execution. Capacity building for local partners and communities will also be implemented;
8. Structuring the blended finance investment facilities for each MPA SPEs and fundraising with a pool of philanthropic, development, impact investors, local financial institutions and de-risking partners;
9. Providing visibility for the project, communicating results to a wide range of local and international audiences, and providing momentum for further interventions similar in nature.†



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The approach is transformative for MPAs, and precedent-setting for impact investment in marine conservation and economic development in the region (and worldwide).



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1. Focal Area(s) Environmental, Social and Policy Analysis

a. Ecological Characteristics

The project encompasses 3 distinct areas of marine ecological interest in the Philippines, where coral cover is reported to be in better condition than at other locations.

The VIP is a critical marine corridor of extensive coral reefs, mangroves and seagrass beds, which aid in the movement of species. Identified as one of the richest biodiversity areas in the Philippines and designated a marine conservation priority area, the VIP was found to have the highest concentration of marine fish species per unit area. Touted as the “center of the center” of the world’s marine shorefish diversity, with 1,736 overlapping marine species over a 10-kilometer area; the highest concentration of marine life in the world. Under the project 4,537 ha of coral will be protected in the first phase in Oriental Mindoro and 7,031 ha of coral in the second. 1,494 ha of mangroves forest will be protected, conserved and partially restored (mangroves).

The Calamian Islands lie within Palawan’s Biodiversity Corridor, which has been identified as a critical location for biodiversity conservation in the Philippines due to the richness of the waters, and the interface with the offshore systems of the South China Sea and Northern Sulu Sea coupled with increasing population and socioeconomic threats besetting its coastal resources. With extremely productive fishing grounds and relatively intact marine ecosystems, that include extensive fringing reefs, mangrove forests and sea grass beds; it is considered one of the most biodiverse groups of islands in the Philippines. Approximately 39 813 ha of protected space, will be impacted by our projects. Of this approximately 5483 ha is coral reefs (Calamianes MPA Network management Plan). Of note is the Concepcion- Sagrada Bogton MPA with 95% coral cover. There are at least 4815 ha mangroves protected within the MPAs (6550 ha in total) and of these 120 ha in the long run will be restored under our project. Coral reefs within the MPAs notably Siete Picados, Bugor and Concepcion are reported to be especially healthy compared those outside, where illegal activities (and GCC impacts are stronger). Due to the beauty and diversity of the area, it is reported to have immense tourism potential.

The Tañon Strait Protected Seascape or is a narrow body of water between the islands of Cebu and Negros, covering 521,018 hectares and borders 677 kilometers of coastline in three different provinces (Cebu, Negros Occidental and Oriental). This strait is known as one of ten most important fishing grounds in the country, its coastline is bordered by fringing reefs home to one of the richest marine ecosystems on Earth. Overall, the area possesses a rich assemblage of tropical coastal ecosystem assets - coral reefs, mangrove forests, and seagrasses. Within the Straits are 16,273 hectares of coral reefs (NOAA 2010) which are mostly fringing reefs along the Negros and Cebu coastline. Substantial coral reef areas are also found in Pescador Island in Moalboal, Cebu and Mantalip Reef, as well as a single barrier reef in Bindoy, Negros Oriental. There are around 650 ha of mangrove forest, along the Negros and Cebu coastline and 300 ha in the Talabong Mangrove Reserve, Bais Bay (Yambao, et al 2001; Aragones, et al 2013).

Climate Resilience

Global Climate Change is projected to increase sea surface temperatures, cause sea level rise, more acidic seas and increases in the frequency and intensity of storms of hurricanes. Impacts noted here are expected generally to be found throughout the project sites. Over the past decades, average decadal temperature has increased to 26.34°C and is expected to gradually rise to 28°C until at least 2110. An increase in Sea Surface Temperatures (SSTs) of 0.15-0.30°C/decade has been observed in over the last 2 decades. Interpretation of time series data (SSTs 1900 – 2008) suggest an increase of 0.06°C/decade.



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These temperatures are expected to be similar across the Philippines. The Philippines recorded its first mass bleaching event in 1998-99. Bleaching events have also occurred in 1998, 2007, 2010. Anecdotal reports of mass bleaching in 2020 were also made.

Sea level rise is not expected to be a major issue, as the predicted rise is slower than coral growth rates. We expect this to be similar throughout the project sites, due to the relatively similar topographies. As one of the areas of highest biodiversity in the Philippines, the VIP is a natural refugia for flora and fauna, as a result of the sheer abundance and diversity of species. In general in the VIP, coastal areas experienced less increase in SSTs temperature relative to areas offshore and might therefore act as coral refugia. Coral cover decline that can most likely be attributed to coral bleaching to date ranged from 3% to 22% across the Verde Island Passage. Significant re coral bleaching for the VIP is that anecdotal observations by Dr. Terry Goslinger showed high resilience to high temperatures. 25-30% experiencing massive coral bleaching during the 2010 event had almost completely recovered. The VIP appears also to act as a replenishment zone for fish. An ichthyoplankton survey in 2006 conducted by the University of the Philippines Visayas Foundation in the area initially showed high densities of fish eggs and larvae around a number of sites in the corridor, namely: Verde Island, Tingloy, the islets and shoals of Calapan, Puerto Galera, and west of Balayan Bay. The impact of typhoons in terms of wave fetch (created by typhoons for e.g.) is minimised due to the narrowness of the passage and is therefore expected to be less severe than other areas. The VIP therefore encompasses areas that range from vulnerable to GCC (e.g. Mabini, Labang) to resilient (e.g. San Juan, Calatagan, Puerto Galera).

In the Calamianes coral bleaching has been reported as sporadic, (though not via official networks) – no official bleaching monitoring reports were located however anecdotal reports from locals indicate a higher percentage of healthy vs stressed corals, with impacts primarily related to human action – primarily siltation from land. Based on the Philippine Bleaching Watch report, an incidence of coral bleaching was reported in 2016-2017 in the Tanon Straits and alerts are in progress for 2021. Climate models project an increase in these incidences in the coming years.

Biodiversity Overview

The 3 areas all exhibit exceptional coral reef and associated ecosystem biodiversity. The Verde Island Passage is touted as “the center of the center of marine shore fish biodiversity in the world” after the study of Carpenter and Springer (2005) and has been identified as a Marine Biodiversity Conservation Corridor (Ong et al. 2002). In addition to marine biodiversity and being home to red-listed species, The Calamianes is also a center of cultural biodiversity, with its indigenous peoples. The Tañon Strait Protected Seascape is the largest MPA in the Philippines and has been declared a protected sea scape due to exceptional biodiversity.

VIP (CI-P 2006)

coral sp. – 580

fish sp. - 739

Iconic sp. – 12 species of cetaceans; 12 species of elasmobranchs; 5 species of sea turtles (CI -P 2006)

Threatened sp. - 3 species of sea turtles, 1 shark, 1 filefish the IUCN Red List.

CALAMIAN ISLANDS

Coral genera – 47⁴

Fish sp. – minimum 70⁵

⁴ <http://www.oneocean.org/fish/calamianes.html>

⁵ Tupper et al 2009



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Iconic sp. - dugongs, several rare fish species such as blenny (*Ecsenius kurti* and *Istiblennius colei*) and dottyback (*Labracinus atrofasciatus*) (Werner and Allen, 2000)

Threatened: four species of sea turtles; two species of threatened marine crocodiles; sea cucumber spp.

TAÑON STRAITS

Coral genera - 37

Fish families - 24

Iconic sp. -dwarf sperm whales (*Kogia sima*) (Dolar and others 2006), and the melon-headed whales (*Peponocephala electra*), whale sharks (*Rhincodon typus*), Nautilus (*Nautilus pompilius*) (Hayasaka, et al 1988; Green, et al 2004).

Threatened: 3 shark species; 3 marine turtles species

Jurisdiction & Management

The Philippine government has a long history of conservation of marine and coastal resources. The 1987 Constitution of the Philippines contains numerous legal instruments for management and include the important role of local communities in management. It also grants autonomy to local governments in the management of marine resources. All of our project sites fall within MPAs. While MPAs started as primarily community-based efforts, they have now advanced to becoming instruments of local governments, enshrined in legislation. At the national level, the main laws that deal with MPAs are the National Integrated Protected Areas System (NIPAS) Act of 1992, Local Government Code of 1991, and Fisheries Code of 1998. Many municipalities and towns manage their MPAs as networks, governed via MoUs with local governors and mayors. The networks, which are typically comprised of supporters, leaders, enforcers and conservation advocates, allows for greater impacts and stronger community ties, consolidation of efforts and shared stewardship responsibilities. The resulting holistic perspective and synergy of efforts contribute more effectively and more efficiently to collective MPA goals.

The Corridor cuts across five provinces, so no single local government has exclusive jurisdiction over the area. Activities carried out in specific areas require the approval of the local government unit concerned (VIP Framework). The VIP falls within Proclamation No. 1028 of the Philippine Constitution that designates "the entire Sulu and Celebes Seas as an integrated conservation and development zone", in order to conserve the area's rich biodiversity while allowing sustainable development. Other executive Orders e.g. 533 adopt "integrated coastal management as a national strategy to ensure the sustainable development of the country's coastal and marine environment and resources." Order 578 which establishes the national policy on biological diversity and prescribed its implementation throughout the country particularly in the Sulu Sulawesi Marine Ecosystem and the VIPMC, and the Philippine Fisheries Code of 1998 further guide activities. The earliest MPAs were designated in 1991. In addition to the MPA designation, Puerto Galera is further listed under UNESCO as a Man and the Biosphere Reserve, for its demonstration of conservation and sustainable development approaches.



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b. Communities

The communities dependent on coral reefs all border the sea in our project areas and total 4.8M persons as in the table below.

	Province	Population
Calamianes	Busuanga	25,617
	Coron	65,855
	Culion	23,213
Tanon	Cebu	1,245,491
	Negros Oriental	839,867
	Negros Occidental	579,692
VIP	Batangas	1,225,233
	Marinduque	154,039
	Mindoro Occidenta	78,981
	Mindoro Oriental	482,110
	Romblon	15,849

Principal Sectors and Livelihood activities

Agriculture in general and fishing specifically is the major livelihood for the coastal communities of the three regions. Mindoro Oriental's fishing grounds are Calapan Bay, Tablas Strait, and Bulalacao Bay. These fishing grounds cover 13 coastal municipalities. In the 2012 report by Conservation International, there were 9,508 documented commercial and municipal fishers in Batangas and 1,477 in Oriental Mindoro.

In the Tanon Straits, while the Negros and Cebu's economies don't rely wholly on fishing, this activity provides food and livelihood for millions of people on these 2 islands. Most of the fishers stay along the municipalities bordering the Tañon Strait. 76% of them stay within their municipal water or in 15km boundaries.

Tourism is concentrated in the marine and coastal areas of each project site. The TSPS for example is surrounded by beautiful beaches, freshwater springs, and other natural attractions. As such, the municipalities and cities around the TSPS each have their own ecotourism programs and destinations within their respective jurisdictions. The ecotourism activity that cuts across political boundaries in the TSPS is dolphin- and whale-watching. Bais City in Negros Oriental is the main springboard for this activity for most of Tañon Strait. This contributes greatly to the income generation for the residents in the area. The establishment of the necessary infrastructure and manpower support has become a priority for the respective LGUs in order to maximize the ecotourism potential and enable TSPS as a major ecotourism destination. Scuba Diving is a popular activity for visitors in the region, with Moalboal being a world class dive spot known all over the world hosting itself with 19 PADI or SSI-accredited dive shops and dive resorts. Diving is also popular in towns such as Santander and Bais City. Increasing the health of the marine environment will certainly attract more scuba divers in the area.

Puerto Galera in Oriental Mindoro is another tourism dependent site, relying heavily on dive tourism associated with coral reefs. The target market, primarily stay-over visitors, is consolidated (>3 500 hotel beds for more than 400,000 visitors in 2019) and dynamic (annual average growth >8% since 2017). Puerto Galera is one of the premier dive locations of Philippines, famous for beautiful beaches, exquisite diving and close to the capital Manila (50% of the visitors are from the Philippines). There is also a demonstrated market need for more vibrant biodiversity, to promote the sensation of being a



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pro-environment visitor, as well as for discovery of the UW world without getting wet. Ecotourism is also associated with mangroves as seen in the Silonay Mangrove Conservation Ecopark, a 42 hectare, community managed reserve and the largest such park in Oriental Mindoro.

The Calamian archipelago is recognized as one of the last unspoiled marine environments and animal habitats in the world. It is heavily promoted by regional and national government as a new tourist destination. Busuanga Island, the biggest of the islands, serves as the jumping point to all different activities. Coron Town (main settlement) is located at the southern part of Busuanga island and is a haven for wreck divers (WW2 Japanese wrecks, 14 wreck dives between 5-40 meters). Since 2009 Coron has been the second top destination in Palawan next to the provincial capital of Puerto Princesa City. Coron accounted for 85 hotel establishments (1355 rooms) and 120,000 visitors p.a. (in 2019).

In the Calamianes, Palawan is home to several indigenous ethno-linguistic groups namely, the Kagayanen, Tagbanwa, Palawano, Taaw't Bato, Molbog, Cuyonan, and Batak tribes. They live in remote villages in the mountains and coastal areas. The Tagbanua in particular are heavily dependent on coastal resources for livelihood. However Indigenous People (IP) are losing their lands and resources to extractive industries, mono crop plantations, and calamities among others. Urgent action is needed to address the particular concerns of indigenous persons to ensure that these communities are not left behind in the achievement of the SDGs.

Coral Reef ES - # beneficiaries

Little information is available on the economic value of coral reefs however values for coral reef by country indicate annual net benefits per km of USD\$5,700 (tourism); USD\$24,000 (fisheries); USD\$110 000 (Burke et al. 2002). Beneficiaries are indicated in the numbers of households that benefit from coral reef ecosystems, which includes all communities bordering the sea and several further inland as well. The exact number of beneficiaries will be defined in the next stages, however, for example, VIP provides food, livelihoods and other benefits to over 2 million people. In Calamianes, approximately 934 households and a minimum of 182 fishers, directly benefit from the MPAs. In Tañon Strait, approximately 2.1 million people depend on the Strait as a source of food and livelihood. It is one of the region's major fishing grounds and supports at least 26,850 fishers operating in the area.

The Blue Carbon projects will create additional income from the sales of carbon credits, as well as parallel activities of sustainable tourism and monitoring activities. In North Oriental Mindoro, considerable scientific efforts were undertaken to assess the carbon content in carbon sinks. The studies indicate a gross average potential of 2.013 tCO₂e /ha for the conservation of existing areas (549 ± 30 tC/ha) and 37 tCO₂e/ha.y⁻¹ for plantation of new areas (10,2 ± 0,7 tC/ha.y⁻¹) in both living biomass and soil compartments. The gross carbon credit potential generation would be from 85.000 up to 170.000 tCO₂e over the project period (30 years).

Community Based Management & Cultural Value

Within the Philippines, the Bantay Dagat are persons from the community who patrol within 15 km from shore to prevent illegal activities, especially fishing. In some cases, they are volunteers and in others, are paid a small stipend. The Bantay Dagat work with and are trained by local and national government officials, coming under the office of the Bureau of Fisheries and Aquatic Resources (BFAR) of the Philippine Department of Agriculture. They are often trained and supported by their coast guard and municipal police. This participatory approach for law enforcement was developed in 1994 and at present there are over 100 000 in the Philippines.

Examples of other community based initiatives include:

Kabuhayan at Kalikasan para sa Mamamayan ng Brgy. Lazareto (KAKAMBAL), a people's organization composed of mainly 50 women and men volunteer Bantay Dagat and fisherfolks. Co-managing the 37-



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hectare Harka Piloto Fish Sanctuary in Brgy. Lazareto, Calapan. The group offers tour packages including island hopping and turtle hatching/releasing experience.

KAbisig ng Mangingisda ng Ilag (KAMI) is a people's organization mandated by the LGU to co-manage the 112-hectares Punta Ilag Fish Sanctuary in the Municipality of San Teodoro. The 85 members composed of women and men volunteer BDs and fisherfolks PO has developed the MPA as a dive and snorkeling site complimented by camp sites and picnic cottages. In addition, KAMI is into sewing and micro-financing.

Sama-samang Nagkakaisang Pamayanan ng Silonay (SNPS) was founded by fisherfolks in 2009 and is composed of 134 women and men. It co-manages the 41-hectare Mangrove Conservation and Eco Park in Barangay Silonay, Calapan. SNPS has now grown to about 100 members with a cooperative-like organizational structure. It has initiated various livelihoods such as catering and payment for ecosystem services through its mangrove park and kayaking.

Samahan para sa Pangkabuhayan ng mga Taga Dulangan (SPTD) is a people's organization composed of 47 volunteer women and men Banatay Dagat and fisherfolks co-managing the 22-hectare Puerto Galera Mangrove Conservation and Ecotourism Area (PGMCEA) with the Tabinay Puerto Galera Sagip Kalikasan, Kabuhayan Movement. SPTD earns from the user's fee entering the mangrove boardwalk. It has also diversified into food processing as part of its enterprise.

LIKHA is a people's organization composed of 134 women and men volunteer BDs and fisherfolks co-managing the 147-hectare Baco Marine Protected Area in Barangays San Andres and Pulangtubig, in the municipality of Baco. Its MPA is composed of 39 hectares of coral reefs and 108 hectares mangrove area. LIKHA has been awarded as one of the best Bantay Dagat enforcement team and Most Outstanding MPA in the province by the Provincial Government. They are into palm vinegar production and crab-fattening within the MPA with the support of Provincial Government, BFAR and NGOs.

c. Country Track Record for Conservation

The Philippines has a long history of marine conservation, and is especially strong in terms of participatory management of MPAs, entrenched in legislation. The 1987 Constitution of the Philippines serves as the overarching framework for conservation legislation, while the The National Integrated Protected Areas System Act of 1992 (Republic Act No. 7586) sets out a national framework for establishing national parks and protected areas. An integrated policy planning and management framework for addressing the country's entire marine, coastal, and ocean-related interests came in 1994 when the National Marine Policy (NMP) was adopted. Locally managed MPAs have been empowered by the Local Government Code of 1991 which empowers LGUs to establish marine protected areas (MPAs). In 2006, the President issued an Executive Order (No. 578) to establish a national policy on biodiversity, which was implemented country wide, particularly in in the Sulu-Sulawesi Marine Ecoregion (SSME) and the Verde Island Passage Marine Corridor.

- The Philippine Development Plan (PDP, 2017-2022) gives priority (under Sub-Sector Outcome 1: 'Biodiversity and functioning of ecosystem services sustained', Strategy: 'Intensify sustainable management of natural resources through the adoption of ridge-to-reef approach and SIAD') to the following interventions in the 'Coastal and Marine' ecosystem: (i) 'Strengthen law enforcement and the management of coastal and marine areas'; (ii) 'Rationalize the identification of MPAs and their networks'; and (iii) 'Intensify research on coastal and marine habitats and resources'.

- The Philippines Biodiversity Strategy and Action Plan (PBSAP, 2015-2028) details the national strategies and programmes for the conservation and sustainable use of biological diversity under the Convention on Biological Diversity (CBD). The project aligns with a number of the Enabling and Direct



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Programme Interventions under the 'Coastal and Marine' ecosystem and 'Protected Area' themes of the PBSAP.

- The National Framework Strategy on Climate Change (NFSCC, 2010-2022) targets the improved resilience of coastal and marine ecosystems and communities to climate change, and promotes the mainstreaming of biodiversity adaptation strategies in national and local policies, strategies and programs.

- Philippines has adopted numerous policies, legal instruments, and strategies that further support and enable the conservation marine wildlife and their habitats. These include the: (i) Wildlife Resources Conservation and Protection Act (RA 9147); (ii) Fisheries Code (RA 8550, as amended by RA 10654); (iii) National Integrated Protected Areas System (NIPAS) Act (RA 7586, as amended by RA 11038); (iv) Local Government Code (RA 7160); (v) Civil Code (RA 386); (vi) Coastal and Marine Ecosystem Management Program (CMEMP 2017-2028); (vii) Sustainable Coral Reef Ecosystem Management Program (SCREMP) and (viii) Biodiversity Friendly Enterprises (BDFE) program.

These national-level policies, legal instruments and strategies are in turn supported by a hierarchy of plans and programmes at regional and local levels, with a diversity of institutions in government and civil society mandated to facilitate their implementation.

