



27 JANUARY 2022

How Blue Economy can help Small Island Developing States

EBP2002 Project Sustainability

STUDENTS

i6210098 Juliane Wesselmann
i6216666 Camillo Schmidt
i6209309 Juliane Maria Hilgert

TUTOR

Dr. Serdar Turkeli

FINAL REPORT

Abbreviations

BBNJ	Intergovernmental Conference on an international legally binding instrument under the United Nations Convention on the Law of the Sea on the conservation and sustainable use of marine biological diversity of areas beyond national jurisdiction (UN General Assembly Resolution 72/249)
BE	Blue Economy
EEZ	Exclusive Economic Zone
ESG	Environmental, Social and Governance
MPA	Marine Protected Area
MS	Member State(s)
MSP	Marine Spatial Planning
OECD	Organisation for Economic Co-operation and Development
RSP	Regional Seas Programme
SDG	Sustainable Development Goal
SFDR	Sustainable Finance Disclosure Regulation
SIDS	Small Developing Island States
SMSP	Seychelles Marine Spatial Planning
UNCLOS	United Nations Convention of the Law of the Sea
UNCTAD	United Nations Conference on Trade and Development
UNDESA	United Nations Department of Economic and Social Affairs
UNEP	United Nations Environmental Programme
UNEPFI	United Nations Environmental Programme Finance Initiative
UNGA	United Nations General Assembly
UN-OHRLLS	Office of the High Representative for the Least Developed Countries, Landlocked Developing Countries and Small Island Developing States

Table of Contents

1. Introduction	3
2. General Background	4
2.1 Legal Framework	4
2.2 Blue Financing	4
3. Case Study: Seychelles	5
3.1 Legal Considerations	6
3.1.1 Article 38 of the Constitution of the Republic of Seychelles	6
3.1.2 Nairobi Convention of 1985	7
3.1.3 Seychelles Blue Economy Roadmap of 2018	8
3.2 Blue Bonds	10
3.2.1 Blue Bonds: effectiveness	10
3.2.2 Scaling the opportunity	11
3.3 Marine Spatial Planning	12
3.3.1 How can MSP add value to the BE and the sustainable use of marine resources?	12
3.3.2 Application to Sustainable Development Goal 14 Life Below Water and Goal 17 Partnerships for the Goals	14
4. Policy Recommendations	17
5. Future Research	18
References	19

1. Introduction

Not only does the ocean today face more challenges brought about by humanity than ever before, such as overfishing, acidification, and marine pollution, all causing rapid degradation of marine resources, but it currently holds the vastest potential for economic growth, as the OECD (2016) projected all ocean-based economic activities to double by 2030. Alongside this growth potential are the “significant untapped opportunities for sustainable development” (UNCTAD, 2021) of an ocean-based - commonly referred to as - Blue Economy (hereafter: BE).

This emerging concept of a BE aims to foster sustainable economic growth for all ocean-related activities while “improving human well-being (...), social equity and preserving the environment” (UNDESA, 2021). However, as the quantifiability of marine ecosystems can be difficult, the resources are not adequately valued, thus disregarding the ocean as the basis for a growing economy and reducing poverty (UNDESA, 2021). Especially Small Island Developing States (hereafter: SIDS), which face “unique social, economic, and environmental challenges” (United Nations, 1993), as their Exclusive Economic Zones (hereafter: EEZ) - meaning ocean under their control - average to be 28 times larger than their country’s landmass (UN-OHRLLS, 2021), can significantly benefit from the BE. Whereas the SIDS states amount to less than 1% of the global population with around 65 million collectively, their remote geography forces them to implement “high import and export costs for goods.” These often result in “irregular international traffic volumes” (UN-OHRLLS, 2021) that populations of entire states can be dependent on, given the minimal resources within their state territory.

Therefore, this research aims to explore the following question: *how can the sustainable use of marine resources help SIDS establish a secure economy?*

Given the constraints of this research, it will have numerous limitations, as there will be a focus on one case study that does not explore individual sectors of the BE in depth. Moreover, given the novelty of the BE overall, there is only limited quantifiability of measures implemented.

2. General Background

2.1 Legal Framework

Quintessential for any legal considerations of the oceans is the United Nations Convention on the Law of the Sea (1982) (hereafter: UNCLOS) as it sets out the international legal framework within which all ocean-related activities must be carried out. According to the World Bank Group (2017), only with the “effective implementation of the UNCLOS” can the concept of BE be promoted worldwide as it is the primary source of legislation, including articles on the sustainable use of the oceans and its resources (UNCLOS, 1982). These articles highlight the potential and further amplify the significance of sustainable development using marine resources.

UNCLOS is far-reaching, governing access to marine resources for all, including even landlocked countries with no direct territorial access to the ocean (UNCLOS, 1982), there is, however, no full implementation of the convention and its related instruments. This implementation is necessary for a resilient legal framework - especially for business ventures and investments in the context of BE. Therefore, the UNCLOS must be the basis of all national BE plans as it is the only convention that grants “necessary legal certainty with respect to maritime rights and obligations of states, including with regard to maritime space and resources” (World Bank Group, 2017). Notably, there is currently an ongoing process to create an international legally binding instrument under UNCLOS on the “conservation of and sustainable use of marine biological diversity of areas beyond national jurisdiction” (hereafter: BBNJ). Upon coming into force, this instrument will be central for the governance of the BE to all 167 UNCLOS parties because it will create a new standard for ocean-based sectors in the high seas, EEZs, and territorial waters alike (UNGA, 2017). Furthermore, as in line with the UNGA Resolution 72/249, BBNJ will include binding rules on “measures such as area-based management tools” which can be marine protected areas (hereafter: MPAs) and capacity building (UNGA, 2017).

2.2 Blue Financing

Today, only 1/6th of the financial commitments necessary to achieve SDG 14 have been made, and although green bonds issuance saw a total of \$350 billion in 2021, blue

finance and bonds are still in their infancy (UNEPFI, 2018). The lack of attention on blue finance requires action on two fronts: capital allocation and investment efforts. Shifting a current capital allocation from an unsustainable to a sustainable pathway is the first step in realizing its potential. Both the Sustainable Finance Disclosure Regulation and the EU Taxonomy aim to achieve this by requiring sustainable finance disclosures and establishing which business activities are deemed sustainable. The second importance of financing a BE lies in bridging the apparent investment gap to achieve objectives in time. One concept of relevance is the blue bond concept, a debt instrument issued by governments, development banks or others to raise capital from impact investors to finance marine and ocean-based projects with positive environmental, economic and climate benefits (World Bank, 2018). Ultimately, blue bonds prove to be an extremely useful tool to increase investment in the BE.

Whereas interest in blue finance is high among investors, industry expertise is low (Fritsch, 2020). Moreover, the sustainable BE is poised for an increase in importance over the coming decade, with a third of investors in a case study done by Credit Suisse seeing it amongst the most important topics of 2030. Tapping into this vast potential will be pivotal for SIDS in establishing sustainable economies and becoming increasingly resilient towards the adverse effects of climate change. However, the main barriers for investors are a lack of investment-grade projects and no internal expertise. Moreover, managers do not offer any products for asset owners or raise the topic with them (Fritsch, 2020). Thus, evaluating blue bonds in conservation and financial effectiveness provides context and expertise for policy-makers, investors, and conservationists. In doing so, significant contributions can target achieving a BE and SDG 14: Life below water.

3. Case Study: Seychelles

The Republic of Seychelles is a suitable case study as its unique legal and economic activities can provide and add value to fellow SIDS. Being a SIDS themselves, located in the Western Indian Ocean, the island nation has pioneered the BE through blue bonds and marine spatial planning (hereafter: MSP). While the land area is only 175 square miles, its EEZ of 200 nautical miles (UNCLOS, 1982) amounts to 400,000 square nautical miles. Furthermore, its

economy depends on ocean-based sectors such as fishing and marine tourism (The Commonwealth Blue Charter, n.d.). Lastly, Seychelles has either been a party or creator of novel ocean governance policy in line with international law and (supra-)regional commitments.

3.1 Legal Considerations

The Republic of Seychelles, as pioneers of MSP as well as blue bonds (IISD, n.d.), have implemented various legislations in conjunction with publications of strategies and action plans to follow through on their commitments within the realm of BE (Legislation & Policy, n.d.). Further, the republic is party to the specialized agency on shipping, the International Maritime Organisation, several international conventions such as the UN Convention on Biological Diversity and the UNCLOS. In addition, it has committed itself to the 2030 Agenda/Sustainable Development Goals. In the following, the most suitable legislation will be addressed by summarizing their content and explaining their relevance for BE.