- The DENR-BMB currently administers three major programs in its portfolio: The first, the Protected Area Development and Management program, covers the main in-situ measures required to conserve biodiversity within and adjacent to protected areas within the National (and Expanded) Integrated Protected Area system (NIPAS). It also provides appropriate governance regimes for the protection of Key Biodiversity Areas (KBAs) such as through Local Conservation Areas (LCAs) with the LGU concerned and through Indigenous Community Conserved Areas (ICCAs). The Ecotourism Development Program (linked to the National Ecotourism Strategy) also falls under this program. The second, the Management of Coastal and Marine Resources/Area program, focuses on the sustainable management of coral reefs, sea grass beds, mangrove stands, soft bottom areas (mudflats), plankton community, and water quality of coastal areas. Under this Program, the Coastal and Marine Ecosystems Management Program (CMEMP, 2017-2028) is working to improve the management of the country's coastal and marine ecosystems and includes facilitating the establishment and strengthening the management of marine protected areas and building institutional and individual capacities to manage coastal and marine resources. The third, the Protection and Conservation of Wildlife program, which prioritises activities linked to (a) sustainable wildlife resource use; (b) management of invasive alien species (IAS); and (c) wildlife enforcement, include the operations/mobilization of Wildlife Traffic Monitoring Units (WTMUs) and Wildlife Enforcement Officers (WEOs); (c) operations and maintenance of Wildlife Rescue Centres (WRCs); (d) establishment and management of Critical Habitats; and (e) conservation of threatened wildlife species (including dugong and marine turtles).

- The DA-BFAR has, with the technical and financial support of USAID (under the Ecosystems Improved for Sustainable Fisheries [ECOFISH] Project) established 12 Fisheries Management Areas (FMAs) covering all the major fishing grounds of the country (FAO 263 of 2019). It is currently in the process of developing a science-based and participatory governance framework for their management. Each FMA will convene a management board, where all stakeholders are represented. Each management board will then develop policies and programs for the FMA based on an ecosystems approach to fisheries management, as well as local government ordinances that would promote sustainable fishing. The DA-BFAR will also convene scientific advisory groups (SAG) with representatives from academic institutions, BFAR regional offices, municipal fisherfolk groups, the commercial fishing industry, and NGOs.

- Recently, Memorandum Circular (JMC) Guidelines on the establishment and management of Marine Protected Area Networks (MPANs) which lays down the basis, criteria and processes for the establishment and management of MPANs in the Philippines has been signed by DENR, and expected to be co-signed by BFAR and Department of Interior and Local Government (DILG).



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Legislation is not solely around MPAs, but also encompasses negative impacts. Control of marine pollution for example was first addressed in the 1970s with various provisions of the Philippine Environment Code. The Ecological Solid Waste Management Act of 2000 prohibits land-based environmental degradation as well as illegal dumping of waste that causes water pollution. Permits for fish ponds are regulated by the Fisheries Administrative Order No. 60, which prohibits wide-scale conversion of mangroves into fishponds. In 2006, Integrated Coastal Management was adopted nationally as a strategy to develop the country's marine and coastal resources.

Government commitments and initiatives for protecting marine natural capital.

In terms of Government Commitments, a National Plan of Action has been developed by the Philippines National Coordinating Committee for the Coral triangle Initiative (CTI) with 5 Goals: Goal 1: Priority seascapes designated and effectively managed; 2: Ecosystem approach to management of fisheries and other marine resources fully applied; 3: Marine protected areas established and effectively managed; 4: Climate change adaptation measures achieved and 5: Threatened species status improving.

Global initiatives include: the 1992 Declaration of the United Nations Conference on Environment and Development (UNCED), which stimulated the inclusion of the environment in national development plans.; Agenda 21, Chapter 17 which calls for protection of the oceans, all types of seas, and coastal areas; and for the protection, rational use, and development of living resources. The Philippines responded to Agenda 21 by formulating Philippine Agenda 21 that called for a national marine policy; enactment of a fisheries code; and preparation of coastal zone management plans at the national, regional, and local levels. The major goal of Philippine Agenda 21 is "harmonious integration of a sound and viable economy, responsible governance, social cohesion and harmony, and ecological integrity to ensure that development is human development now and through future generations." This implies a mandate for ensuring sustainable rural development that benefits all stakeholders. Further, the Philippine government formulated a National Biodiversity Strategy and Action Plan for 2015-2028, which is a principal instrument for implementing the Convention of Biological Diversity (CBD) at the national level.

Government Plans creating an Enabling Environment for success & engagement of conservation

The Government has created an enabling environment for conservation success by championing the legislation identified, establishing and nurturing participatory management with communities and providing on going education for communities.

Prior to the pandemic, the Philippines' economy was one of the fastest and largest growing economies in ASEAN, with an average GDP growth of 6.6% from 2016 to 2019. The government prioritized reforms that opened new sectors to foreign investment and improved competition. Some specific actions that been taken to create a stable economic environment in the country and attract foreign investments in recent years include the below:

The Central Bank successfully adopted policies that derived into the lowest inflation levels in almost three years: 1.7% (at the end of Aug 2019)

In 2019, the Ease of Doing Business Act was implemented to streamline business approval business. As a result, Philippines' ranking in terms of Ease of Doing businesses published by the Works Bank, improved from ranking 113 (out of 190 countries) in 2018 to 95 in 2020.

Although the Foreign Direct Investment (FDI) inflows to the Philippines fell by 25% from 2019 to 2020 there is an ongoing strong investment campaign aimed at improving FDI. As part of this campaign, in April 2021, a new Singapore-inspired tax law was launched to reduce corporate income tax and boost foreign investment.

In November 2020, the Regional Comprehensive Economic Partnership (RCEP) was ratified. The RCEP that is the largest trade pact in terms of GDP and that includes the Philippines along with other 9



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Southeast Asian economies, China, Japan, South Korea and Australia will further attract FDI to the Philippines.

In January 2021, it was confirmed an investment grade rating for the Philippines

Financial environment for investing in conservation, SMEs, microfinancing institutions, etc.

Despite the current global financial environment derived from the pandemic, the Philippines continues to confirm its commitment for developing an attractive environment on strategic sectors like conservation, biodiversity, financial inclusion.

Philippines has defined a target of 70% reduction of GHG emission by 2030. The Philippines is the 3rd largest green bond issuers in ASEAN (USD2.02bn as of Aug 2020) and the trend is expected to continue. According to BIOFIN, Philippines stands firm on its commitment to increase financing for protected areas.

The Biodiversity Management Bureau (DENR-BMP) is currently working with BIOFIN on addressing biodiversity finance challenges and designing financial solutions for implementation in biodiversity conservation in the country.

BIOFIN works closely with the Philippine Business for Environment (PBE), Philippines Business for Social Progress, Philippine Tropical Forest Conservation Foundation (PTFCF) and Peace and Equity Foundation (PEF) in identifying opportunities for private sector investment in biodiversity-friendly enterprises through a Marketplace.

The government recognizes that besides expanding the protected areas and allocating annual resources (i.e. ENIPAS Act signed in 2018), it is necessary to tap into investments from the private sector in specific protected areas. In this sense, Public-private Partnership (PPP) has been confirmed as a finance solution to achieve so. In August 2021, an MOU was signed between the Public-Private Partnership Center and the Department of Environment and Natural Resources –DENR-BMP to ensure that the use of protected areas in developing PPPs is consistent with the principles of biological diversity and sustainable development.

In May 2021, the USAID and the Philippines government (DENR) signed a 4-year agreement to protect the environment, promote sustainable use of natural resources, and reduce risk from natural disasters. Mindoro Biodiversity Conservation Foundation and the Malampaya Foundation Inc. recently have state that investing in nature is key for conserving biodiversity and easing poverty. MBCFI is closely working with the DENR in different conservation projects in Mindoro and one of the main issues identified in the marine ecosystem is the increasing introduction of invasive plant and animal species. These alliances are aiming to tap the local government, national agencies and communities for a massive reforestation of Mindoro Island.

The private sector in the Philippines is responding to these challenges and opportunities through their interest in green bonds, buoyed by the Central Bank's Sustainable Financing Framework, and its recent decision to invest in green bonds launched by the Bank for International Settlements. This follows after the Securities and Exchange Commission (SEC) issued guidelines for voluntary environmentally sustainability reporting for all publicly listed companies. The government also legislated its Green Jobs Act which provides incentives to companies employing eligible employment in green jobs. The Philippine Board of Investments is also implementing Climate Incentives for Manufacturing (CLIMA) provides targeted financial incentives scheme to promote energy efficiency and conservation, and greening the manufacturing industry and sub sectors.

UNDP also has existing and planned support in mobilizing private sector investments in climate action. Through the NDC Support Programme (NSPP), efforts are being made to establish the Climate Investment Network (CIN) initially in the CCC; to facilitate access by private sector to capital for climate investments. Work are also on going in the preparation of the NDC Implementation Plan and NDC Financing Plan. The Project is also supporting CCC in the operationalization of the Green Jobs Act incentives system development and piloting of climate investment models and solutions. Finally, the



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NSPP implements advocacy and communication strategies to support acceleration of private sector climate investments.

In terms of micro credit, in 2005 the Philippines government launched the Microfinance Development Programme with a focus on raising the incomes of the poor by giving its citizens easier access to credit. The initiative developed a series of reforms aiming to enhance the enabling and regulatory environment of microfinance, building viable MFIs; increasing financial literacy and consumer protection for the users of microfinance.

According to the Economist Intelligence Unit, the Philippines remains one of the world's leaders in financial inclusion. Philippines ranks second in Asia and eight worldwide promoting financial inclusion. In 2020, the Central Bank of Philippines defined a set of financial inclusion initiatives to accelerate the financial inclusion and mitigate the pandemic effects. As part of these initiatives, such institution has taken regulatory relief measures to promote MSME financing.

Describe any other local funds or organisations with similar objectives to the GFCR and/or could be identified as future co-investors

Although it is not easy to identify local entities with the same mandate, structure, and scope of the GFCR, a few organizations (local and international) have been identified that have either some overlap in terms of scope or that could potentially participate by co-financing in some of the interventions and projects of this proposal and will be targets of Activity 1.3.3: Fundraising with a pool of investors & donors in order to blend donations, concessionary loans and impact investment.

Foundation for the Philippine Environment (FPE) United Nations Capital Development Fund (UNCDF) Association of Development Financing Institutions in Asia and the Pacific (ADFIAP) International Finance Corporation The Biodiversity Finance Initiative (BIOFIN) Blue Natural Capital Financing Facility Global Environment Facility Mandai Nature Temasek Foundation Asian Development Bank USAID Climate Finance Lab	Meloy Fund Optimus Foundation (UBS) Mirova Responsible Investment RS Group Becht Family Charitable Fund Giz Oceans5 ADM Capital Foundation The Rockefeller Foundation Walton Family Foundation Benioff Ocean Initiative David and Lucille Packard Foundation Mana Impact
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Conservation Efforts

The government retains overall responsibility for conservation, developing legislation and with government departments mandated to manage marine and coastal zones. To prevent further degradation of habitats and overharvest of marine organisms, the Philippine government formulated a National Biodiversity Strategy and Action Plan for 2015-2028, which is a principal instrument for implementing the Convention of Biological Diversity (CBD) at the national level. Target 3 states that by 2028, there will be no net loss in presence and area distribution of live coral cover, mangroves, and seagrasses 20 speaks to 20% increase in MPAs. Government and NGOs carry out the The Coral Reef Visualization and Assessment (CoRVA) and National Assessment of Coral Reef Ecosystems (NACRE). In 2014, the Philippine government included the Mangrove and Beach Forest Development Project (MBFDP) as a component program under the National Greening Program (NGP). This is in recognition of the important role of mangrove and beach forests as natural defenses against storm surges and as protection to coastal communities, following the devastation brought by Super Typhoon Haiyan to the Visayas region in 2013. Stakeholders from local government units (LGU), civil society organizations



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(CSOs), and the private sector participated in the implementation of the MBFDP in disaster-affected areas. This Project also emphasized the importance of mapping and collecting baseline data in target sites as basis for future impact assessments. A total of 50,000 hectares of mangroves and beach forests are targeted for development, planting, and enrichment. At the national level, the DENR implemented a project Strengthening Marine Protected Areas to Conserve Marine Key Biodiversity Areas in the Philippines (SMARTSeas PH) that aimed to accelerate establishment of MPA and network of MPAs as part of the marine key biodiversity areas (MKBAs). To complement such national endeavour, Republic Act 11038 or Expanded National Integrated Protected Areas System (e-NIPAS) Act was legislated that gives protection to corals, seagrasses, and mangroves in all declared protected areas within the NIPAS in the Philippines. Collaborations are also made with NGOs such as Reef Check Philippines, Marine Aquarium Council and Tropical Marine Research for Conservation.



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2. Analysis of Drivers of Degradation

Table 1: Analysis of Drivers of Degradation

Threat Present (Check the box and complete row if yes)	Specific area(s) where threat activity occurs AND where impacts are observed	Actor(s) responsible (e.g., local sugar cane farmers, copper mine, cruise ships)	Magnitude of threat and impact (e.g., xx MT of harmful agricultural runoff from xx farms, impacting 100 ha of coral reefs)	Existing local strategy or project/initiative to mitigate the threat?
<input checked="" type="checkbox"/> Coastal development (including tourism infrastructure)	All project sites esp. Tanon Strait, OM-PG, Calapan, Calamian Islands	Coastal Developers, Beach resort owners, Government	At least 3000 ha coral reef in PG – Polchan & Brgy. Poblacion, Tabinay and Dulangan	DENR and LGUs mandated to issue clearances/permits for construction.
<input checked="" type="checkbox"/> Overfishing	In all project sites	Local & Int. fishers	61 286 ha of reef	Bantay Dagat patrols; Coastguard, BFAR, MPAs, conservation awareness with Fishers and community
<input checked="" type="checkbox"/> Destructive fishing practices (blast, cyanide, trawling, etc.)	In all project sites	Local fishers	61 286 ha of reef	Bantay Dagat patrols; Coastguard, BFAR, MPAs, conservation awareness with Fishers and community
<input checked="" type="checkbox"/> Irresponsible marine and freshwater aquaculture	All project sites, but specifically 1. VIP 2. Batangas	Coastal Communities	1. 1990 – 2010 – 357 ha of mangrove converted to fish ponds. Rate of change 2:0 2. Rate of change 1:2	Mangrove restoration initiatives, establishment of mangrove protected areas, promotion of good aquaculture practices, integrated coastal resource management (ICRM), The Department of Agriculture through its regional and Provincial Offices and the Southeast Asian Fisheries Dev't Center (SEAFDEC) provide technical



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				assistance on good agricultural/aquaculture practices Reversion of abandoned, undeveloped and underutilized fishponds into mangrove forests thru DENR National Greening Program or local mangrove restoration programs for blue carbon credits.
<input checked="" type="checkbox"/> Poor agriculture and livestock practices (leading to harmful runoff and poor water quality)	All project sites. Backyard husbandry including pigs chickens and goats – faeces not in commercial operation	Coastal communities. poor	Threat mentioned in all management plans but not quantified.	LGU's ICRM but not implemented effectively/not all LGUs have ICRM yet.
<input checked="" type="checkbox"/> Unsustainable tourism (overcrowding, cruise ships, etc.)	All project sites. In particular Puerto Galera in the OM from overcrowding –	Local & National Government Foreign visitors	Unknown	Identification of carrying capacities; establishing permanent moorings, tourism awareness, enforcement of comprehensive land- and water-used plan (CLWUP) – Blue Alliance
<input checked="" type="checkbox"/> Poor wastewater treatment	All project sites esp. Harko Piloto	Local & National Government Local communities	Unknown	Construction of new wastewater facility, e.g. in PG
<input checked="" type="checkbox"/> Garbage and solid waste (plastics, leaching from landfills, etc.)	Harko Piloto – major issue – indiscriminate dumping	Local & National Government Local communities	Unknown	Strict enforcement of solid waste management law. All barangays are mandated to have a materials Recovery Facility for waste segregation. LGUs have Recycle, Reuse and Reduce policies.



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<input checked="" type="checkbox"/> Invasive species	Puerto Galera (crown of thorns)	Possibly via Ships	Unknown	Unknown but this should be of concern and be monitored as well
<input checked="" type="checkbox"/> Coral Reef disease (e.g., stony coral tissue loss disease) <i>Porites</i> ulcerative white spots (PUWS) and coral tumors	Tañon Strait	Its cause remains unknown.	<p>[3] Kaczmarek 2006 study observed PUWS occurrence in sites facing Tañon Strait that gradually increase from the northernmost sites south to Dumaguete City. In conclusion, the occurrence of high prevalence is positively influenced by factors associated with the Tañon Strait and that prevalence increases as one approaches the most geomorphologically constricted point of the Tañon Strait, between Dumaguete City and the southern tip of Cebu.</p> <p>10,026 <i>Porites</i> colonies were examined at 28 sites in Central Visayas covering an area of 3,080m².</p> <p>39.1% of coral tumors occurred among massive <i>Porites</i> and 53.7% of PUWS occurred among massive & branching <i>Porites</i>.</p> <p>[4] Raymundo 2006 study discusses the prevalence of the</p>	Siliman University Marine Lab (SUML) – further monitoring and research studies to investigate causes of coral diseases and its linkage to human activity.



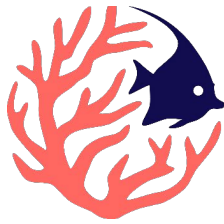
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<p>Other coral diseases/impacts recorded:</p> <ul style="list-style-type: none"> - Black Band Disease - Skeletal Eroding Band - White Syndrome - Brown Band Disease - <i>Drupella cornus</i> gastropod predation - <i>Coralophyllia violacea</i> gastropod predation - <i>Acanthaster planci</i> starfish predation - Overgrowth & compromised health 	<p>Puerto Galera, Or Mindoro</p>	<p>Its cause remains unknown but this can be attributed to favourable environmental conditions for their proliferation, like nutrients, absence of potential predations, etc.</p>	<p>following coral diseases in MPAs of Central Visayas.</p> <p>Recent massive occurrence in most PG's coral reefs</p>	<p>Divers' Association initially collected about 500 COTS in just 3 sites for 3 days last September 2021. LGU's MENRO also called a multistakeholders meeting to address the issue that includes manual collection, injection of diluted vinegar, monitoring the collection area, and revival of management council.</p>
<p><input checked="" type="checkbox"/> Energy production and mining (Clean energy, Fossil Fuels and extractives)</p>	<p>Tañon Strait Pipeline Harka Piloto Calapan oil slicks observed but no studies</p>	<p>Toledo City, Cebu - Copper Mine</p>	<p>^[1] Aliño 1984 study records a reduction of live coral cover to only 8-10% at the proximal areas of the mine submarine tailings discharge points, compared to a relatively fair coverage of around 40% at the farther stations.</p>	<p>DENR Mines & Geosciences Bureau – regulation and monitoring of mining operations.</p> <p>Treatment facility. A 25-year ban on mining in Or. Mindoro</p>



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		<p>[2] Cabahug 2021 study (three decades after mine closure), reexamined the sites and observed further degradation of the marine environment from a combination of these reasons – (1) acid mine drainage, (2) presence of port & coal power plants, (3) urbanization, and (4) ocean acidification.</p>		
<p><input checked="" type="checkbox"/> Marine traffic and shipping</p>	<p>Tañon Strait</p>	<p>Shipping vessels, outrigger vessels for ferrying passengers, and small fishing boats that are also commonly used in dolphin-sighting tours.</p>	<p>Primarily affects the migratory route of at least 11 recorded cetacean species in Tañon Strait due to anthropogenic disturbance from heavy fishing and tourism activities.</p> <p>[5] A survey in 2020 has confirmed declining trend in sightings of dolphins and whales. Researchers tallied a new low of just 15 sightings or encounters with six species of dolphins and whales – significantly lower compared to the first comprehensive study done in the marine corridor 20 years earlier.</p>	<p>Collaboration efforts from TSPS stakeholders in balancing the protection of a species or their natural habitats with the needs and demands of the community living in and around it.</p> <p>Working with research institutions, NGOs and conservationists in systematizing the conduct of regular surveys and assessments of marine mammals of Tañon Strait for effective streamline conservation efforts on the ground.</p>



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				Sea lane for shipping assigned by Philippine Maritime
<input checked="" type="checkbox"/> Logging and wood harvesting	All project sites	Local communities	Unknown	Logging Ban in Or. Mindoro
<input type="checkbox"/> Other				



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3. Programme Strategy

Problem statement

Coral reefs face extinction as climate change impacts accelerate and marine conservation initiatives are not attracting impact capital at the same pace as the rest of the impact investment market.

Main drivers

- Immediate drivers – Unsustainable and damaging practices by communities and businesses (overfishing, coastal development, agricultural run-off, pollution, etc.)
- Underlying drivers – Climate change leading to extensive coral bleaching
- Structural drivers – Shortage of investment-ready projects, weak local capacities, high perceived risk of investing in blue natural capital, lack of knowledge of the market, all of which lead to high interest rates.

Pathway to Change

IF the programme deploys grants to build the capacities of local conservation actors and the local private sector, THEN Marine Protected Areas will have the resources and skills to become effectively managed and financially sustainable.

IF bankable interventions for investment are created for MPAs and IF the programme co-funds early-stage investments and structures guarantees and concessional loans with third parties, THEN there will be private sector investment in MPAs, businesses and financial instruments that address the drivers of coral reef degradation and provide blue economy livelihoods opportunities for local communities.

IF the drivers of coral reef degradation are addressed, THEN coral reef ecosystems will be healthier and more resilient to the impacts of climate change, and the communities that rely on them will have sustainable income-generating economic opportunities.

Logic of the intervention:

The programme will target the bottlenecks that hinder private investment in reef-positive initiatives such as MPAs. The programme will prepare and design MPA projects that are investment grade, implement and manage those bankable projects, fundraise, train, and establish a robust M&E framework to monitor impact.

The programme is structured around the following interventions:

(1) Structuring of 3 co-management special purpose entities (SPEs) that will protect, manage and monitor 3 networks of Marine Protected Areas (MPAs) on behalf of Governments in priority coral reef sites in Philippines. Co-management is based on long-term management lease for a network of MPAs signed with local governments.

(2) Establishment of a development facility managed by three business developers with support from UNCDF to construct MPA projects with high-quality environmental, social and financial design, and develop reef-positive businesses supporting the MPA networks. Due to limited self-financing capacities, and the insufficiency of public funding, MPAs often lack the resources to adequately protect, manage and improve coral reef ecosystems. To address this, the MPAs will generate revenues to fund their management by:

- (i) catalyzing direct income from MPA fees, MPA visitor center and blue carbon credits and,
- (ii) receiving indirect revenues through investment returns, dividends and fees from reef-positive businesses in and around the MPAs.

The development partners, Blue Finance, Blueyou and Ubá currently have different interventions in their pipeline, but projects require assistance to prepare investment transactions to meet investor's



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requirements and to develop sustainable business models balanced with positive impacts on reef systems and local communities. The development facility will design and structure a portfolio of co-managed bankable MPAs and reef-positive investments that will benefit MPAs and which are attractive for the private investment window of the GFCR. Reef positive businesses include nature-based ecotourism, aquaculture of overfished reef fishes, fishery supply chains and micro-finance for fisher communities. The development facility will design and fundraise for MPA blended finance investment facilities mixing grants, junior debt, senior debt and guarantees for the projects. The development facility will implement an M&E framework to measure the socio-economic, management and ecological impacts of project activities. The M&E framework will be harmonized with the GFCR Investment Principles and M&E Strategy to ensure the fund-level indicators are captured.

(3) Creation of MPA blended finance investment facilities to leverage private investment for the pipeline deal and mixing grants, junior debt, senior debt and guarantees for the MPAs. Partners are developing investment grade businesses in eco-tourism, sustainable aquaculture and fisheries. The programme will help leverage the commercial investment capital by providing grant funding for early-stage capital expenditures and local organizational support. The programme will increase positive impacts and reduce commercial and ESG risk of the bankable projects. The geographic scope (all bankable projects around the 3 MPA networks) and the similar business models in each MPA network will allow for aggregation of the pipeline of investments, reduction in the transaction costs and improvements to the risk profile of the investment portfolios.

The Development Facility partners currently have several projects close to investment readiness (expected in 2022) linked to the effective management and financial sustainability of 2 MPA networks. The programme will provide grant funding for early-stage capital expenditures and local organizational support in:

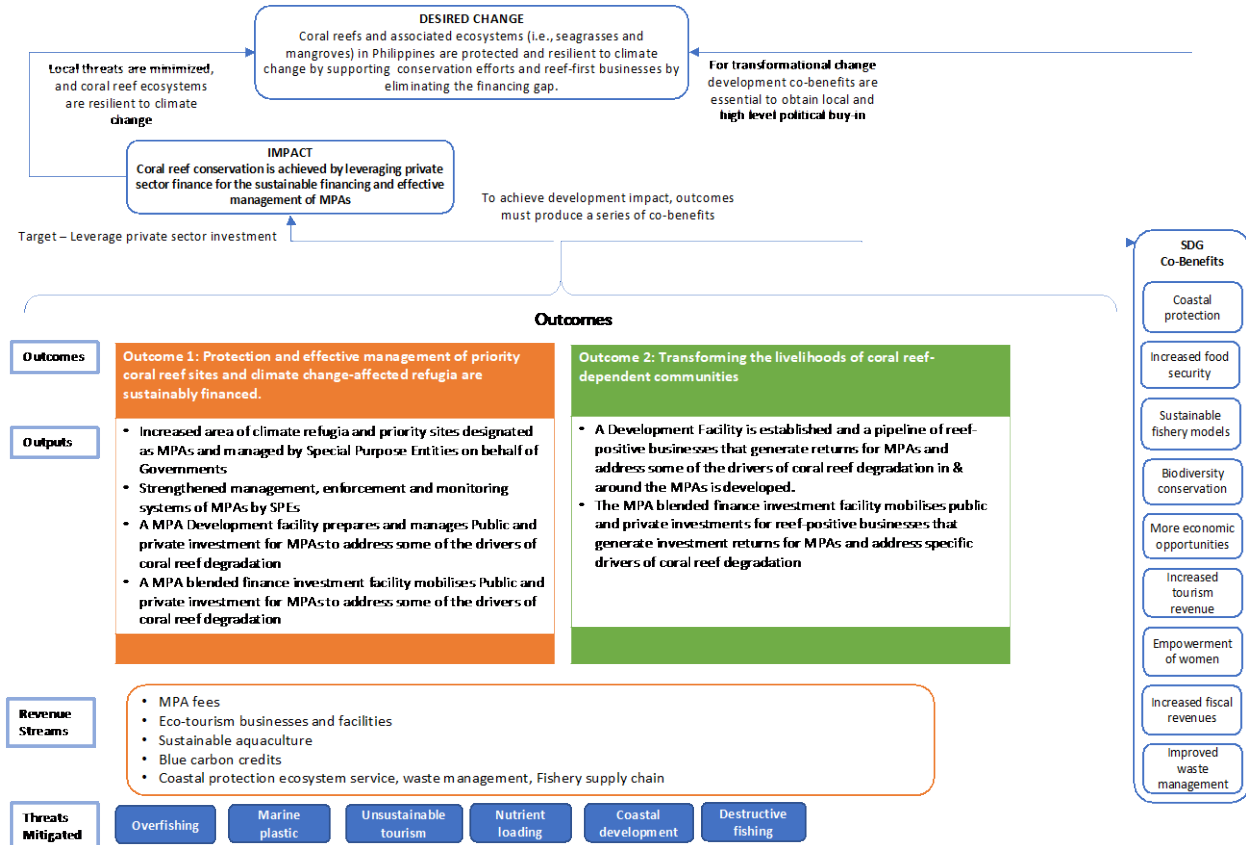
1. MPA equipment and facilities to improve their management and develop sustainable revenue streams (such as MPA vessels, moorings and scientific equipment for effective law enforcement and conservation, MPA eco-tourism facilities and visitor center to improve visitors' experience and revenues, and mangrove restoration programmes);
2. A mangrove crab aquaculture (hatchery and grow-out farms) in the VIP MPA network. The investment will produce and sell crabs on local, national and international markets. The 'Blue Alliance VIP' will receive part of the dividends of the businesses as well as professional fees for enforcement and scientific monitoring assistance. Beyond improving MPA effectiveness, the intervention will reduce pressure on the natural population of mangrove crab and develop extra revenues for fisher community members.

Other projects are in development with an investment readiness expected in 2023 in the 3 MPA networks. Identified projects include nature-based eco-tourism (incl. a visitor center, new underwater attractions and set-up of nature fees paid by users), blue carbon (incl. credit certification and mangrove restoration), mangrove crab silviculture (incl. hatchery and supply chain), aquaculture of overfished reef fishes (groupers, incl. hatchery and supply chain), and aquaculture of endangered species (sea cucumber), quality improvement and Fair Trade models for tuna handline communities (selective artisanal pelagic fisheries, incl. supply chain). GFCR support will leverage commercial investment capital and revenues .



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THEORY OF CHANGE



Cross-cutting issues

This project will utilize participatory methods that prioritize sensitivity and inclusion with a focus on women, indigenous peoples, and poor communities that are often excluded. In the co-management of MPAs, defining who participates from the community will either limit or enable long-term success. Extensive consultations have already been held with local CBOs, fisher groups, women’s associations, indigenous representatives, local and provincial government representatives, relevant businesses, impact investors, fishery management offices, law enforcement, development partners, domestic financial institutions and other relevant stakeholders. Blue Finance worked with a range of local partners to identify key stakeholders to be involved and to participate in the project design process. Similarly, provincial and local government units collaborated with project plans.

Inclusive participation and decision-making will be central to project implementation. In the development of the co-management agreement, SPE, and advisory committees to the project, the participation of marginalized groups will be prioritised, ensuring a balance between women and men, minority groups, and relevant indigenous groups. Through the SPE and advisory committees, the project will ensure balanced and representative consultation in all activities, including but not limited to, development of management and business plans. Particular attention will be given to income generating activities that benefit women, youth and other vulnerable groups. This activity will incorporate the GFCR Safeguard policy that is currently in development.

All aspects of Free, Prior and Informed Consent (FPIC) will be upheld during project implementation and in alignment with the Philippine Indigenous Peoples Rights Act and the policies of the National



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Commission on Indigenous Peoples. At all phases, protecting the rights of indigenous peoples and local communities, and guaranteeing their meaningful involvement and participation will be paramount. In addition to gender and social inclusion principles, project and MPA staff will receive training and materials on FPIC guidelines and procedures, and FPIC principles will be integrated into implementation, monitoring, grievance mechanisms, and benefit sharing.

Similarly, there will be a strong focus on building the capacities of local people, with a particular focus on vulnerable communities and women, and in developing new sustainable livelihoods opportunities linked to the blue economy, including support in building entrepreneurial/business capacities. Capacity building activities will rely extensively on local community networks and organizations and other entities with a longstanding presence in project sites, and will be delivered in ways that are accessible for local people.

In 2020, Blue Finance conducted a Gender Analysis in this project's geographic region with inputs from local CBOs representing fisherfolks, women and youth involved in co-managing mangrove conservation initiatives, ecological parks and MPAs; and women's associations engaged in coastal and environmental protection. This project will use findings from this analysis and will also integrate lessons learned from other analyses and programming in the region to ensure gender-sensitive approaches. In this project, everyone will be included equally in capacity building and management opportunities for MPAs to fully capture gendered community needs and priorities and which will be critical to foster widespread support.

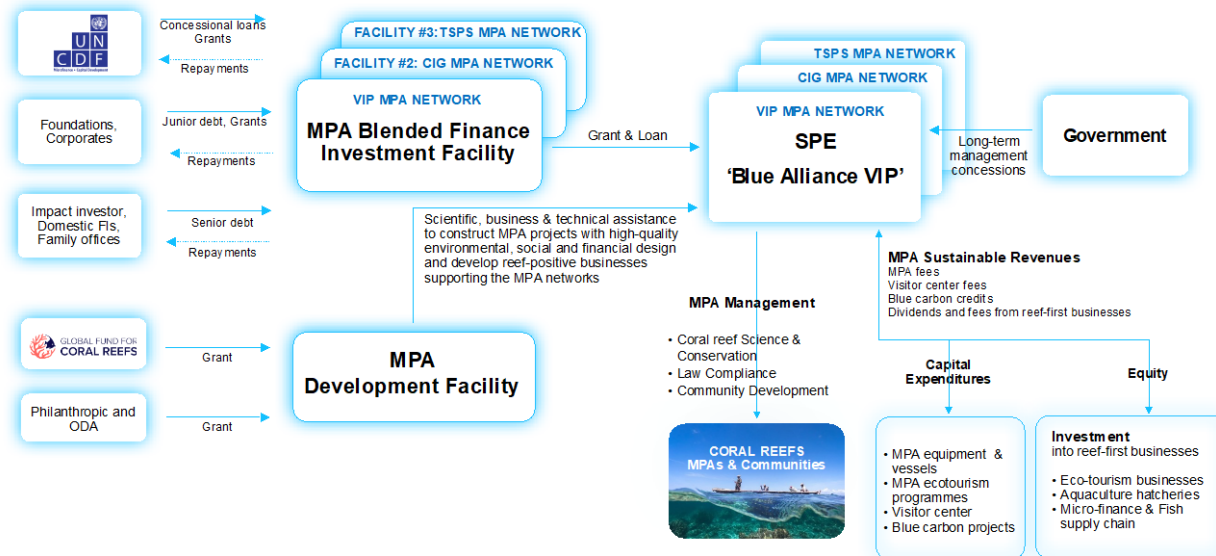
During project implementation and from the onset, a Gender Action Plan will be integrated into the Work Plan and shared with the GFCR Secretariat. We will train staff to identify and report potential unintended consequences and integrate responsive adaptive management strategies. The project will also engage men and boys to build support for women's increased participation. In this regard, we will also identify and leverage the influence of local community leaders who support women's increased participation. In the design of business plans for reef-positive business ventures, the SPE and advisory committees will ensure a focus on income generation activities within the MPA Network that traditionally benefit women (e.g. crab farming, resource monitoring, carbon restoration) and also actively seek ways to involve women in other diversified income generating activities, especially those that provide opportunities for higher income earnings and flexible working.



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4. Specific Interventions

Intervention #1: MPA Development Facility



Approach

The MPA Development Facility (DF), managed by three business developers with support from UNCDF, will provide scientific, business & technical assistance to construct MPA projects with high-quality environmental, social and financial design to develop reef-positive businesses supporting the MPA networks.

The DF will also set-up and fundraise for linked MPA blended finance investment facilities for the projects mixing philanthropic, development and private impact capital.

With MPAs accepted as the most effective tool for improving reef health and the primary impediment to improving coral reef health being ineffective management, the establishment of a facility aimed at generating revenue for MPAs will have direct positive impacts on reef health⁶.

The DF will develop well-managed and sustainably financed MPAs through (i) setting-up special purpose entities (SPEs) managing the MPAs on behalf of Governments, (ii) implementing sustainable revenue models for the MPAs and, (iii) structuring blended finance solutions for the initial capital needs of the SPEs.

The project is expected to contribute to the sustainable financing and effective implementation of the following MPA activities: Coral reef science & monitoring, Community Development, Legal compliance, and MPA Maintenance and Management.

⁶ Mumby et al (2021) for example was able to demonstrate significant improvements to reef health by banning parrotfish harvesting – only possible within the MPA framework - in under a decade.



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Local and central government will complement the SPEs' self-financing mechanisms with in kind support (e.g. training and enforcement).

The facility will develop the following sustainable revenue models for the MPAs:

1. **Direct MPA incomes:** Incomes will flow into the SPEs through MPA fees, visitor center entrance tickets and sales of blue carbon credits. In that aim, the SPE management teams will implement nature-based programmes for visitors incl. new underwater attractions and set-up of nature fees, develop innovative and engaging visitor center facilities and certify blue carbon mangrove restoration and conservation projects.
2. **Indirect MPA incomes:** income will flow into the SPEs from investment returns from reef-positive businesses in & around the MPAs. Business sectors include nature-based ecotourism, aquaculture of overfished reef fishes, fishery supply chain improvement projects and micro-finance for fisher communities. Businesses have been selected based on their abilities to reduce specific drivers of coral reef ecosystem degradation, their capacities and financial integrity. The businesses will generate investment returns (dividends, revenue sharing) and professional fees to the SPEs, improving MPA management and reducing several drivers of coral reef ecosystem degradation.

The main activities implemented by the DF are:

Consolidating MPA long-term management concessions, and establishing the SPEs with local partners.

The programme will initially focus on the 3 MPA networks of the VIP, CIG and TSPS.

In 2022-2023, activities include:

Consolidation of the SPE 'Blue Alliance VIP' created in 2021 and already managing 12 of the 50 MPAs of the Verde Island Passage MPA network through a long-term co-management agreement (10y renewable)⁷. The SPE maintains the full responsibility and management functions and is accountable to the local governments, who remain the owner and who determine the overall policy and regulatory framework under which the SPE will operate. Activities in 2022 include consultations with local Governments, legal arrangements and due diligence on new local partners' capacities. In mid-2022, the Development Facility will start arranging long-term co-management agreements between 19 local government Units in VIP and the non-profit Blue Alliance VIP for the rest of the 38 VIP MPA network (expected in mid-2023).

- The design of the co-management arrangements and set-up of the 2 SPEs – formed by local partners and Blue Finance that will co-manage the 2 MPA networks of CIG and TSPS on behalf of Governments. Due diligence on local partners' capacities, consultations with local Governments, alignment with local regulations, legal design, by-laws, sustainable management strategy (rooted in science) and identification of community leadership will be conducted. The Development Facility is arranging long-term co-management agreements between 4 local government Units in Calamian Island and the non-profit 'Blue Alliance CIG' for the MPA network (expected in Q2 2022). In mid-2022, the Development Facility with direct support from Rare will start arranging long-term agreements between local government Units in TSPS (expected in mid 2023).
- Stakeholder engagement and advocacy in the 3 MPA networks. To ensure alignment with all the various stakeholders, consultation processes are organized with stakeholders from central, province and local governments, tourism industry, fishing sector, local communities and other public institutions.

⁷ In Mindoro, the SPE is composed of representatives from the Sama-samang Nagkakaisang Pamayanan ng Silonay (SNPS, Calapan), Likha (Baco), Kabisig ng Mangingisda ng Ilag (KAMI, San Teodoro) and Blue finance.



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Pre-transaction technical assistance to develop investment readiness and direct revenue generation mechanisms for MPAs

The DF will design and implement the business and scientific plans of the SPEs for the 3 MPAs. The DF will develop the main direct revenue strategies based on 3 interventions: (i) MPA fees, (ii) visitor center fees and, (iii) sales of blue carbon credits.

Activities over 2022-2023 include robust financial projections and scenario analyses for a visitor center, new underwater attractions and set-up of nature fees paid by users, investment structures, detailed commercial strategies, market analyses, international & local expert consultations, engineering and architectural planning, mangrove GIS, carbon assessments, carbon ownership, design and development of MRV (Monitoring, Reporting and Verification) carbon methods. For the blue carbon origination, offtakers will be able to invest in project activities that follow a chart of procedures respecting a certain number of rules and safeguards that will decrease reputational risks. In parallel, the DF will support knowledge exchanges to increase MPA science, community engagement approaches, environmental planning (e.g. support to MPA management plans, marine spatial planning, MPA compliance plan, MPA scientific monitoring plans) and sustainable management strategy (rooted in science). All plans will be developed in consultation with local stakeholders.

UNCDF Blue Bridge experts will provide on-going advice on the set-up and structuring of the transaction as well as defining mitigation strategies.

Sourcing 2 new MPA networks (scoping and selection)

Activities include screening, feasibility assessments and selection of 2 additional priority MPA networks in the Philippines. Activities in 2024-2025 will include the identification of MPA networks based on ecological, legal, management and business criteria through desk study and preliminary consultations with local stakeholders. Priority MPA(s) will be selected in collaboration with Government and partners and based on the 50 reefs priority listing. A scoring decision tool has three major components – Impact Feasibility, Legal Feasibility, and Business Feasibility with a total of 54 indicators. The Impact Feasibility measures the ecological and socio-economic context of the MPA and the extent to which local communities are depending on it. It also measures its potential positive impacts on local economies. The Legal Feasibility gauges the existence and level of implementation of the different environmental regulations that impact the MPAs. It also looks at the track record and willingness of the LGU in a co-management setting. The Business Feasibility identifies the challenges and opportunities to produce revenues from tourism and other sectors. It analyzes tourism statistics, available infrastructure and its potential for other business strategies.