3.1.1 Article 38 of the Constitution of the Republic of Seychelles

Already in its preamble, the republic declares its commitment to four quintessential pillars of a thriving BE, namely “maintaining Seychelles (...) economically”, the active participation “in the sustainable economic and social development” as well as the preservation of a “safe, healthy and functioning environment” (Constitution of the Republic of Seychelles, 1993). More significant for the successful implementation of BE, given that the constitutional preamble is not binding, is, however, Article 38 of the Seychelles Constitution. In it, “the right of every person to live in and enjoy a clean, healthy and ecologically balanced environment” is enshrined and, in sub-clauses a to c, the state further imposes duties on itself to successfully grant the right as mentioned above to its constituents (Constitution of the Republic of Seychelles, 1993). These duties are as follows: “to take measures to promote the protection, preservation and improvement of the environment; to ensure a sustainable socio-economic development of Seychelles by a judicious use and management of the resources of Seychelles; and finally to promote public awareness of the need to protect, preserve and improve the environment” (Constitution of the Republic of Seychelles, 1993).

Thus, implementing BE aligns perfectly with the constitution; it amplifies the fundamental right of a healthy environment that the Seychellois enjoy. BE effective wishes to establish a thriving economy while adhering to environmental standards to grant longevity of the marine resources used and the aquatic environment as a whole. Such protection can be achieved by requiring the creation or extension of MPAs when allocating marine sectors in a State's territorial waters and EEZ. While implementing MSP, 13 new MPAs have been created by the Seychellois government (The Commonwealth Blue Charter, n.d.), and the issuance of the blue bonds relied (among others) on the expansion of the sustainable utilization of MPAs such as allowing for restricted fishing (Hunt, P. et al., 2019). Therefore, this article is also the main legal basis upon which the creation of both BE pioneering flagship projects that will be discussed in this paper relies.

3.1.2 Nairobi Convention of 1985

Not only does Seychelles have legislation governing the use of marine resources in its waters, but they are further signatory to the Nairobi Convention for the Protection, Management, and Development of the Marine and Coastal Environment of the Western Indian Ocean. This is one of eighteen Regional Seas initiatives part of the UNEP's Regional Seas Programme (hereafter: RSP). These RSP aim to utilize sustainable management of marine resources and the coastal environment to combat the ocean's degradation by unifying nations that share/are close to the same aquatic environment, hence the RSP (UNEP, n.d.). The Nairobi Convention, which entered into force in 1996, focuses on the Western Indian Ocean. Its member states (hereafter: MS) other than Seychelles are Comoros, France, Kenya, Madagascar, Mauritius, Mozambique, Somalia, Tanzania, and South Africa (UNEP, n.d.).

This Convention establishes a legal framework for the region in which the administrations of governments, alongside citizens and the private sector, can collaborate in the name of the Western Indian Ocean. Furthermore, this regional agreement encourages the development of programs that "strengthen the capacity to protect, manage and develop their coastal and marine environment." Consequently, the successful creation of the Seychelles BE project can foster quick implementation across the board (fellow MS and other RSPs) due to vast information sharing (Nairobi Convention, 1985).

Therefore, the Nairobi Convention is important as it includes various national and regional stakeholders, but it can further facilitate the effective implementation of successful Seychelle programs, especially for other SIDS, many of which are in RSPs. This facilitation can be especially fruitful in line with SDG 14.c. This SDG aims to “enhance the conservation and sustainable use of oceans and their resources by implementing international law as reflected in UNCLOS, which provides the legal framework for the conservation and sustainable use of oceans and their resources” (UNEP, n.d.). Thus, blue bonds and MSP as ocean-related instruments are easier ratified, accepted and implemented nationally via their introduction into pre-existing regional legal frameworks.

3.1.3 Seychelles Blue Economy Roadmap of 2018

Most vital for the facilitation of the projects to be discussed is Seychelles domestic Blue Economy Roadmap, which plans to implement all created policies to strengthen this SIDS economy while safeguarding marine resources and their environment through sustainable management until 2030. This integrated plan made for “prosperous ocean-based sustainable development which brings together economy, environment and society” (Seychelles Government, 2018) received approval by the Seychelle government on 31 January 2018. It used, amongst others, the Sustainable Development Goals (hereafter: SDGs) as their basis. It is further meant to amplify the “Seychelles Blue Economy Brand”, given the unique Seychellois approach to ocean governance that builds on existing national and international legal frameworks and its novel flagship project - MSP and blue bonds.

The BE Roadmap implementation builds on four pillars: “economic diversification and resilience, shared prosperity, food security and well-being, and lastly integrity of habitat and ecosystem services” (Seychelles Government, 2018). Four respective strategic priorities have been created aligned with these pillars to ensure the most effective actions and investments, measured by 2030 objectives the government imposed on itself by informing “sector-based planning and development” (Seychelles Government, 2018).