The screening will check also aspects of track record of co-management agreements for protected areas, the local legal framework for public-private partnership in the area, the MPA/MMA governance and management plans, the environmental threats, the present revenue model, the tourism potential, the positive impact potential and support from public institutions.

Feasibility of Reef-positive businesses (validation)

Based on sourcing activities conducted during 2021, the DF partners have selected the most promising reef-positive project opportunities. Validation activities by the DF are based on a scoring matrix with +45 indicators: triple bottom line impacts (ecological, social, economic), upside value potential (business, market opportunities and entrepreneurial capacities) and enabling conditions (legal, environmental regulations around the MPAs, concession lease, government support). In addition, the DF will apply the GFCR Investment Principles for blue economy sectors with positive impact on coral reefs. A special focus is given on assessing the positive impacts expected on coral reefs (and associated ecosystems). Peer reviewed, grey literature and experts will be consulted to identify state-of-the-art knowledge on benefits and threats of each project.

Preparation of Reef-positive businesses (pre-transaction)

Preparation activities include detailed business plans, the negotiation of terms and commitments by all participating project partners and stakeholders, robust financial projections and scenario analyses, investment structures including farmer's and fisher's incentives, the generation of financial returns and



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benefits for participating farmers, fishermen, local stakeholders and investors, and design of the blended finance facility (catalytic grant and debt capital).

The DF negotiates the terms with all relevant stakeholders (MPA SPE, community, government, and commercial or other private sector partners) as well as preparing all relevant interventions on policy, governance, fishery and farming governance and seafood processing levels including the underlying detailed investment and business plans subject to detailed financial analysis and due diligence. These preparatory activities are realized with our local partners.

UNCDF Blue Bridge experts will provide on-going advice on the design and structuring of the transaction as well as defining mitigation strategies.

Investment ready (Transaction)

Legal and financial arrangements are finalised on both project and investment sides.

On the project side, the three MPA Special Purpose Entities (SPEs) formed by the DF and local partners are established and incorporated for the different projects. The DF produces formalized agreements with local stakeholders (community organisations and government stakeholders). In the same way, the Reef-positive businesses entities are established or modified to suit the investment criteria (e.g. by-laws, shareholding participation of the SPEs in the equity of the Reef-positive businesses).

On the investment side, the DF facilitates the negotiations of the grant and debt legal agreements between the BF-IF, other investors and each SPE. Milestones are set for the different drawdowns based on triple bottom line impacts (ecological, social, economic) and the DF determines the terms for monitoring during implementation (see below, post-transaction).

The UNCDF will be in charge of conducting due diligence process with the assistance of the DF. The DF provides assistance to the UNCDF and investors during the overall investment analysis process and prepares a data-room to support UNCDF and investor due diligence.

The UNCDF due diligence process might be discussed and adapted to the needs of other co-investors in order to reduce transaction costs and multiplication of similar processes. The DF will finalise legal and financial arrangements accordingly to the due diligence results.

On the fundraising side the DF realizes the funder mapping of philanthropic institutions, family offices, impact investors, donor agencies, climate funds and development banks. The DF facilitates introductions & pitch material with short-list of priority funders and convenes funder meetings. It will also undertake profiling and engagement in international convenings and communication materials about the investment facilities.

Investment & Implementation (Post-transaction)

The DF facilitates the signing of the grant and debt agreements between the different BF-IFs, other investors and each SPE. The DF signs also long-term Project Management Office (PMO) contracts with each SPEs to ensure "on-the-ground" MPA management focus on revenue development as well as implementation of the conservation strategy. The PMO contracts have the same lifetime as the loan agreements signed with the BF-IF.

DF PMO support includes assistance in commercial development, communication and marketing, MPA management, human resources, MPA planning and controlling, resource forecasting, project risks, and capacity building. Professional project managers are assigned to the projects to inject professionalism into the projects and guarantee a high level of consistency of practice across all projects. The DF provides ongoing monitoring of SPE performance against the Key Performance Indicators (KPIs) defined in the business plan and constant optimization of business processes cost efficiencies and product quality and value.

The DF also provides support in the form of on-demand expertise, capacity building to strengthen basic social entrepreneurial and scientific skills of the SPE, best practices, support to MPA management plans and spatial planning, access to information and expertise on other projects.

Each project is managed by local partners. The local partners bring local knowledge, relationships with communities and extensive experience in marine conservation.



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A final phase includes the supervision of repayment of the loans to investors through the blended finance investment facilities.

Impact monitoring

For each MPA, the DF will monitor the social and environmental Key Performance Indicators (KPIs) through >20 impact metrics, categorised under 6 criteria: Ecosystem integrity, Species protection, Livelihood enhancement, Sustainable enterprise, Equity improvement and MPA management effectiveness. The approach will be aligned with GFCR investment principles and will be guided by international best practice impact standards (GIIN, IUCN, BNCFF, SOCMON, METT) and verified by independent external partners (such as Verra – VCS and CCB, UNEP). During the initial phase of the programme, the Development Facility will coordinate with GFCR's partner UNEP to ensure fund level indicators of the GFCR are captured by the programme's M&E strategy.

Partners

The DF is led by a consortium of 3 project developers working closely with UNCDF Blue Bridge

- Blue Finance, a non-profit specialized in the management of bankable MPAs and the development of impact investment solutions for MPAs in South East Asia and globally. Bf is one of the only teams with experience in bankable MPA project origination and execution in developing countries (with 4 MPAs already in operation and US\$3M already structured in blended finance for MPA); BF acts as the convening agent and will be leading all the DF activities linked to MPA management, science, MPA fee revenues, community engagement and reef-positive businesses linked to ecotourism.
- Blueyou Consulting, an organisation specialized in private sector led, coastal community-based sustainable aquaculture and fisheries improvement programs, and with a 10-year track record developing pipelines for impact investment and ongoing programs in the Philippines (revenue generated average of 20M USD per year in the past 3 years). Blueyou will be coordinating the DF activities for reef-positive businesses linked to aquaculture of overfished reef species;
- Ubá specialized in blue carbon projects working with sustainable land use and mangroves in the Philippines with a track record of 15 carbon certified projects in developing countries. The company has also experience in trading, benefit-sharing and carbon ownership agreements having facilitated more than 8 M tons of CO₂e. Uba will be coordinating the DF activities linked to blue carbon credits for MPAs.
- UNCDF Blue Bridge is a development-focused financial service to support the Global Fund for Coral Reefs, its implementers and partners. UNCDF will be conducting due diligence process for the loans and grants provided to the SPEs. UNCDF will provide also on-demand financial expertise during the preparation and transaction phases of the projects.

Blue finance and UNCDF have already structured an initial performance grant for the SPE 'Blue Alliance VIP' (from GFCR funding).

The DF is formed by a team of professionals implicated to project origination, preparation and execution:

- 26 professionals comprise the international senior management team (16 experts from Bf, 6 from Blueyou and 4 from Ubá)
- 12 professionals comprise the Philippines team
- The DF's team is directly involved in "on the ground" MPA activities working with our established (and well-embedded) local partners and communities.
- The DF's team is formed by a multi-disciplinary team with 30+ years of cumulative experience in MPA operational management, 80+ years in coral reef and fishery science, 50+ years in community enterprise and nature-based tourism, 20+ years in carbon certification projects and 15+ years in blended finance
- The Development Facility partners have structured US\$10M in blended finance for MPAs and sustainable fishery projects in other countries.



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Partnerships have been forged with more than 30 partners to cover and address all the needs of the MPA ecosystem. In particular, the DF works in close relationship with UNDP which is implicated in the development of co-management agreement national framework and has a long experience in community engagement and environmental planification.

Other partners include Conservation International Philippines, Rare and the University of the Philippines which holds an extensive track record in conservation activities in the 3 initial MPA networks. Strong partnerships have been built with the government, local NGOs, private sector companies such as MELIOMAR (an impact investment case of Blueyou) and Community Organizations. The Sustainable Ocean Fund acts as the initial anchor impact investor.



Technical partners in & around MPAs

The Development Facility partners have forged partnerships with more than **30 partners** to cover and address all the needs of the MPA ecosystem



GFCR support:

The DF annual costs include staff time from the 3 developer partners, UNCDF Blue Bridge (covered through a global agreement), external partners, travel, and other administrative and communication/outreach costs.

The first 2 years will require intensive efforts in preparing and implementing the projects. The following years will have a higher focus on implementation and monitoring with cost-scaling effects amongst the pipeline of the projects.

GFCR's grant contribution is **US\$737k for 2022** and **US\$407k for 2023 (6 months)**. The GFCR contribution will then decrease for the remaining 6 years in proportion to the PMO fees charged to the projects.

Co-financing will come from other donor programmes such as IUCN-BNCF, IUCN EBA and from in-kind support from the project developers.



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Intervention #2: Blended finance Investment Facilities for Marine Protected Areas

Approach

Blended finance investment facilities (BF-IF) for Marine Protected Areas will be set-up for each MPA as the central vehicles through which the blended finance strategy will be implemented.

Each investment facility will syndicate financing from UNCDF, GFCR investment window, impact investors and donors and will provide grants, concessional debt (or refundable grants / junior debt), senior debt and equity financing to the SPEs. The facility will support capital expenditures of the SPEs and investment into equity of the reef-positive businesses. The portfolio of BF-IF will provide access to investment into MPA projects with common impact metrics.

The BF-IF simplifies the investment process and lowers transaction costs for the different investors with part of the due diligence process led by UNCDF (e.g. shared data-room, project documents check, pre-analysis, risk analysis).

In addition, the facility:

- Creates efficiency and economies of scale through syndication,
- Reduces the investment risk through diversification across revenue models and MPA projects,
- Smoothens revenue income across models
- Improves the quality of the project design and execution,
- Increases liquidity for investors through potential transfer of some debt to other investors,
- Reduces financial burden for the MPAs (blending impact capital with different return profiles),
- Helps investors to transparently monitor their impacts.

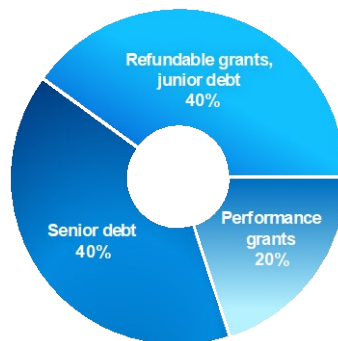


Figure 1: Typical investment facility transaction per SPE

In early 2022, the first blended finance investment facility is expected to be structured for the SPE Blue Alliance VIP. The facility will syndicate loans and grants from impact investors such as Mirova Natural Capital (Natixis), UBS Optimus and from grantors such as IUCN. For all, their investment decision will be triggered by the GFCR support, which is viewed positively and seen as playing an instrumental role in reducing commercial and ESG risk. In late 2022, the second BF-IF will be set-up for the SPE Blue Alliance CIG. Initial interest has been confirmed from impact investor and grantor for this second facility.

Governance of the MPA blended finance investment facilities

For each facility, investment decisions will be steered by an investment committee. It is proposed to be formed by 7 voting members (independent from the Development Facility) with the following



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composition: 1 member from the impact investment world (e.g. anchor investor), 1 member from UNCDF, 1 member from foundation, 1 member from UNDP, and 3 members from the entrepreneurial world with a record in successful social enterprise ventures in the MPA geography.

In addition, an impact committee (with veto rights) will be formed by 5 independent voting members representing local governments, local NGOs and academic partners.

GFCR Intervention

The GFCR will invest in the 3 blended finance investment facilities set-up for the SPEs managing the 3 MPA networks. GFCR investment will be centered on (1) early-stage CAPEX of the MPA to improve their management and develop sustainable revenues (MPA equipment, MPA eco-tourism facilities and mangrove restoration programmes) and (2) early-stage CAPEX of the reef-positive businesses that generates returns for MPAs. GFCR investment will be realised through grants and loans deployed by UNCDF and equity deployed by the investment window.

The reef-positive Businesses include nature-based ecotourism, aquaculture of overfished reef fishes, fishery Supply chain improvement project and micro-finance for fisher communities.

In 2022-2023 (first 6 months), the GFCR will invest in the 3 BF-Ifs for the SPEs managing the 3 MPA networks. GFCR investment will be centered on:

1. Capital expenditures for MPA vessels, moorings and scientific equipment for effective law enforcement and conservation of the MPAs
2. Capital expenditures for MPA eco-tourism facilities and services to improve visitors' experience and revenues and mangrove restoration programmes;
3. Equity investment into aquaculture businesses (mangrove crab in the VIP, sea cucumber in the CIG and integrated multi-trophic in the TSPS). The SPEs will receive part of the dividends of the businesses as well as professional fees for enforcement and scientific monitoring assistance. Beyond improving MPA effectiveness and financial sustainability, the intervention will reduce pressure on the natural population of mangrove crab, sea cucumber and groupers and develop extra revenues for fisher community members.
4. Equity investment into sustainable eco-cruise businesses in the CIG and TSPS network. The SPEs will receive part of the dividends of the businesses as well as professional fees for enforcement and visitor safety & management. Beyond improving MPA effectiveness and financial sustainability, the intervention will implement reef-friendly tourism activities, increase awareness and develop extra revenues for fisher community members

The investments are summarised in the following table:

Table 1: Investments into the 3 Blended Finance Investment Facilities during 2022-2023 (first 6 months)

Investments during 2022-2023 (first 6 months)	Blended Finance Investment Facility for 'Blue Alliance VIP'	Blended Finance Investment Facility for 'Blue Alliance CIG'	Blended Finance Investment Facility for 'SPE TSPS'
CAPEX for MPA vessels, moorings and scientific equipment	Starting in Q1 2022	Starting in Q4 2022	Starting in Q4 2022
CAPEX for MPA eco-tourism facilities and services	Starting in Q1 2022	Starting in Q4 2022	Starting in Q4 2022



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Equity for Reef-first business	Mangrove aquaculture Starting in Q1 2023	crab	Sustainable business Starting in Q1 2023	eco-cruise

For 2022-2023 (first 6 months), the 3 blended finance investment facilities will provide a total of **US\$8.4M** to the 3 SPEs (50% as grant and 50% as debt).

For 2022-2023 (first 6 months), the GFCR's contribution to the 3 blended finance investment facilities is **US\$1.45M**. The GFCR contribution is channeled through UNCDF and deployed as grants and concessional debt (50% each) into the BF-IFs.

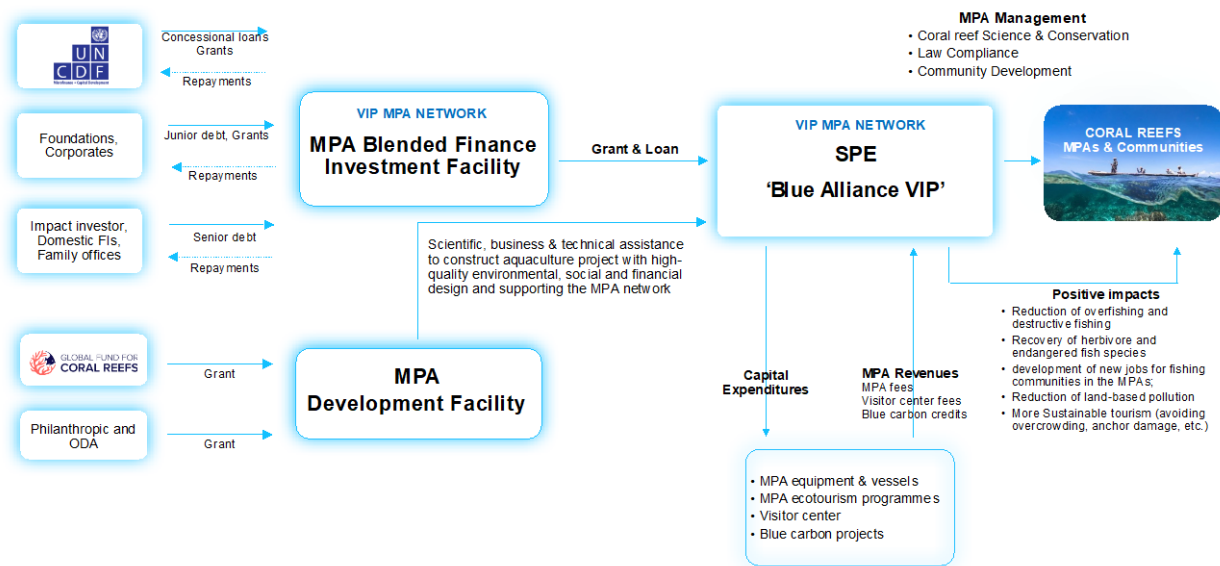
Co-financing for senior debt is soft committed from Natixis Mirova Natural Capital (**US\$1.6M**). Discussions are in advance stage with UBS optimus for an impact loan (**US\$1M**) and family offices such as Rs Group and Mana impact.

Co-financing for grant is confirmed with IUCN Global EbA facility (**US\$0.25M**). Discussions are in progress with IUCN BNCFF and Rockefeller foundation.



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Intervention #3 (2022): Direct revenues through MPA fees, MPA visitor center and Blue carbon credits for co-managed Marine Protected Areas in VIP and CIG



Business model

The intervention in 2022-2023 will contribute to the effective management and financial sustainability of 3 co-management entities of the MPA networks in VIP (phase 1 Oriental Mindoro), CIG and TSPS.

This intervention focuses on incomes from MPA fees, visitor center entrance tickets (only in VIP) and sales of blue carbon credits (in VIP and CIG only). Additional revenues from investment returns from reef-positive businesses are described in the following interventions. The SPE management teams will implement nature-based programmes for visitors incl. new underwater attractions and set-up of nature fees, develop innovative and engaging visitor center facilities and certify blue carbon mangrove restoration and conservation projects.

More precisely, the SPEs, with support from the DF, will concentrate efforts on the following revenue mechanisms:

1. Fees paid by visitors in VIP (Or. Mindoro MPAs), CIG and TSPS MPA networks for innovative wildlife eco-tourism experiences and programmes. The SPEs fit as a provider of marine scenic beauty and act as an intermediary between nature and tourism businesses. With the objective to improve visitor's experience and implement successful MPA fee mechanisms, the SPEs develop a comprehensive portfolio of innovative products and services linked to marine biodiversity. The portfolio includes solutions such as: underwater trails, MPA app, gamification, citizen science activities, coral gardens, wrecks, Virtual Reality cinema for non-divers, mangrove trails, underwater safaris, new underwater attractions (e.g. wreck, underwater coral parks and farms), development of new experiences with specialised tour operators, organisation of events around marine life cycles and increasing the safety of the experiences. SPEs benefit from Blue finance's



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experience developed in other locations with similar products and strategies, therefore improving the quality of the project design and execution and creating efficiency and economy of scale.

In addition, through the co-management agreements, the SPEs have received an irrevocable and exclusive mandate to charge statutory fees to the visitors realising underwater activities in the MPAs (divers, snorkelers and day-tours). The SPEs will implement efficient fee collecting systems through digital payment platform.

Expected SPE revenues in 2025 are **US\$0.8M p.a.** for Blue Alliance VIP (based on MPA fees paid by 300,000 visitors in the Mindoro MPAs in 2019), **US\$0.3M p.a.** for Blue Alliance CIG (based on MPA fees paid by 100,000 visitors in the MPAs in 2019) and **US\$0.2M p.a.** for SPE TSPS (based on MPA fees paid by 80,000 visitors in the MPAs in 2019).

- Entrance tickets revenues from the 'Sea Sensorium' high tech visitor center planned in the VIP MPA network (Puerto Galera in Oriental Mindoro); The Sea Sensorium© visitor centre is a highly engaging journey through the coral reef ecosystems putting visitors in touch with fascinating marine life in new and exciting ways. The Sea Sensorium exhibit centre was designed by Blue Finance and Formula-d to educate and entertain visitors and residents on marine life in Oriental Mindoro, with the aim of increasing visitor support for local marine conservation efforts through an educational & entertaining experience. The 800m² centre is designed as a walk-through experience with capacity for 50 persons. 2 locations in Puerto Galera, both close to key tourism hubs, are being considered with initial negotiations with owners underway.

Initial projections for the visitor centre highlight annual incomes around **US\$0.9M p.a.** for circa 38k visitors per year (<10% of the annual visitors plus school visits). Incomes are expected from entrance fees (US\$15 per adult in average) and purchases of food, beverages and gifts/souvenirs (US\$10 per person in average). Full incomes have been projected in the financial models after 2024 to leave enough time for the economy to recover post-covid.

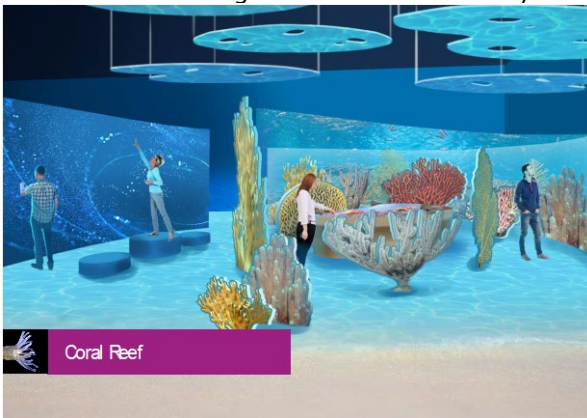


Figure 2: Sea Sensorium coral reef exhibits

- Sales from blue carbon credits certified for mangrove restoration programmes and conservation developed by the SPEs in VIP and CIG with the communities; This intervention will target carbon credits origination for sales to the voluntary market of VCUs - Verified Carbon Units⁸. In terms of carbon sequestration and storage, in most of the areas, mangroves represent a huge potential as a carbon sink. Studies indicate a stock gross average potential of 2'013 tCO₂e/ha for the conservation of existing areas (549 ± 30 tC/ha) and 37 tCO₂e/ha.y-1 for plantation of new areas (10,2 ± 0,7 tC/ha.y-1) in both living biomass and soil compartments. Three main project interventions are expected to take place in VIP and CIG MPA networks:

⁸ Carbon credits units are named VCUs (Verified Carbon Units) registered under the Verra standard. Such units are tradable assets and have a recognized market value. Each VCU is equivalent to one ton of CO₂e.



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- Restoration of previous mangroves areas with multispecies planting models;
- Conservation of threatened existing mangrove forests (REDD+); and,
- Sylvo-aquaculture climate-friendly models, that is, the inclusion of mangroves trees rows in fishponds and adaptation of other management practices.

In summary, if projects are implemented and taken to market, they can generate the following:

Subprojects	Scope	Potential carbon credits originated	Potential market price	Potential gross revenue over 30y for the SPEs
VIP	Afforestation/Reforestation and REDD + conservation of current mangrove forested areas	170,000 VCUs	US\$20 /ton	US\$ 3.4 M
CIG	REDD+ conservation of current mangrove forested areas	1,080,590 VCUs	US\$10 /ton	US\$ 10.8 M

(Details for the 3 revenue mechanisms are provided in the Annex)

Positive impacts

The intervention will strive to improve coral reef health by enhancing MPA management capabilities and reducing the primary anthropogenic drivers of degradation of coral reef ecosystems:

- (i) Reduction of overfishing and destructive fishing, as well as contributing to the recovery of herbivore and endangered fish species via enhanced law enforcement, long term community engagement programmes and development of new jobs for fishing communities in the MPAs;
- (ii) Reduction of land-based pollution (e.g. agrochemicals, sewage from coastal communities, solid wastes) via improved enforcement of illegal activity, engaging the communities and companies responsible and collectively developing mitigation mechanisms, and enhancing technology transfer
- (iii) More Sustainable tourism (avoiding overcrowding, anchor damage, etc.) via effective and science-based partitioning of guests (e.g. based on carrying capacities), permanent moorings etc.

In addition,

The Sea Sensorium is an exceptional tool for awareness and marine conservation education for scholars, residents and visitors. The Facility will indirectly have a positive impact on coral reef health, via increasing awareness of the ecosystem, expected to lead to reduction in negative impacts on both local and global scales. Environmental Education plays a major role in arousing resource stewardship in participants. Further, this intervention contributes directly to the financial sustainability of the MPA network.

The Blue carbon projects had a direct impact on seagrass and coral reef ecosystems. Mangrove areas are known for being fishes, shrimps, crabs and shellfishes' natural nurseries. These marine forests produce leaf litter and detritus material, providing valuable sources of food for marine animals (Ibid, 2011). Such trend supports Odum's (1982) estimate that about 50-75% of the world's commercial species are dependent on mangrove swamps, marshes, seagrass meadows, mudflats and coral reefs for habitat; and his further studies reports that fish biomass in mangrove swamps to be 6.8 to 11.5 times than in adjacent open waters. Additionally, mangrove losses also entail an increase in shoreline erosion and hydrological changes, especially in most of typhoon prone areas - affecting water quality and



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increasing an area's sensitivity to climate change. When polluted or murky water enters the ocean, it carries both sediment and nutrients that can smother a reef, blocking out the sunlight that corals need in order to grow. In addition, nutrients fuel the growth of algae and seaweeds which compete with corals for space. According to scientists, high levels of nutrients can also lead to higher incidences of coral disease and bleaching.

Implementation and partners

The SPE 'Blue Alliance VIP' started MPA operational activities in mid-2021 in the North Oriental Mindoro MPA network with initial support for management plans, monitoring of marine habitats, drafting of zonation and compliance plans, training of community rangers and planning of the eco-tourism focused commercial strategy. Initial up-front investments (office, vehicle, vessel, moorings) are now being structured and an executive management team has been recruited. The support received from GFCR has been key for the progress of the SPE.

The Development Facility is arranging long-term co-management agreements between 4 local government Units in Calamian Island and the non-profit Blue Alliance CIG for the MPA network (expected in Q2 2022). In mid-2022, the Development Facility will start arranging long-term co-management agreements between 19 local government Units in VIP and the non-profit Blue Alliance VIP for the rest of the VIP MPA network (expected in mid-2023). In mid-2022, the Development Facility with direct support from Rare will start arranging long-term agreements between local government Units in TSPS.

The Development Facility is designing and implementing business models which will allow for the financial sustainability of the Blue Alliance CIG. Preparation activities will start in Q2 2022, implementation will start in Q3 2022 with a project management office contract signed between the DF and the SPE 'Blue Alliance CIG'.

GFCR intervention, IRR and leverage

For 2022-2023, financing needs total **US\$5.4M** for the 3 SPEs (**US\$3.6M** for 'Blue Alliance VIP' (Or. Mindoro), **US\$1.3M** for 'Blue Alliance CIG' and **US\$0.5M** for SPE TSPS). Investment is spread over 2022 and 2023 and includes CAPEX and early stage working capital:

- Vessels and scientific equipment for effective enforcement and compliance
- Eco-tourism facilities and services to improve visitors' experience and safety (visitor facilities, citizen science equipment, underwater attractions, underwater safari equipment, coral gardens, snorkel and terrestrial trails);
- The 'Sea Sensorium' visitor centre incl. approx. 800 sq.m of new building construction and digital exhibits for 5 spaces as well as early stage working capital (**US\$1.5M**);
- Moorings and demarcation buoys;
- The VIP and CIG MPA network blue carbon projects (**US\$1M**) incl. certification studies, planting of 120ha and project management;
- Early stage working capital of the SPE (during the initial years until revenues are fully implemented)

For 2022-2023 (first 6 months) the GFCR contribution, channeled through UNCDF Blue Bridge will be **US\$1.45M** (US\$1.05M for 'Blue Alliance VIP', US\$0.3M for 'Blue Alliance CIG' and US\$0.1M for SPE TSPS).

The ratio grant/debt to be fundraised through the blended finance investment facilities is 60/40. Co-financing for senior debt is soft committed from Natixis Mirova Natural Capital through the BF-IF.

Co-financing for senior debt is soft committed from Natixis Mirova Natural Capital (**US\$1.6M**). Discussions are in advance stage with UBS optimus for an impact loan (**US\$1M**) and family offices such as Rs Group and Mana impact.



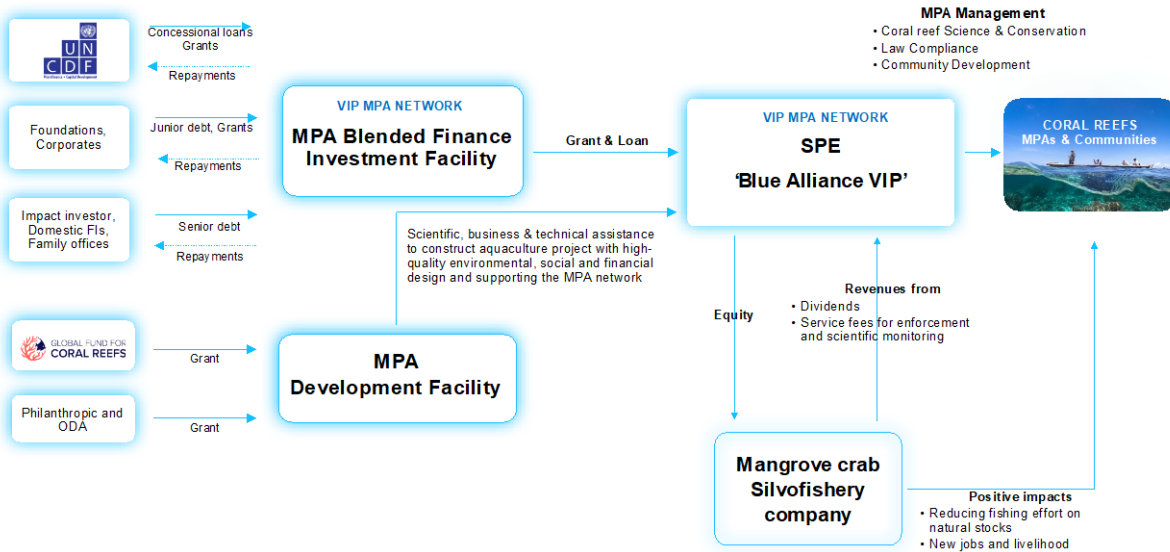
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Co-financing for grant is in discussions with IUCN BNCFF , IUCN Global EbA facility, Bertarelli Foundation, and Rockefeller foundation.



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Intervention #4 (2022): Reef positive business: Mangrove crab Silvofishery



Business model

The business model is based on a vertically integrated hatchery-based sustainable mangrove crab production in the VIP, including a hatchery and contract farms that apply an extensive farming regime and restore mangrove forest.

Crab can be grown extensively without the addition of feed, because the mangrove is their natural habitat. Extensive systems have a much lower impact on the environment because there is no negative impact through unsustainable feed, they produce no discharges, and furthermore, the mangrove coverage can be increased in these systems, following the principle of silvofisheries (see e.g. Ca Mau, Vietnam).

In Oriental Mindoro, the crablet supply from fisheries is too irregular and the bottleneck of crablet supply has led to the situation in the VIP that farmers currently don't stock crab at all in their ponds.

The model will be managed by a local company owned by local entrepreneurs (with strong experience in the sector, due diligence in progress) and the SPE 'Blue Alliance VIP'. The Company will receive assistance from the DF.

The hatchery includes a nursery operation that requires a specific grow out scheme to crabs 25-50g in a few ponds, otherwise the survival in subsequent farms wouldn't be sufficient. The crablets are given to contract farmers that grow out the crablets in their ponds under a monitored extensive farming regime, i.e. at low densities with marginal active feeding and by restoring mangroves in their ponds. The role of the MPA co-management entity is key in the development of the agreements with farmers, poaching enforcement and scientific monitoring.

The farmers would have to document their operations following a previously defined farming protocol. Once at harvestable size, the company will buy back the commercial sized crabs from the contract



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farmers at a price depending on the survival and growth the farmers had achieved and sell these to the ultimate Chinese live crab market.

The model for mangrove-based crab farming is the silvo-fisheries in Vietnam where Blueyou has run its brand and forest management program, Selva Shrimp for 12 years. It is currently being implemented in a similar program in Indonesia. The approach therefore focuses on mangrove restoration incentivized by the improved productivity and improved value chains from recovered mangrove systems.

The model will be implemented in 2022 in Calapan, North Oriental Mindoro (around VIP MPA network) and later (2023) in Calamian islands around the CIG MPA network.

In Calapan, expected revenues in 2024 are **US\$2.2M p.a.** (ex-farm gate sales) equivalent to 150t of adult crabs from **350ha** of fish ponds. EBIT is positive from year 3 onward (approx. **US\$0.4M p.a.**) and will contribute to the SPE with circa **US\$0.2M p.a.** (50% of dividends).

The businesses will generate investment returns (dividends) and professional fees to the SPE Blue Alliance.

Positive impacts

There is a direct link between mangroves and coral reefs, with mangroves reducing nutrients, sediments, adding salinity and acting as nursery for coral reef fish, which themselves are crucial components of a healthy reef ecosystem. For example, estimates of 1 ha of mangrove supporting 1 ton of fish per year have been calculated (Schatz 1991). Severe reductions in mangrove cover therefore have concomitant, severe impacts on reef health, evidenced by *inter alia* increases in macroalgae and reduced coral recruitment.

Mangrove crab has advantages for a community-based impact investment case:

- i) There is no commercially functional crab hatchery in the VIP (as opposed to shrimp where a few commercial producers exist). Since there is no stable hatchery-based supply of crablets, the juvenile crablets for farmers have to be caught in the wild, imposing a risk of overexploitation of these resources.
- ii) The crab market in the Philippines, driven by the demand for live crab in China, is important and puts a lot of pressure on a natural resource that is not managed well
- iii) Crab can be maintained and sold live to the final customer (as opposed to e.g. shrimp) i.e. the crab farmer disposes of the final product, supporting community empowerment by organizing farmers to sell their product to the final customer directly.

The mud crab hatchery allows for the value of the mangroves to be in their remaining intact to act as nursery for crablets, which as adults can be sold. Mangroves are restored to cover between 50-60% of the total pond area and, besides their other well-known ecosystem services, directly benefit the silvofishery aquaculture system by increasing the availability of natural feed as well as shelter for the farmed shrimp and mud crab species.

2. Silvofishery systems ponds are zero-input aquaculture systems meaning that no external feed or antibiotics nor any other chemicals are allowed in the farming process. Farms become passive systems without the need for water pumps or other power-consuming devices. As the ponds are situated in the intertidal zone the ponds are filled during the high tide. A water gate then keeps the water from flowing out at low tide.

3. Silvofishery systems do not rely on any artificial feed input to reach the same harvest volumes. This not only drastically increases profitability, as costs for feed are usually among the main cost drivers of aquaculture operations, but also substantially reduces financial risks for the farmers as up-front costs are kept to a minimum. Furthermore, Black Tiger shrimp and mud crabs gain higher market prices than *L. vannamei*, increasing the profitability even further. In contrast to *L. vannamei*, Black Tiger Shrimp and the mud crab species are native species to South-East Asia, reducing environmental risks in case of escapements.



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4. Revenue are expected from the sales of carbon credits in international voluntary carbon markets coming from avoided certified emissions from conservation & carbon intake from restoration in Mindoro and Calamian. Via this route, we can show the importance of living mangroves over deforestation and the ability to earn revenue at the community level from the forests.

GFCR intervention, IRR and leverage

The investment in the Mangrove crab aquaculture (planned in 2022-2023) will provide for a crab hatchery, crab nursery, farm consolidation and sales center. It will require a total investment of **US\$2M** (CAPEX for **US\$1.2M** and working capital of **US\$0.8M**).

The hatchery would have to supply 600,000 match-box size crablets per year to contract farmers (350ha) to generate a sales volume of **150t** of crabs per year with an expected sales revenue of **US\$2.2M p.a.** The EBIT is expected in the range of 15-20%.

The local company running the business is proposed to be own at 50% by local entrepreneurs (with strong experience in the sector, due diligence in progress) and 50% by the SPE 'Blue Alliance VIP'. The Company will receive assistance from the DF to construct the project with high-quality environmental, social and financial design and supporting the MPA network .

During 2022-2023 (6 months), the GFCR will contribute to the Blended Finance Investment Facility 'VIP MPA network' with **US\$200k** for this transaction (and US\$450k in Q3 2023). The funding will be deployed as grant financing to the SPE 'Blue Alliance VIP' who will invest as equity in the crab company for the initial CAPEX of the enterprise. The funding will allow the SPE 'Blue Alliance VIP' to own at least 50% of the shares of the company (with a dividend target of circa **US\$200k p.a.** for the SPE).

Current stage & timeline

For the areas in Oriental Mindoro, such systems have not yet been implemented in a structured way, and therefore they would require a certain lead time for experimentation and testing combinations of mangrove species with fish, crabs and other cultures. Key aquaculture indicators must also be monitored in the eventual pilot areas, including measuring salinity, oxygen levels, pH, water levels, turbidity, to mention a few. In parallel, interviews will be conducted individually with fishpond owners to define how best to design their system and to establish a protocol to allow for robust carbon estimates.

There are two options in terms of zoning and designing these areas: (1) a single-area approach, i.e. one fishowner, one area, and one planting area; (2) a landscape or group based approach under which owners could be organized into associations and collectively define through participatory mapping which areas are often flooded , and where they could include the plantings as structural and buffer zones to protect households and operate fishponds.

Scoping work around Batangas and Mindoro Oriental have been conducted. The aim was to assess the current aquaculture dynamics in the region and look for potential locations for mangrove crab hatchery with nearby farmers for grow out systems.

Implementation will start in Q4 2021 in Calapan. Activities include negotiation of the hatchery location, set-up of the SPE (incl. due diligence on potential partners) and arrangements with grow-out farmers. In CIG, scoping for farms and analysis of market potential will be conducted in the same period.

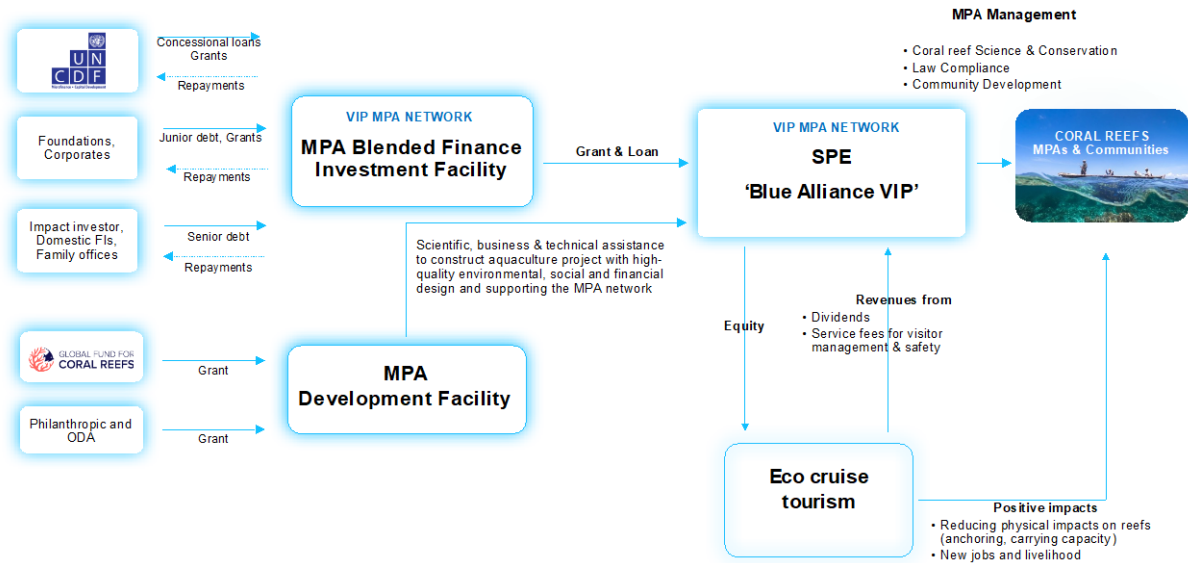
Precise timeline to be finalised with Covid restrictions. Several important project aspects are still in development and are listed below:

- Legal setup of Mud Crab Company
- Final Site selection
- Land ownership for hatchery
- Participation model for farmers (mode of operation)
- Agreement with farmers
- Engineering plans for hatchery



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Intervention #5 (2023): Reef positive business: Eco cruise Live on board in Tañon Strait MPA - Feasibility in progress



Business model

The business model proposed is based on a short cruise package involving existing and development of new destinations ("road" less traveled), unique island culture experiences, and creation of income generating activities for local people's organizations. The potential revenues will emanate from tour package fees.