To achieve ‘economic diversification and resilience’, Strategic Priority 1 aims to create sustainable wealth by diversifying the existing marine-based sectors as well as “exploring new and emerging sectors” (Seychelles Government, 2018). To exemplify, the former would increase sustainability standards and good practices on fisheries. At the same

time, the latter would be the creation of new flagship projects in marine biotechnology within this BE policy framework. Strategic Priority 2, tackling “shared prosperity” and “food security and well-being”, is focused on equitable distribution of high living standards for all Seychellois by improving local production systems, making academic and professional education accessible and encouraging the local business environment. To “secure healthy and productive oceans”, Strategic Priority 3 relies on MPAs, utilizes its GDP through the inclusion of ecosystem service accounting, and finally the building resilience of BE via “mitigation and adaptation strategies consistent with obligations under the United Nations Framework Convention on Climate Change” (Seychelles Government, 2018). Finally, Strategic Priority 4 aims to strengthen the BE itself and its enabling environment to successfully reap the “economic, social and environmental benefits of BE” (Seychelles Government, 2018). This includes finalizing Seychelles’ MSP in 2020, increasing research, development, and innovation, and further financing BE by funding cross-sectoral marine-based sustainable projects.

Most importantly, for this legal part, this key strategy wishes to expand “national marine security strategies and regional cooperation” to threats facing the ocean and subsequently BE, such as illegal activities or degrading marine resources. It further includes mandatory increased participation of stakeholders of all levels - i.e. “government, industry, civil society and regional partners” (Seychelles Government, 2018) - and utilizes the international advocacy granted to them as a SIDS to continuously “attract technical and financial resources and keep island issues at the forefront of the global development and climate change agendas” (Seychelles Government, 2018).

Through the success of Seychelles’ flagship projects, is increased interest in the potential of BE for SIDS. Their feasibility is proof of the untapped opportunities that can aid fellow SIDS and, in fact, all states with territorial waters and EEZs that the sustainable use of marine resources within a legal framework can help both an economy and the ocean to thrive. Therefore, these two flagship projects - blue bonds and MSP - will now be expounded.

3.2 Blue Bonds

The World Bank Treasury put together an innovative financing package in 2016 that mobilized \$15 million of private sector investment to support the ocean economy and help the Seychelles government save over \$8 million in interest charges over the next ten years (World Bank, 2018). In addition, it provided credit enhancement support through a guarantee, which reduced the Seychelles borrowing cost by at least 2%. The blue bond was structured with a custom 10-year maturity aligned with Project funding needs and the Seychelles liability profile (The Nature Conservancy, 2019). Essentially, the proceeds from the bonds helped to pay for marine protection, fishery management, and other projects that the country very much depends on to safeguard the ocean economy. It also led to the Seychelles Maritime spatial plan, a condition for debt reduction and part of the blue bond framework.

3.2.1 Blue Bonds: effectiveness

The blue bond has the inherent potential to serve as a model for other small island developing states and coastal countries (The Nature Conservancy, 2019). Similar to the world bank's first green bond ten years ago, the blue bond is another example of the influential role that capital markets can play in supporting sustainable objectives (World Bank, 2018). In fact the blue bond led to \$430,000 per year for marine conservation and climate change adaptation for the Republic of Seychelles. Furthermore, it led to the protection of 86 million acres of ocean, which exceeds the goal of 30% of The Seychelles Exclusive Economic Areas, ultimately supporting SDG Target 14.1 as described previously (The Nature Conservancy, 2019). Other countries have followed suit in this approach (Hailey, 2021), with Belize attempting to employ a similar approach to lower its debt in October of 2021. In addition, it had announced a tender offer for its existing \$553 million Eurobond in 2034, which will be financed by the concurrent placement of a blue bond.

It is estimated that blue bonds can support islands and coastal nations to build more resilient economies, benefit communities, and conserve 15% of the ocean than projected over the next five years (The Nature Conservancy, 2019). In addition, blue bonds create a positive-sum interaction: the national governments get significant financial savings to invest in natural resources that support their respective economies; the donors who provided the

original seed realize incredible leverage on their philanthropic investment with a multiplier of up to 40 times.

3.2.2 Scaling the opportunity

The Nature Conservancy, which partnered up with the World Bank in 2016 for the first blue bond in Seychelles, is currently working with island and coastal nations in the Caribbean, Latin America, the Pacific islands, and the West Indian Ocean to improve marine management of ocean areas. Additionally, they cooperate to create more marine protection zones for the following five years (The Nature Conservancy, 2019). Although this would require philanthropic funding of \$40.5 million to initiate projects in those countries, additional private investments can then be secured to work with countries on restructuring of their national debt and additionally securing long-term sustainable financing for ocean conservation through the multiplier effect of the initial investment, which in the case of Seychelles was nearly up to 40 times.

These governments' new marine protections will provide better management and conservation for 4 million square kilometers of ocean, representing an incredible 15% increase in the amount of sea currently exists. These ocean goals include 50% in high protection status to protect marine biodiversity and ecosystem function, and 50% in biodiversity as well as sustainable use zones to ensure biodiversity and sustainable livelihoods (The Nature Conservancy, 2019).

All these areas are home to about 13% of global coral reefs, and by customizing marine protection plans, coral reef protection and restoration would be ensured. In turn, those healthy reefs provide habitats for all saltwater species and can seed surrounding reefs by spreading coral larvae through the ocean's currents.

Establishing MPAs in only 20 countries would cover 13% of the world's coral reefs, ultimately benefiting the more than 2.4 billion people living in coastal regions through more sustainable economies and stronger resilience to climate change.

3.3 Marine Spatial Planning

The following case study addresses the implementation of the MSP tool, which was implemented in the Seychelles region of the Indian Ocean. MSP was first created in the 1980s by UNESCO and gained increasing attention, project implementation, and research legitimacy over the past decades. The management tool MSP is used to sustainably allocate marine space and resources among different interest groups and stakeholders of ocean resources for example tourism, fishing industries, local governments, etc. Simultaneously, MSP has the dual scope of balancing ecological protection of the affected ecosystem while at the same time fostering economic development as MSP is a strategy of implementing BE objectives to marine markets (Kirkfeldt & Frazão Santos, 2021).

The Seychelle case was chosen as this ocean is an important “global biodiversity hotspot”, however, surrounded by an economy heavily relying on fishing and tourism. As these activities pose a danger to a balanced ecosystem, MSP had to be implemented (SMSP, 2015). And, considering the importance of this delicate ecosystem it is crucial MSP is implemented in Seychelle in alignment with the sustainability goals as introduced below.

The Seychelles Marine Spatial Plan (hereafter: SMSP) initiative started in 2014 and was further developed with supporting financial plans in 2016, completed in 2020. The SMSP initiative aims to balance economic sustainability with sustainable marine biodiversity in the Seychelles EEZ, which entail an ocean region of 1,374,000km² and around 115 islands (The Ocean Conference, 2022).

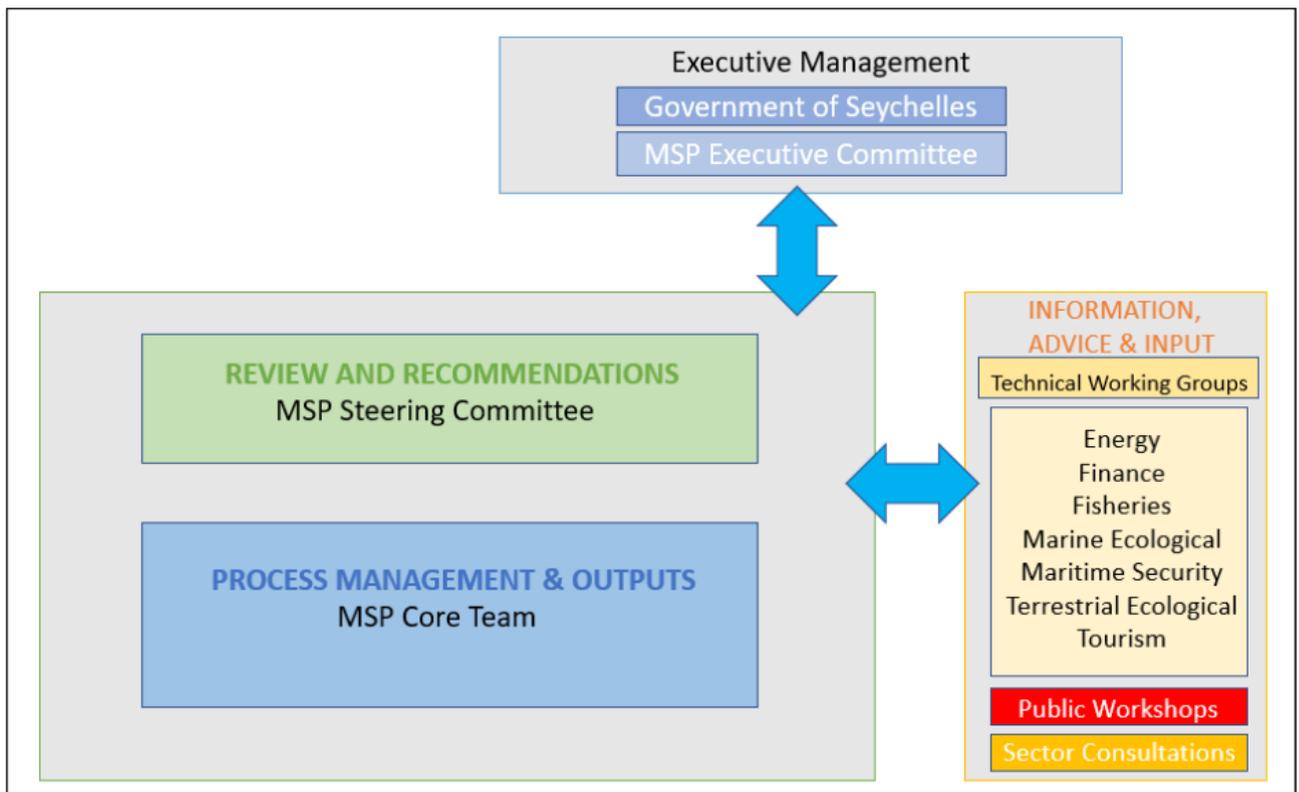
3.3.1 How can MSP add value to the BE and the sustainable use of marine resources?