Tañon Strait Protected Seascape is the largest marine protected area in the Philippines. While Moalboal and Isla Pescador, located on the west coast of Cebu Island are reknown worldwide as a unique dive site for appreciating the "sardine run", the offering of high-end land-based accommodation and live onboard boats for practicing scuba diving and other marine recreational activities in the Tañon Strait is more limited. Based on the biodiversity of the area and the number of interesting species that can be found here (including whales, dolphins, dugongs), the potential of Tañon Strait for scuba diving experiences and other ecotourism experiences is significant.

The cruises will offer 5 themed ecotourism stops to showcase the beaches, marine life, and local culture of the coastal communities:

1. Marine Mammal Interaction in Southern Tañon
2. Sardine Run and Diving in Moalboal and Pescador Island
3. Bojo River Eco Cultural Experience in Aloguinsan
4. Sugar Farms in San Carlos and Sipaway Island Experience
5. Beach, Islands, and Diving in Northern Tañon



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Itineraries will be designed so that guests will actively participate in conservation activities and have direct interaction with local communities. The experiences will focus on having a strong educational element for customers to ensure the services are aligned with the Global Sustainable Tourism Council and generate direct and tangible benefits for the local communities.

The target market for these experiential trips is foreign visitors that are willing to pay a premium for high quality services and a variety of tailored-made activities and experiences. The boat's capacity for performing these trips is 16 guests that would pay an all-inclusive rate between US\$2,000 and US\$2,500 depending on the duration of the trip and the type of itineraries. Additional income would be generated from specific / optional activities that will be offered at some dive sites (i.e. citizen science) and at some of the land destinations (i.e. land tours, cultural experiences, etc.).

Expected sales revenue are **US\$1.1M p.a.** (after year 3). The EBIT is expected in the range of 20-25%.

Potential Partners and Background

In terms of partnerships, Seadoors has been identified as an ideal local sponsor and operator of the live onboard described. Seadoors has been operating in the Philippines since 2012 and its existing itineraries include some of the best diving destinations in the country: Tubbataha Reefs and the Visayas, Malapascua, Dauin, Apo Island and Bohol. The existing offering of Seadoors includes expeditions with a special focus on studying marine life and ways to protect it. Special seminars are offered where a specialized marine biologist conducts shark seminars. Seadoors has confirmed its interest on exploring new routes to Tañon Strait where the trips will have a strong focus on conservation, citizen science, and community engagement. Other key partners include local service providers, marine and terrestrial guides, local business owners and artisans, who will actively participate on the community-based experiences.

Positive impacts

Collaboration with the SPE will enable an effective scientific monitoring of the marine resources and coral reefs (e.g. through citizen science program) as well as participating in the self-enforcement of the MPAs (e.g. reporting poaching to the SPE and authorities). In this way, this intervention has the potential to address some drivers of coral degradation including destructive and illegal fishing.

Also, the operations of the cruises will adhere to green boating practices (pollution prevention, use of eco-friendly products, reduction of fuel usage) and ensure proper anchoring techniques are used, preventing damage of ecosystems. Moreover, the cruise operations is also expected to generate local employment and livelihood opportunities for the communities who will be involved in the supply chain, as well as increase the internally generated revenues of the local governments covered.

The development facility, in partnership with Rare will provide the critical technical assistance in community organizing & training, strengthening the network of managed access areas and reserves, enforcement and surveillance technology transfer and other critical components of MPA (and other related ecosystems) management.

GFCR intervention, IRR and leverage

This intervention requires a CAPEX investment of **US\$3M** covering 2 vessels, equipment and initial working capital. It is estimated that the business will break-even in year 3.

The local company running the business is proposed to be own at 60% by local entrepreneurs (with strong experience in the sector, due diligence in progress) and 40% by the 'SPE TSPS'. The Company



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will receive assistance from the DF to construct the project with high-quality environmental, social and financial design and supporting the MPA network .

During 2022-2023 (6 months), the GFCR will contribute to the Blended Finance Investment Facility 'TSPS MPA network' with **US\$300k** for this transaction (and US\$300k in late 2023). The funding will be deployed as grant financing to the SPE 'TSPS' who will invest as equity in the eco-cruise company for the initial CAPEX of the enterprise. The funding will allow the SPE to own at least 40% of the shares of the company (with a dividend target of circa US\$180k p.a. for the SPE).



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Intervention #6 (2023): Reef positive business : Sea cucumber hatchery & Grow-out farms in Calamian Island Group - Feasibility in progress

Sea cucumbers play a key role in the nutrient recycling of reef ecosystems (nitrogen cycles and calcium carbonate availability), but are currently overfished with many species considered endangered. The processed and dried sea cucumbers known as “Beche-de-mer” or “Trepang” or “Haisom” is a Chinese delicacy and has great export value in South-East Asian countries like China, Hong Kong, Singapore and Taiwan. The demand for sea cucumber is growing with the increasing affluence of buyers who regard the product as a delicacy, an aphrodisiac and a valued traditional medicine.

Business model

The business model is based on the implementation of hatchery and grow out systems with local communities of *Holothuria scabra*, commonly known as sandfish, the most important commercial sea cucumber species.

Juvenile sea cucumbers are produced in the hatchery under controlled conditions, before being released in suitable pre-identified pristine natural marine habitats at low densities under best management practice. The released sea cucumbers will be harvested after 11 to 12 months of growth in the lagoon and processed into frozen/ dried meat (trepang). The venture uses state of the art grow-out technology that ensures the production of quality products (Seacucumber Consultancy Pty. Ltd. (SCC), an Australia based consultancy, has been identified as a top expert and will be involved in the design and implementation of the project).

The grow out requires an area of **150 ha** of shallow water marine areas. The area can be leased and divided into different units of contract farms. The juvenile sea cucumbers are given to community contract farmers for grow out and surveillance and bought back when the cucumbers have reached commercial size.

There are several suitable areas in CIG, but previous ventures of this kind failed due to corrupt local management or theft from the cucumber grow out. The key for success is therefore the legal structure of the hatchery entity and the organization of contract farmers for the grow out, creating a win-win situation for all stakeholders involved. The role of the MPA co-management entity is key in the development of the agreements with fishers, poaching enforcement and scientific monitoring.

The hatchery and nursery facilities on the land will produce about **2M** sea cucumber juveniles per year that are ready to be released into the grow out environment, producing harvests of **300-400t** of wet sea cucumber weight after the 2nd year. The current price for the sustainably produced and well processed premier quality dry product is between US\$150 to US\$250/Kg depending on the size, dryness, and quality, producing a revenue of up to **US\$2-3M** per year.

Since OPEX is **< US\$1M p.a.**, the profitability of the venture can be high, once the challenge of community organization for grow out is overcome.

In addition to the dried product, over the medium-term, the venture can develop potentially patentable processing techniques to produce medicines and vacuum-sealed, re-hydrated meat for the bio-medical and delicatessen markets.

Positive impacts

This intervention will have an indirect positive impact on coral reefs, by providing alternate sources of incomes for fishers. High fishing pressure has a significant negative impact on coral reefs and any reduction in pressure is beneficial. Providing a variety of income generating activities, such as sea cucumber farming allows fishers to engage in alternative activities to complement or take over their incomes, while reducing pressure on existing fisheries.

The culture of sea cucumber is eco-friendly and sustainable as this aquaculture does not require artificial feeding and the cucumber grow naturally once they leave the hatchery. SCC’s technology and



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international experience means that it is well positioned to address any specific site related technical challenges in cultivation and production.

GFCR intervention, IRR and leverage

The model requires a CAPEX investment of **US\$1.7M** and early stage working capital of **US\$1.3M** (until revenues are generated), totaling **US\$3M**.

The local company running the business is proposed to be own at 60% by local entrepreneurs (with strong experience in the sector, due diligence in progress) and 40% by the 'Blue Alliance CIG' . The Company will receive assistance from the DF to construct the project with high-quality environmental, social and financial design and supporting the MPA network .

After mid 2023, the GFCR will start contributing to the Blended Finance Investment Facility 'GIG MPA network' with US\$800k for this transaction. The funding will be deployed as grant financing to the SPE 'Blue Alliance CIG' who will invest as equity in the company for the initial CAPEX of the enterprise. The funding will allow the SPE to own at least 50% of the shares of the company (with a dividend target of circa US\$250k p.a. for the SPE).



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Intervention #7 (2024): Reef positive business : Grouper hatchery and farm with Integrated Multitrophic Aquaculture - Feasibility in progress

There is a high demand for live grouper from Southeast Asian countries for high-end restaurants, but the capture of live groupers is usually associated with unsustainable practices such as cyanide fishing, one of the most destructive techniques used for catching live fish. Wild stocks of groupers are vulnerable to fishing and are generally considered overfished. Therefore, the DF proposes an aquaculture investment case based on grouper (tiger grouper, at a later stage also higher value groupers like mouse and leopard grouper), coupled with sustainable Integrated Multitrophic Aquaculture (IMTA) operation with mussels and seaweeds

Aquaculture is the only viable alternative to the wild caught origin but so far there is no sustainable farming operation. The business case includes Aquaculture Stewardship Council (ASC) certification, and alternatively also consider organic certification.

The operation will include a hatchery to provide grouper fingerlings to marine grow out net cages, operated by a newly established, using traceable and sustainably sourced feed ingredients, and the monitoring of impacts on the farm's environment.

Marine aquaculture of high value species is reliant on external food supplies and can generate high organic and nutrient loading – such an environmental impact can be reduced with the inclusion of bivalves and seaweed, where byproducts from one species (groupers) can be recycled to become inputs (fertilizers, food and energy) to other commercial relevant organisms. These “extractive species” can intercept and assimilate aquaculture derived waste.

The farm set up consists of net cages on sea and ropes for the extractive species, a packing and dispatch station, and marketing and sales department. The integrated farm's capacity is designed to produce 300t of whole round grouper per year. A part of the harvest will be marketed live, others in fresh and gutted product form, and shipped to domestic and international markets. For the gastronomy market in Manila, Meliomar Inc., which is already established as a sustainable seafood supplier and able to market products with unique selling points, will be the strategic distribution partner. Such strategic distribution partners will also be identified in Hong Kong, Singapore, and Shanghai.

The integrated multitrophic aquaculture, with a feasibility in progress in TSPS and CIG, will be developed around the grouper farm and will generate additional revenues in the range of approximately US\$0.4M, totaling thus revenues of **US\$2.8M**.

The major cost of this operation is the feed (50% of revenues). The operation targets an EBIT of 20% (about **US\$ 0.5M** per year) once fully operational.

Positive impacts

This intervention will both directly and indirectly positively impact coral reefs via: reduction in destructive fishing practices and provision of alternative income generating mechanisms. Grouper fisheries in the TSPS and CIG are problematic and associated with illegal and destructive fishing methods (cyanide). Groupers are reef fishes and due to the high demand they are typically overfished. The cultivation of groupers offers jobs, and can, together with strengthened surveillance schemes on protected coral reefs, divert illegal fishers to other activities. Furthermore, once the hatchery manages to produce high value groupers in reasonable volumes, it might be able to out-compete the grouper supply from illegal fishing activities. The grouper farm will operate according to best practices and highest sustainability standards and might be the first farm of this kind in the region. The further addition of filter feeders (mussels) and seaweeds in an integrated farming model is in practice novel and innovative, mitigates the potentially negative impacts of marine culture and might set the path for future models of integrated multitrophic aquaculture systems in the region.

GFCR intervention, IRR and leverage

If feasibility is confirmed in CIG or TSPS, the local company running the business is proposed to be own at 50% by local entrepreneurs (with strong experience in the sector, due diligence in progress) and 50% by the SPE (Blue Alliance CIG or 'SPE TSPS') . The Company will receive assistance from the DF to



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construct the project with high-quality environmental, social and financial design and supporting the MPA network .

During 2024, the GFCR will contribute to the Blended Finance Investment Facility 'CIG MPA network' or 'TSPS MPA network' with US\$1.3M for this transaction. The funding will be deployed as grant financing to one the 2 SPEs who will invest as equity in the company for the initial CAPEX of the enterprise. The funding will allow the SPE to own at least 50% of the shares of the company (with a dividend target of circa US\$300k p.a. for the SPE).



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Intervention #8 (2024): Reef positive business : Prepaid Fish Model and Micro-credit to small-scale fisheries in Oriental Mindoro and Tañon Strait - Feasibility in progress

The Prepaid Fish Model intervention is based on the empowerment of small-scale fishermen through knowledge and access to online markets. Aiming to further increase the benefit for the communities involved in this and other interventions, negotiations for a partnership with a micro finance institution are in progress.

The feasibility of these 2 interventions in Oriental Mindoro is under-way. The approach is led in collaboration with Rare. Feasibility results will be available in mid-2022.

1. Prepaid Fish Model:

The business model proposed consists in delivery of sustainably-caught fresh fish, sourced locally and responsibly around the MPAs and delivered to consumer who subscribe. The model will require the development of an online platform that will allow subscribers to receive two fish deliveries per month.

Tindagat, a local entity based in Manila, was identified as a potential partner. This company is a fisher-to-institution fair market that supports local fisherfolk communities. Tindagat will work closely with the Blue Alliance management team to enforce that catches are done sustainably through strict fishery good practices.

It is expected that the model will be implemented in mid-2023, profitable after year 3 with annual revenues to reach US\$2M. This model requires CAPEX to develop an online platform, build 2 facilities (in Mindoro and Tañon), buy motorcycles and other equipment, and 1 year working capital.

2. Micro-finance for fishers:

Micro loans will be provided to individual fishers and fishery cooperatives who have committed to actions that contribute to effective implementation of local conservation (i.e. MPA patrolling) or who are involved in other interventions related to small-scale fishery transition, mangroves planting, and sustainable seafood businesses.

The partner identified for the micro-credit component is Negros Women For Tomorrow Foundation (NWTF) that aims to help women achieve self-sufficiency and self-resilience, particularly in low-income and depressed urban and rural communities.

NWTF is currently planning to expand its network of branches to Oriental Mindoro and Tañon Strait (4 branches). The average individual loan provided by NWTF is ~US\$50, the loan term ranges from 7 to 36 months, and the monthly interest rate is 2.5%. The break-even of an individual branch is reached on year 4 with an estimated IRR >8%.

Positive impacts

The pre-paid fish model is expected to offer a complementary benefit to coral reefs via the reduction of fishing pressure. By functioning on a demand pull, the model encourages the fishing community involved in the production to limit its fishing pressure to the quantity pre-ordered by the subscribers. Also, committed with developing sustainable and fair business for small-scale fisheries, Tindagat will leverage on the existing work and network of Rare and the SPE 'Blue Alliance VIP' (LGUs, DENR, BFAR, fishers, traders, key municipal fishery value chain actors).

Also, Rare through Fish Forever, establishes and strengthens community-based coastal fisheries management systems. It highlights the need to align incentives to conserve critical habitat with more sustainable food supply and inflow of income from municipal capture fisheries and financial resilience to external impacts. Rare supports this by behavior adoption strategies, capacity building for effective local management bodies, evidence-based decision-making, policy reform, and financial resilience interventions. Also, the major piece of the revenue sharing mechanism with MPAs is ensuring that fish populations can recover while still ensuring a sustainable income source for fishers.



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With the increase in the subscriber base of the model, a corresponding increase in revenue is expected to benefit 1,200 fishers. Additional benefits from the model include:

- Creation of awareness among the society on the fisher's profession and the importance of responsible consumption by mediatizing fishers and sustainable advocacies.
- Purchase of catches from partner fishers at a premium price and empowering local fishing communities through capacity-building.
- Tracing products, contributing to raising awareness among consumers on the origin of the fish they consume, and the importance of sourcing locally.
- Mitigating the increased fish extraction by providing capacity-building on sustainable fishing methods.

On the micro-credit part of the intervention, preliminary estimates indicate that over 25,000 borrowers could benefit from NWTF branch expansion in Mindoro. NWTF's mission advocates poverty reduction in the Philippines by promoting ethical and inclusive financial services. Additionally, besides a social positive impact, a direct environmental impact will be achieved by linking committed potential borrowers (individuals and cooperatives) to actions that contribute to effective implementation of local conservation or related to small-scale fishery transition, mangroves planting, and sustainable seafood businesses.

GFCR intervention, IRR and leverage

Precise investment needs will be confirmed by the on-going feasibility study. Based on preliminary figures, we can highlight the following investment needs:

- (i) The capital expenditure of Tindagat Prepaid Fish Model is **US\$500k** approx..
- (ii) NWTF microfinance projected capital needs for Oriental Mindoro are estimated at **US\$800k**

After mid 2023, the GFCR will start contributing to the Tindagat Prepaid Fish Model. The GFCR will contribute to the Blended Finance Investment Facility 'VIP MPA network' with US\$0.25M for this transaction. The funding will be deployed as grant financing by the 'Blue Alliance VIP' who will invest as equity in the Tindagat company for the initial CAPEX of the enterprise. The funding will allow the SPE to own at least 50% of the shares of the company (with a dividend target of circa US\$100k p.a. for the SPE).

After mid 2023, the GFCR will start contributing to the microfinance project. The GFCR will contribute to the Blended Finance Investment Facility 'VIP MPA network' with US\$0.5M for this transaction. The funding will be deployed as grant financing by the 'Blue Alliance VIP' who will provide a loan to the NWTF local company in Oriental Mindoro. The funding will allow the SPE an IRR of 8% (with a return target of circa US\$50k p.a. for the SPE).



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5. Expected Results

Key outcomes and outputs:

- Outcome 1: "Protection and effective management of priority coral reef sites and climate change-affected refugia are sustainably financed."

Output 1.1 Increased area of climate refugia and priority sites designated as MPAs

Output 1.2: Strengthened management, enforcement and monitoring systems of MPAs by SPEs

Output 1.3: A MPA Development Facility prepares and manages public and private investment for MPAs to address key drivers of coral reef degradation

Output 1.4: MPA blended finance investment facilities mobilise public and private investment for MPAs to address key drivers of coral reef degradation

Short-term outcomes (1-3 years)

- 80 MPAs progressing towards effective management and financial sustainability for 56,000 ha of coral reef, seagrass and mangroves
- Creation of +100 community MPA jobs benefiting large numbers of women (e.g. crab farming, resource monitoring, carbon restoration, fish supply chain) within MPA Networks.
- Providing food security and improved incomes for >80,000 fisher households, with a particular focus on improved incomes for women
- A minimum 120 ha are restored with multispecies plantations models and payments for ecosystems services mechanisms for mangrove forested areas conservation in VIP and Calamianes are designed;
- Blended finance facility set-up to aggregate investments in MPAs.

Long-term outcomes (10 years)

- Clear financial benefit sharing mechanism for communities is well established, MPAs are self-financing and receive at least 80% of their ongoing revenues through innovative and sustainable revenue streams, including blue carbon credit financing and tourism fees
- 80 MPAs effectively managed and financially sustainable for 56,000 ha of coral reef, seagrass and mangroves
- Improved economic opportunities and food security for vulnerable coastal communities (approx. 75,000 people from fisher households benefitted from increased catch productivity, circa 400 new jobs including a target of 50% being women)
- Enhanced climate change resilience benefitting approx. 250,000 households protected from coastal erosion
- Increased conservation impact: Biomass of fish inside MPAs >4000g per standard fish survey and coverage of hard coral inside MPAs >25%
- +30% of community members are engaged in conservation activities;
- 1000 hectares of mangroves are under active conservation, and 250 hectares are restored with multispecies plantations, generating approximately a gross value of 1.2M tonnes of CO₂e over a 30 year time horizon.
- Private capital (>US\$23M) is mobilised in financing for 5 MPA networkd projects

Outcome 2: "Transforming the livelihoods of coral reef-dependent communities"

Output 2.1: A Development Facility is established and a pipeline of reef-positive businesses that generate returns for MPAs and address key drivers of coral reef degradation in & around the MPAs is developed.



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Output 2.2: The MPA blended finance investment facilities mobilise public and private investments for reef-positive businesses that generate investment returns for MPAs and address specific drivers of coral reef degradation

Output 2.3 Strengthened and harmonized policies, strategies, plans and financing from the government for improved environmental biodiversity protection.

Short-term outcomes (1-3 years)

- Established M&E framework for environment and socio-economic monitoring put in place
- Development facility is established and operational with multistakeholder governance structure
- Initial pipeline of 8 projects secure investment with high leverage from private sector (US\$5M target)
- 2 pipeline reef-positive projects have been sourced and are in development
- Blended finance facility set-up to aggregate investments in MPAs.
- Certification process initiated and preparation for blue carbon validation

Long-term outcomes (10 years)

- 10+ pipeline reef-positive projects are developed and investment ready benefiting 5 MPA networks
- Private capital (>US\$23M) is mobilised in financing for 5 MPA networkd projects



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6. Addressing Drivers of Degradation

Table 2: Interventions and Threats

Interventions #1 **The Blue Economy Development Facility** and **Intervention #2: Blended finance Investment Facilities for Marine Protected Areas** are cross cutting interventions that provide the framework and/or sustainable finance on which all other interventions are based.

Threat	Programme Intervention (if any)	Description of how the intervention will directly or indirectly mitigate the threat to coral reef ecosystems.
Overfishing	Co-managed MPAs Mud crab hatchery & grow out farms Sea cucumber hatchery & grow out farm Grouper hatchery and farm Micro-credit Pre-paid fish model	<p>Intervention: Co-managed MPAs</p> <p>Enhanced enforcement. Overfishing is an illegal activity and the predominant impact at all sites. Increasing the capacity of MPAs to enforce existing fishing regulations, via the Bantay Dagat in terms of boats, Vessel Monitoring Systems (VMS), salaries and enhanced training will allow these community rangers to reduce the number of illegal fishing activities.</p> <p>Illegal commercial fishing is a serious problem seasonally, when large vessels from other parts of the Philippines catch fish within the protected seascape.</p> <ul style="list-style-type: none"> - Enhanced enforcement of the joint seaborne patrol operation with the Philippine Coast Guard and BFAR to apprehend illegal commercial fishing operations; - Strengthen enforcement of fishery laws in TSPS. <p>Improved communication between fishers and MPA managers will allow for a 2 way information flow and improved practice.</p> <p>Improving the capacities of MPAs to manage is expected to improve all negative impacts on coral reefs, via the above.</p> <p>Revenues for improving MPA function will come via the eco tourism activities, so by enhancing the visitor experience whether via interesting underwater attractions, improved signage, establishment of permanent moorings for anchoring</p>



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		<p>and demarcation, indirectly we are expecting improved management effectiveness.</p> <p>Intervention - Diversified Incomes from mud crab hatchery, seaweed, sea cucumber & aquaculture. Fishing is important as a revenue generator for poor, coastal communities. Fishers themselves have noted a decline in size and abundance of fish, forcing them to go further, while pulling in less incomes for their catch. Providing a variety of income generating activities, such as seaweed and sea cucumber farming allows them to engage in alternative activities to complement or take over their incomes, while reducing pressure on existing fisheries. By making the aquaculture operation more profitable the income of local communities can rely to a higher degree on aquaculture and do not need to be complemented by fisheries activities which might have negative effects on nearby coral reefs</p> <p>Unsustainable fishing practices are commonly experienced in poor environments where the fishers are not organized and where the enforcement of fishing regulations is low. The Prepaid Fish Model organizes the fishers into fisherfolk association and provides them with capacity-building on sustainable fishing practices. The Prepaid Fish Model requires quality standards from its fishers, including fish size and taking into account fish seasonality, accounting for a more sustainable use of the ocean resources.</p>
Destructive Fishing	<p>Co-managed MPAs Mud crab hatchery & farms Sea cucumber hatchery & farms Grouper hatchery & farms Pre-paid fish model</p>	<p>Destructive fishing is an illegal activity. All points for Overfishing are valid here.</p> <p>Intervention Fishery Supply Chain. With an aim of incentivizing fishers to deliver fresh fish at higher prices, this intervention makes it more profitable for the fisher to engage in non-destructive practices.</p>
Irresponsible freshwater aquaculture	<p>Mud crab hatchery & grow out farms</p> <p>Blue Carbon Grouper hatchery and farm with Integrated Multitrophic Aquaculture (IMTA)</p>	<p>Developing fish ponds for aquaculture requires mangroves to be killed. There is a direct link between mangrove ecosystems and coral reefs with the former reducing land based impacts –siltation, nutrients and provides a nursery for reef fish.</p> <p>Financial incentives for living mangroves.</p>



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		<p>1. The mud crab hatchery allows for the value of the mangroves to be in their remaining intact to act as nursery for crablets, which as adults can be sold. Mangrove integrated aquaculture systems, often called silvofishery systems, combine mangrove restoration and multispecies aquaculture in the same area, therefore, generating the benefits associated with mangrove ecosystems such as protection from coastal erosion and extreme weather events while at the same time the restored mangroves in the aquaculture increase feed availability for farmed shrimp and mud crab species leading to higher harvest and therefore increased local livelihood.</p> <p>2. Revenues are expected from the sales of carbon credits in international voluntary carbon markets, coming from avoided certified emissions from conservation & carbon intake from restoration in Mindoro and Calamian. Via this route, we can demonstrate the importance of living mangroves over deforestation and the ability to earn revenue at the community level from the forests. With the value being in living mangroves, there will be reduced financial incentive to cut them down.</p>
Coastal development	Co-managed MPAs	<p>Improved perception of value of pristine coast. Our interventions will not directly mitigate this threat, but generally improved public engagement and awareness is expected over time to result in improved practice and enforcement of legislation.</p> <p>Improved enforcement of illegal activity. When not sanctioned by law, enhanced enforcement will allow for rapid reporting on illegal coastal development.</p>
Poor agriculture and livestock practices (leading to harmful runoff and poor water quality)	Co-managed MPAs	<p>Improved water quality. Strengthening MPAs will allow for the partial control of land based pollution (e.g. agrochemicals, sewage from coastal communities). Whether by engaging the communities responsible and collectively developing mitigation mechanisms, technology transfer and/or funding to purchase or retrofit mechanisms for increased sustainability. Coral reefs will indirectly benefit from improved practices.</p>



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Unsustainable tourism (overcrowding, cruise ships, etc.)	Co-managed MPAs Eco cruise Live on board Sea sensorium visitor center	<p>Identification & enforcement of Carrying Capacities. Strengthening MPAs allows for the effective partitioning of guests, based on carrying capacities and/or # of existing permanent moorings for example. The enhancement of rangers also allows for more sustainable practices to be enforced.</p> <p>Promoting and supporting local eco-tourism enterprises which is a potential platform for IEC in increasing community awareness and mindset change for a better & sustainable tourism industry that can also boost conservation efforts.</p>
Coral Reef disease (e.g., stony coral tissue loss disease)	Co-managed MPAs	Improving MPA effectiveness is expected to improve reef health generally. While one cannot definitively link coral disease to poor water quality, it is widely believed to be so.
Poor wastewater treatment	As for agriculture.	As for agriculture.
Logging and wood harvesting	As for irresponsible aquaculture.	Wood harvesting is carried out in mangrove forests. The mud crab hatchery and carbon credits – as in for aquaculture will help mitigate this threat.
Energy production and mining (Clean energy, Fossil Fuels and extractives)	Co-managed MPAs	Improved communication between stakeholders and MPA managers will allow for information flow and improved practice.
Marine traffic and shipping	Co-managed MPAs	Improved communication between stakeholders and MPA managers will allow for information flow and improved practice.



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7. Partners

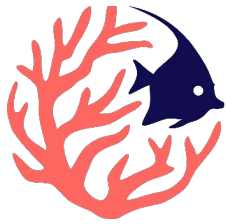
The role and engagement of these institutions and partners are described in the following table:

Stakeholder name	Role of stakeholder in structure	Level of engagement/support to date track-history in the sector	Capacities
Co-implementer organisations	Description of role, and region. Be as specific as possible.	level of engagement thus far, track-history in the sector	
Blue Finance	<p>Co-implementer, Convening agent, project developer. Blue finance builds and structures the pipeline of bankable MPAs. Bf designs business models and builds local capacities for Special Purpose Entities for MPA co-management and revenue generating activities. Business models are based on tourism nature fees, sustainable fisheries, and blue carbon.</p> <p>BF acts as the convening agent and will be leading all the DF activities linked to MPA management, science, MPA fee revenues, community engagement and reef-positive businesses linked to ecotourism</p>	Blue Finance has significant work underway for the set-up of the SPE for the Oriental Mindoro MPA network and Verde Island Passage. Bf is working with local partners on the design of the SPE and business planning for the Calamian Island MPA network. Bf is one of the only teams with experience in bankable MPA project origination and execution in developing countries (with 4 MPAs already investible).	<p>16 professionals comprise our senior international management team dedicated to project origination, preparation and execution. Blue finance has also 4 local staff with expertise in program management, eco-tourism, natural resource management and visitor centre.</p> <p>We are directly involved in "on the ground" MPA activities working with our established (and well-embedded) local partners and communities.</p>
UNCDF (blue bridge)	<p>Co-implementer, financial institution</p> <p>UNCDF Blue Bridge is a development-focused financial services entity to support the Global Fund for Coral Reefs, its implementers and partners. UNCDF Blue Bridge has already confirmed its key role in channeling grants and concessional loans from the GFCR.</p>	<p>Blue finance and UNCDF have already structured an initial performance grant for the SPE 'Blue Alliance VIP' (from GFCR funding)</p> <p>UNCDF has demonstrated wide geographic reach by efficient collaboration with UNDP.</p>	The service relies on UNCDF's enterprise risk management and investment policies; strengthened due diligence processes for vetting and assessing risks of potential investment opportunities; investment monitoring systems; and dedicated and growing capacities to manage and oversee a portfolio of capital investments and ensure robust accountability



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	<p>UNCDF will be leading also the due diligence process for the investments and will provide on-demand financial advice.</p>		<p>The platform has a team of investment professionals with significant transactional expertise in developing countries and impact investing backgrounds. There are 4 investment specialists based at the HQ in NY, 4 investment specialists based in Africa, one dedicated Technical Assistance Manager and one Portfolio Manager based in NY. Closely linked to the LDCIP is a roster of 20 investment professionals with different thematic expertise who work closely with the investment specialists.</p>
Blue you	<p>Development facility partner Blueyou will be coordinating the DF activities for reef-positive businesses linked to aquaculture of overfished reef species. Blue you is specialized in private sector led, coastal community-based sustainable aquaculture and fisheries improvement programs, with a 10 year track record of developing pipeline for impact investment and ongoing program implementation in the Philippines</p>	<p>Blueyou has been operationally present in the Philippines since 2010 through its own impact investment case Meliomar Inc., a private sector seafood company promoting responsible fishing practices and working with small-scale fishing and farming communities across the Philippines. Blue you is presently evaluating the feasibility to generate higher revenues from tuna, shrimp and crab ponds in the VIP.</p>	<p>In addition to the support of the international Blueyou Consultant team, a Local Project manager will be hired and as well as one local site manager per program, for the management and implementation of project on the ground in the Philippines. Blueyou has 10 year track record in developing projects for impact investment and ongoing program implementation in the Philippines;</p>
Ubá	<p>Development facility partner Uba will be coordinating the DF activities linked to blue carbon credits for MPAs. Ubá is a start up specialized in forestry and carbon finance with a track record of more than 15 projects certified and more than 40 climate change projects management in developing countries. It has 10 projects in its pipeline and a portfolio of more than 30 clients and potential investors. In this proposal, Ubá will have the lead on the origination of blue carbon credits. The last three</p>	<p>Ubá has work in progress in the VIP area assessing a project in Oriental Mindoro for mangrove restoration and conservation of 261 ha of mangroves (initially identified in Calapan and Baco districts) since 2020. Its team has been in contact with key resources in the Philippines, notable the national government's referee on carbon finance, local governmental representatives and scientist from the University of Philippines. Their team have already experience in implementing similar initiatives with forestry restoration and communities livelihoods worldwide, notably in South-east Asia and Indonesia and Malaysia.</p>	<p>The team comprises 4 experts on financing tools, restoration and MetOcean modelisation, and it is completed with partners for remote sensing. Ubá founders gather a 20 year experience with carbon projects, markets and ecosystems services. The team is already in contact with several local experts in order to align local knowledge and hire a local team to support the development on the ground. In parallel, the Institute will also facilitate the interactions and contractualization with offtakers of the blue carbon, and will, ensure that mechanisms of carbon ownership and</p>



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	months Ubá facilitate the sales of more than 4 M VCUs to the market.		benefit-sharing of revenues will be implemented



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8. Leadership Strategy for collaboration and governance arrangements

The present initiative is led by a consortium of 3 project developers and UNCDF with Blue finance acting as the convening agent.

- BF will be leading all the Development Facility activities linked to MPA management, science, MPA fee revenues, community engagement and reef-positive businesses linked to ecotourism. Blue Finance has significant work underway for the set-up of the MPA project for the Oriental Mindoro MPA network in the Verde Island Passage. The senior international management team is dedicated to MPA project preparation and execution in the Philippines. Blue finance has also 4 local staff in the Philippines with expertise in program management, eco-tourism, natural resource management and visitor centre. Bf will be directly involved in “on the ground” MPA management activities working with our established (and well-embedded) local partners and communities.
- UNCDF Blue Bridge is a development-focused financial services entity to support the Global Fund for Coral Reefs, its implementers and partners. UNCDF Blue Bridge has already confirmed its key role in channeling grants and concessional loans from the GFCR.
- UNCDF will be leading also the due diligence process for the investments and will provide on-demand financial advice.
- Blueyou will be coordinating the DF activities for reef-positive businesses linked to aquaculture of overfished reef species. Blueyou is specialized in private sector led, coastal community-based sustainable aquaculture and fisheries improvement programs, with a 10 year track record in developing projects for impact investment and ongoing program implementation in the Philippines;
- Ubá Sustainability Institute will be coordinating the DF activities linked to blue carbon credits for MPAs. Ubá is specialized in blue carbon projects with work ongoing with mangroves in the Philippines.



Figure 3: Development Facility partners

The consortium will work in close relationship with UNDP, Conservation International Philippines, Rare, the University of the Philippines and other local partners with a long track record of conservation activities in the 3 MPA networks.



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Governance of the MPA Development Facility

As the convening agent, Bf will host the programme management of the DF and will coordinate activities, between other development partners and recipient organisations, the government and the local partners.

A Development Facility Steering Committee (SC) will provide overall direction and oversight, approving annual work plans and budgets, and reviewing technical and financial reporting of the Development Facility. This committee will be chaired by Bf and will meet twice every year. Proposed members are: SPE board members, Government representatives from DENR, provincial governments and local governments, UNCDF, BF and UNDP.

Governance of the Blended Finance Investment facilities

Investment decisions will be steered by an investment committee. It is proposed to be formed by 7 voting members (independent from the Development Facility) with the following composition: 1 member from the impact investment world, 1 member from UNCDF, 1 member from foundation, 1 member from UNDP, and 3 members from the entrepreneurial world with a record in successful social enterprise ventures.

In addition, an impact committee (with veto rights) will be formed by 5 independent voting members representing local governments, local NGOs and academic partners.

The structure simplifies the investment process for UNCDF, with a similar due diligence process providing access to a portfolio of different projects with common impact metrics. In addition, the facility reduces the investment risk through diversification across revenue models and countries-regions.

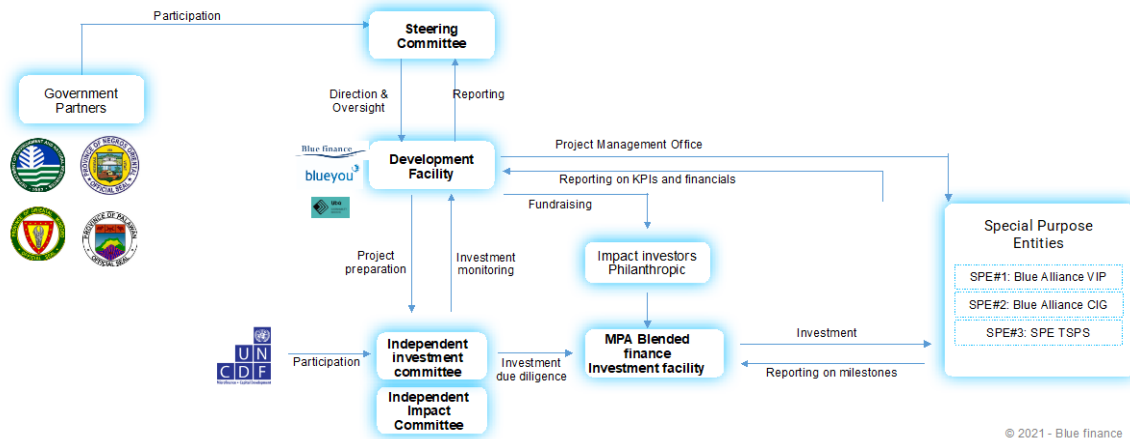


Figure 4: Governance of the Development Facility and each Blended finance Investment Facility

Table 2: Governance details

Governance bodies	Main Roles & Responsibilities	Members
Steering committee	Provide overall direction and oversight Approve annual work plans and budgets, Review technical and financial reporting of the Development Facility	<ul style="list-style-type: none"> • GFCR Secretariat, • DENR (Ministry of Environment) • Provincial governments • Local governments • UNCDF • BF • UNDP



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Independent Investment committee	Go/No-go investment decisions of the Blended Finance Investment facility	1 member from impact investment 1 member from UNCDF, 1 member from foundation, 1 member from UNDP, 3 members from private sector
Impact committee	Go/No-go investment decisions of the Blended Finance Investment facility	2 members from local governments 2 members from local NGOs 1 member from academic partners.
Development Facility & Convening agent	Provide scientific & technical assistance to construct MPA projects with high-quality environmental, social and financial design, and provide technical assistance for the development of investment-ready reef-first business models Fundraising Programme management of the DF and coordination of activities Monitoring and reporting	Blue finance, Blue You, Ubà The DF is dedicated to project origination, preparation and execution: <ul style="list-style-type: none"> • 26 professionals comprise the international senior management team (16 experts from Bf, 6 from Blueyou and 4 from Ubá) • 12 professionals comprise the Philippines team
Blended Finance Investment facilities	Due diligence processes for vetting and assessing risks of potential investment opportunities Reporting and KPIs Investment monitoring systems	UNCDF Impact investors GFCR investment window Grantors

9. Engagement with Local Actors

During the programme proposal development, BF engaged a set of strategic partners through one-on-one meetings. The table below details the stakeholders consulted:

The table below presents some strategies for the stakeholder engagement by the programme main groups.

Partner and Organization Designation	Description of role, level of engagement thus far, track-history in the sector and region, technical capacity.	Level of engagement thus far, track-history in the sector
Conservation International Philippines	Technical partner and subcontractor of the SPE "Blue Alliance" in the Verde Island Passage MPA network. CI will implement specific conservation and scientific activities for and with the Blue Alliance.	Since 2005, Conservation International has worked with the government and local communities to develop scalable conservation and marine protected area plans within the Verde Island Passage. CI holds the secretariat for the VIP MPA network and has led studies on the biodiversity and climate change vulnerability of the area, and provided important data for governments to formulate regional plans.
Rare	Technical partner and subcontractor for activities in the Tañon Strait Protected	Rare is working with over 70 municipal governments in the Philippines. Rare, through its Fish Forever program, specializes in a proven



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	Seascape MPA network. Rare will implement specific conservation and scientific activities for and with the SPE.	model of networked and community-based coastal fisheries management systems aimed to reverse overfishing, protect biodiversity and safeguard prosperity of coastal communities. Rare Philippines has 37 local staff with expertise in program management, coastal and fisheries science and governance, behavior adoption, training, policy, financial and market inclusion and innovative finance.
UNDP Philippines	Technical partner. UNDP enables integrated solutions for SDG achievement and has long term relationships with national and local institutions. UNDP has worked closely with Blue Finance since 2019 through various joint projects in the VIP.	UNDP will play a technical partner role and will help engagement with the Government through its existing relationships. BIOFIN-UNDP are working to generate a private sector incentive scheme and a financing strategy for protecting coastal ecosystems. UNDP has developed relationships based on mutual understanding between regulatory agencies (such as the DENR) and the industries.
Path Foundation Philippines Inc. (PFPI) – Calamianes Group of Islands	Technical partner and subcontractor for activities in the Calamian islands MPA network	PFPI has been working in the Calamian since 2013 in scaling up CIG MPA Network to Provincial Level with PCSDS, Academic institutions (i.e. PSU, WPU), Provincial government, NGOs. PFPI has facilitated operation of fisheries management institution including the inter-LGU MPA network. PFPI has conducted relevant skills and training workshops to enhance capacity in fulfilling management body (including IP MPA management bodies) tasks e.g. leadership, proposal writing, conflict management, MPA enforcement.
Mindoro State College for Agriculture and Technology (MINS CAT)	Technical partner and subcontractor for activities in the VIP	MISCAT conducts R&D on impact of climate change on agriculture and provides extension programs particularly to the rural folks by helping them improve their quality of life. Through the program, barangay folks are provided with training on skills development on various technological fields thus enabling them to acquire other livelihood opportunities.
Blue Alliance Inc. for Or. Mindoro MPA network (SPE)	Investee – Special Purpose Entity for the co-management of the Verde Island Passage MPA network and formed by 3 community organizations and Blue finance.	Co-management lease signed with Local Governments in 2020. Implementation of initial MPA activities with local staff and local partners. Term sheet in progress with impact investors.
Meliomar ltd	Technical partner for the fishery improvement projects. Meliomar has a vast customer base on the domestic high-end market, as well as internationally in Asia, the US and Europe, for most of the common fisheries and aquaculture products in	MELIOMAR (which is fully owned by Blueyou), successfully served as MELOY FUND’s first investee and currently plans a significant financing round [10 Mio USD] for up-grading its sustainable seafood processing and distribution facility and scaling-up its sustainable fisheries and aquaculture programs in various provinces of the Philippines.



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	the Philippines. It also has deep experience of fishery improvement in community fisheries of the Philippines and counts on a local team of experts.	
Vulcan-Paul Allen Foundation	Technical partner and financial support (in kind through access to high-res coral reef atlas GIS)	MoU signed in 2019 with Blue finance for hi-res coral reef mapping and monitoring.
Ropes&Gray	Subcontractor - Legal counselor Financial support (Pro-bono)	Pro-bono legal advice agreement (signed in 2019).
Wildaid	Technical partner and financial support (in kind through Technical Assistance) for the MPA compliance plans.	WILDAID Marine Program is helping the Blue Alliance to design and implement comprehensive marine protection systems that incorporate both law enforcement and community partnership components.
Sustainable Ocean Fund	Anchor investor, Impact investment fund	US\$4M soft committed for 2020, LOI signed in 2020.
Meloy fund	Potential impact investor	Initial interest in Philippines, MoU signed in 2018 with Blue finance for pipeline development.
Bloomberg Philanthropies Vibrant Oceans Initiative	Catalytic donor for the Tañon Strait MPA project	Bloomberg Vibrant Oceans focus on the following goals in the Tañons Strait 1. Promote adoption of high-impact, science-based fisheries and marine protection policies 2. Protect reef geographies that are projected to be less vulnerable to long-term climate impacts and can repopulate other reefs over time. 3. Achieve fishing activity transparency in national waters..
International Climate Initiative (IKI) of the BMU	Catalytic donor for the Tañon Strait MPA project	
Resonance - USAID	Catalytic donor linked to Calamian island project	Part of the project FISHRIGHT (2018-2023). The Program's focus in the Calamianes Island Group are: 1. Strengthening and expansion of the reef based MPAs and MPA networks primarily by establishing mechanisms to sustain their management bodies. 2. Establishment of mechanisms for effective long-term implementation and compliance of regulations related to right-sizing fishing effort, sea use plans (marine spatial plans), and other short and mid-term priorities and actions of the CIG Inter-LGU Management Plan.
USAID	De-risking partner	Contract signed with the Sustainable Ocean Fund (2018) Extension to the project pipeline to be negotiated.



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SIDA	De-risking potential partner	Initial interest to explore guarantee to the projects.
IUCN Blue Natural Capital Finance Facility (BNCFF)	Catalytic donor – accelerator for the VIP MPA project	Grant agreement signed in Q2 2020 for technical and financial support (US\$80k) with the Blue Alliance New grant agreement in negotiation (US\$200k)
BIOFIN Philippines (Biodiversity Finance project)	Catalytic donor	Grant agreement in negotiation (US\$10k) with the Blue Alliance
Meloy fund development facility	Catalytic donor linked to impact investment	Discussions in progress for in-country and/or regional funding arrangements.
Convergence	Catalytic donor	Grant agreement (US\$250k) signed in 2020 with Blue Finance for blended finance facility design in SE Asia.
Local Communities, fishers, civil society and marine stakeholders (tourism, transport, port, etc.) Philippines	Technical partners. Active participation of representatives from all the different sectors in the stakeholder meetings organized in each MPA sites (e.g. during the Marine Spatial Planning processes, the MPA management plan meetings or fishery/tourism annual meetings). Advanced stages in the 3 networks. Representatives will become members of the co-management advisory committees to provide inputs on the work plans and performances of each MPA.	Listed as members of the co- management advisory committee in the management lease agreement.
Tourism stakeholders (hotels & accommodation, service providers, Tour operators, etc.), Hotel & Tourism associations Philippines.	Technical partners. Hotel & Tourism associations and/or individual businesses commit to implement environmental standards through a code of conduct (e.g. green fins sustainable standards for dive shops). Activities in advanced stage in Mindoro and Calamian MPAs, Philippines.	Hotel & Tourism associations and 14 individual businesses signed the Green Fins code of conduct during 2018-2019 (Philippines).
3 Community Organizations of San Teodoro, Calapan and Baco (Mindoro, Philippines).	Technical partners. Founder members of the SPE in Mindoro, Philippines	Non-profit, non-stock company membership (2020).
Palawan Council for Sustainable	Institutional partner of project in Calamian Islands. Supervision of the co-	Charged with the governance, implementation and policy direction of the Strategic Environmental Plan of Palawan.



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Development (PCSD)	management in Calamian Group of Islands	
VIP MPA and Law Enforcement Network	Institutional partner Policy guidance in the VIP-wide MPA management	Composed of 5 provinces and DEN to ensure the protection and conservation of the VIP. These networks enable the national agencies and local government units to work together to conserve, protect, improve, and manage the coastal and marine environment along the VIP.
Local Government Units from Mindoro and Calamian Islands, Philippines	Institutional partner signatory of co-management agreement with site-level SPE	LOI signed in 2019 with 8 LGUs.
Government of the Philippines	Institutional partner Supervision of the co-management	LOI signed in 2019 with UNDP and Blue finance (DENR and other Provincial Governments).



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10. Period of Implementation

The programme has a life-span of eight years, from the beginning of 2022 until the end of 2029. The project is divided in two phases:

Pilot Phase (2022-2023):

The MPA development facility, led by a consortium of 3 project developers will provide scientific & technical assistance to construct MPA projects with high-quality environmental, social and financial design, and provide technical assistance for the development of investment-ready reef-first business models.

MPA blended finance investment facilities (BF-IFs) will be set-up as the central vehicle through which concessionary and commercial capital will be channelled to the projects under each MPA network.

The Development facility will also fundraise and mobilise resources from impact investors and other donors for the Blended finance investment facility.

Milestones for scaling success will be measured by achieving the following:

- Design of the co-management arrangements and set-up of the 2 Special Purpose Entities (SPEs – formed by local partners and Blue Finance) that will co-manage the 2 MPA networks of Calamian Island and Tañon Strait on behalf of Governments.
- Consolidation of the SPE 'Blue Alliance VIP' created in 2021 and already managing 12 of the 50 MPAs of the Verde Island Passage MPA network.
- Technical & scientific assistance to the SPEs.
- Commercial and management technical assistance through project Management Office (PMO) services for the SPEs.
- Design and implementation of the business plans for the 3 MPAs with main revenue strategy based on 3 interventions: (i) MPA fees, (ii) visitor center fees and, (iii) sales of blue carbon credits.
- Design of the MPA blended investment finance facility for aggregating the investments in the SPEs and improving the risk profile of the portfolio.
- Fundraising with a pool of investors & donors with the objective in order to blend donations, concessionary loans and impact investments.
- Design of harmonised Key Performance Indicators (KPIs) and results metrics for MPAs harmonized with GFCR Investment Principles, fund-level indicators, and M&E Strategy.
- Co-fund early-stage CAPEX of 2 SPEs managing the MPAs through grants and concessional loans (deployed by UNCDF).
- Finalise the preparation for an investment transaction in a hatchery and extensive aquaculture for mangrove crab in the VIP (around the MPAs of North Oriental Mindoro, VIP).
- Scoping and development of a pipeline of projects in reef-positive businesses that will produce investment returns to the MPAs
- Preparation for investment transactions into the pipeline of reef-positive businesses.
- Technical assistance for implementation of investments
- Co-fund, in 2022, early-stage CAPEX costs of the mangrove crab aquaculture business.

Milestones will be based on progress towards investment readiness of pipeline projects, and these projects meeting ESG criteria; plus the steps required for establishment of the blended finance facility and readiness to invest in pipeline projects meeting the investment criteria.

Development and up-scaling Phase (2024-2029):

Most of the MPAs will be managed by the SPEs on behalf of Government. Most of the MPAs will have been invested or will be ready for investment and they will be under project development. The Development facility will provide project Management Office to the SPEs and will monitor impacts and performances.



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The DF will have also identified 2 additional MPA networks projects with potential to unlock capital from private sector. New MPA networks projects will be selected in collaboration with Government and local stakeholders based on ecological, social and business criteria.



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11. Grant cost, co-financing and leverage potential of the Programme

The total GFCR grant programme sums **US\$18.3M** with:

- **US\$10.2M** for investment in the MPA blended finance facilities deployed as concessional debt (**US\$6.1M**) and grant (**US\$4.1M**) (including grants for investments as equity in the reef-positive businesses)
- **US\$4.3M** for the Development Facility operational costs during the 8 years (mainly staff and contractual services)
- **US\$1.6M** and **US\$1.2M** for the programme management costs and indirect costs respectively

The UNCDF Blue Bridge will receive **US\$14.8M** for investment in the MPA blended finance facilities and specific activities of the Development Facility. **US\$3.5M** will go to the Convening agent to cover part of the Development Facility costs and programme management costs.

The GFCR programme seeks to unlock **US\$23.5M** from impact investors and other funding partners mainly for initial investment needs. The projects will generate **US\$92M** as revenues during the life time of the GFCR programme.

The total investment capital leverage is then **2.3X leverage**

Table 3: Summary of total grant costs

Category	Amount (US\$)
GFCR Grant Window	\$18.3
Grant Co-financing	
Total Grant Costs	

Table 4: Summary of total investments sought or secured. Please differentiate between debt and equity investments

Category	Debt/Grant (US\$)	Equity (US\$)	Total (US\$)
GFCR grant Window	US\$18.3M	US\$	
Public Investment co-financing			
Private Investment co-financing	US\$14M (US\$3M secured)	US\$9.5M	
Total Investment	US\$32.3M	US\$9.5M	US\$41.8M
Total Revenues			US\$92M
Expected Programme leverage ratio of grants to investment capital (1:x)			

Private investment if any:

Co-financing from Private investment already identified:

Debt/Refundable grants:

US\$3M, Mirova Natural Capital, senior debt, committed. Term sheet under discussion;
US\$1M, UBS optimus, impact loan for the VIP MPA network investment facility, soft committed. Under final review from their IB.

US\$1M, Rockefeller foundation, under discussion for grants and refundable grants for the VIP MPA network investment facility.

The presence of anchor junior capital and grant funds from GFCR is a key factor in their decision to participate.



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Grants:

US\$0.25M, IUCN Global EBA facility, confirmed

US\$0.25M, Convergence, confirmed

US\$0.6M, IUCN BNCFF.



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12. Strategy for Monitoring and Evaluation

Reporting on programme activities and outcomes will be results-oriented, and evidence based. Blue Finance, Blue you and Ubá will be the overall entities responsible for the monitoring and evaluation strategy.

During the first months of the programme the programme developers will work with UNEP at the GFCR Fund level to ensure the investment principles and fund-level indicators are reflected in the programme specific M&E Strategy.

At the overall programme level, monitoring and reporting will take place as follows:

- Annual narrative progress reports, to be provided no later than one (1) month after the end of each 12-month period, and will include the results matrix, updated risk log, and anticipated expenditures and results for the following 12-month funding period;
- Mid-term progress review report to be submitted halfway through the implementation of the programme;
- Final consolidated narrative report, to be provided no later than two (2) months following the operational closing of the project activities;
- A final financial report, after the completion of the activities financed by the GFCR and including the final year of the activities, to be provided no later than two (2) months following the operational closing of the project activities.







On closure of the GFCR funding period, a final independent gender-sensitive evaluation will be commissioned, and which is incorporated into the programme budget. The evaluation process will be participatory and will involve all relevant programme stakeholders and partners. Evaluation results will be disseminated amongst government, development partners, civil society, and other stakeholders. Data for all indicators of the results framework will be shared with the GFCR secretariat on a regular basis to allow the GFCR to aggregate results at the global level and integrate findings into reporting on progress of the GFCR. The programme will also provide information on complementary funding received from other sources.

At the individual project level, for each MPA, conservation and social Key Performance Indicators (KPIs) will be monitored through 22 impact metrics, guided by industry best practice impact standards (GIIN, IUCN, BNCFF, SOCMON, METT) and verified by independent external partners (such as Verra, VCS – and CCB, UNEP).

Impact metrics are categorised under 6 criteria: Ecosystem integrity, Species protection, Livelihood enhancement, Sustainable enterprise, Equity improvement and MPA management effectiveness. Further details on the impact measurement framework are provided in the annex.



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Criteria	Target Outcome	KPI	STANDARD	
MPA effectiveness	Ensuring MPA delivers on its environmental and social objectives	The Management Effectiveness Tracking Tool (METT-4) score Target 5y: up to 80% of the maximum element score) for the MPAs; up to 5000ha coral reef ecosystems effectively managed	The METT is designed to assess the effectiveness of MPA management via scoring of >50 criteria	
Ecosystem Integrity	Protecting or enhancing ecosystem functioning, ecological processes and ecosystem services	Ecosystem health – % coral abundance, # and % indicator species abundance Target 5y: up to +5% in coral abundance ; up to +20% in fish diversity and abundance	ICRI - Coral Reef Indicators for CBD SBSTTA - 24; Specific metrics for reef health	
Carbon sequestration	CO2 sequestration & Avoided emissions	Blue carbon Verified Carbon Credits \$ revenue received from sale of carbon credits by local stakeholders Target 10y: Planting: up to 16,900t Co2e ; Conservation: up to 103,000t CO2e	The Verified Carbon Standard (Verra), Blue carbon conservation methodology approved under any major GHG program	
Livelihoods & Wellbeing	Transforming the livelihoods of coral reef-dependent communities through provision of dignified living and sustained family income	Perceived change in fisher community wellbeing attributed to project : \$'s per household increased (in cash and in kind/ proteins) Target 5y: up to +5% increase in household incomes based on a representative sample of 100 HH	SocMon The Global Socioeconomic Monitoring Initiative for Coastal Management Community based socio-economic monitoring	
Sustainable Enterprise & jobs	Building resilience and the ability to respond to social and environmental changes across projects	# new small & medium enterprises and jobs created or supported by the project Target 10y: up to 40 new SMEs (10 X 4 municipalities, incl. individual enterprises); up to 50 MPA direct staff (incl. Community rangers)	IRIS + System by GIIN Global Impact Investing Network, metrics for measuring, monitoring and optimizing impacts of sustainable enterprise	
Inclusivity	Empower and protect rights to participate in decision making and economic opportunities	% jobs created and supported by the project held by women; Participatory tools for shared governance of the MPAs Target 10y: up to 50% of new SMEs and 30% of MPA direct staff are held by women Target 5y: MoV for participation of communities in the MPA co-management advisory committees	UNDP Social and Environmental Standards (SES) aligned with alignment with the updated UN Sustainable Development Cooperation Framework (formerly UNDAF)	



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13. Communication and Visibility

The communication strategy for this project includes a multi-pronged approach that uses print media, social media, videos, photos, events, and other mediums to share project information with different audiences. Lessons learned, including best practices and challenges and how they were overcome, will be documented on a regular basis. Information and data will come from staff monitoring and observations, key focus group discussions, data collection, and regular reflection sessions with the staff and project participants. Content distribution as well as medium of delivery will be adapted to the audience. Information will be developed in ways that are accessible for local people, and will rely extensively on active community engagement through local organisations and associations that have established community networks.

Target audiences include the private sector (tourism industries, dive shops, investors), government (including national and local government units that focus on fisheries, conservation, and tourism, among others), coastal community groups (women's, youth, fishers, and other groups), law enforcement agencies, conservation and economic development NGOs, foundations, investors and local financial institutions, and other donors. Each will require a differentiated strategic approach. In addition, it cannot be assumed that all audiences will have regular access to the internet. There will therefore be a strong focus on both offline and online communications strategies and tools.

There will be a focus on telling diverse stories about the project. For example, stories may illustrate the marine ecosystem and its significance to Filipinos (such as spotlights on people and their views of the reefs). Or they may focus on the importance of fisheries stewardship, and the steps Filipinos can take to protect the reefs. Communications with youth and schools may give more attention to the wildlife inhabitants of the marine ecosystems and the impact of climate change and human behavior on their survival. Whenever possible, our communications work aims to use images and graphics that demonstrate how the reef is dependent on all of us for its health – thus giving life to the marine ecosystems themselves. Information and communications for investors will combine stories about local impact (on both people and ecosystems), but will also emphasize the strong investment opportunities and financial performance to-date of the various interventions. Investor prospectuses and investment fairs will be part of the communications strategy to prospective investors.

For any new brand, building an online presence through social media, email marketing, and web design is a must.

Collaborations with local communications and marketing entities will create community and industry support, while avoid the need to do everything in-house, which is crucial for the longevity, financial efficiency, and success of a project. The project will also put in place attractive and standardized signages which have the ability to unite different sites, build the brand, and offer comprehensive and standardized information for visitation at each site.

Initially in Oriental Mindoro, there are four towns with protected areas co-managed by BA that for now are each managed and marked differently. A cohesive signage and branding strategy will be put in place to link each of the MPAs into the Mindoro MPA Network. Project developers also recognize that visibility for donors and investors is important and there will be a strong focus in communications and outreach in telling the story behind who is involved the project, the different roles they are playing, who is providing financial support, and ensuring that partners' logos and branding are included systematically in the different communications products developed by the project. There will also be a focus on internal knowledge management to ensure that information, and key resources are effectively shared internally across the different partners.



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Marketing and Communications Action Plan

In the first 6 months of the project, the project team will develop a gender sensitive communications and outreach action plan that details key milestones and budget requirements next to different activities. A more detailed plan is included in the annex, however key elements include:

- Project logo and graphics
- Compelling online presence (website, social media etc.)
- Standardized signage across sites
- Investor liaison (including prospectus material etc.)
- Community outreach
- Educational outreach (e.g. schools etc.)
- Communications with visitors and tourism
- Visibility for donors
- Visibility for project partners

Internal knowledge management (e.g. intranet)



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14. Accountability, financial management, and public disclosure

The Programme will be using a pass-through fund management modality where UN Multi-Partner Trust Fund Office will act as the Administrative Agent (AA) under which the funds will be channeled for the Programme through the AA.

The convening agent and recipient organizations shall assume full programmatic and financial accountability for the funds disbursed to them by the Administrative Agent of the Global Fund for Coral Reefs (Multi-Partner Trust Fund Office). Such funds will be administered by each recipient organization, Fund, and Programme in accordance with its own regulations, rules, directives and procedures. Each recipient organizations shall establish a separate ledger account for the receipt and administration of the funds disbursed to it by the Administrative Agent.

Indirect costs of the Recipient Organizations recovered through programme support costs will be 7%. All other costs incurred by each entity in carrying out the activities for which it is responsible under the Fund will be recovered as direct costs. The project management cost should not exceed 18%.

Funding by the GFCR will be provided on an annual basis, upon successful performance of the programme.

Procedures on financial transfers, extensions, financial and operational closure, and related administrative issues are stipulated in the Operational Guidance of the GFCR.

Partners must comply with GFCR Fund brand guidelines, which includes information on donor visibility requirements.

Each recipient organization will take appropriate measures to publicize the GFCR and give due credit to the other partners. All related publicity material, official notices, reports and publications, provided to the press or Fund beneficiaries, will acknowledge the role of the host Government, donors, partners, the Administrative Agent, and any other relevant entities. In particular, the Administrative Agent will include and ensure due recognition of the role of each recipient organization and partners in all external communications related to the GFCR.