MSP can support a BE in multiple factors. First of all, MSP considers and unifies the objectives of various stakeholders of different BE sectors, e.g., fisheries, renewable energy sector, etc. Second, MSP contributes to data sharing by enhancing communication, incentive alignment, and joint investments among different stakeholders, as described in the blue finance analysis above. Data sharing is also a crucial requirement and ties to the targets of SDG 17, as explained below. Furthermore, MSP fosters great ecological benefits as it allocates space and resources to specific sectors in an ecosystem-based approach. This benefit of MSP ties to SDG 14 targets. Finally, the MSP tool supports open innovation as a

transdisciplinary management effort. Thus, it creates the environment for advancing technological innovations, including geological, economic, and social actors (Young, 2015).

In the Seychelle case, the MSP can add value to the regional BE as it is a transdisciplinary approach that facilitates dialogue and incentive alignment among multiple stakeholders of the BE. Furthermore, as MSP pursues a dual scope of balancing ecosystem protection and economic development, it increases data sharing and open innovation in the BE.

Also, in the case of Seychelle, these economic benefits are visible. First of all, “Improved Management” can be identified as the collaborative effort of scientists, stakeholders, and regional citizens resulting in 30% of Seychelle’s water being protected area for marine species, improved tourism management, and coordinated fisheries and shipping routes. Thus the collaborative effort improved long-term success for these different sectors. Additionally, the SMSP project implemented a unique “Governance framework” which allocates decision-making processes clearly.



This clear power structure is crucial to creating a steady business environment for the regional private sector (Governance Framework, 2021). Moreover, both of these benefits of

MSP are critical qualitative impacts for implementing a BE as identified by the European Commission (European Commission, 2020). The picture above illustrates the governance structure and hierarchy of the SMSP project, as found in Smith (2019).

3.3.2 Application to Sustainable Development Goal 14 Life Below Water and Goal 17 Partnerships for the Goals

To assess whether the SMSP project was implemented in alignment with the SDGs, the paper focuses on SDG 14 “Life Below Water” and SDG 17 “Partnerships for the Goals”. Both SDGs are important to consider in the implementation of MSP..

Firstly, SDG 14 is crucial as MSP has the challenge of dual scope, namely: balancing interests and actions considering ecosystem protection and economic development simultaneously. The authors Kirkfeldt and Santos address this challenge as follows; “this ambiguity has resulted in MSP cases predominantly focused on achieving economic objectives before planning for environmental objectives” (2021). Considering that the Seychelles economy heavily relies on the delicate marine ecosystem and its marine resources, streamlining the objectives of SMSP with SDG 14 targets is essential.

SDG 17 includes forming partnerships and collaborations to achieve the other SDG targets (The 17 goals, 2022). Therefore, every strategy aiming to achieve an integrated BE should consider and comply with SDG 17, especially as waters and oceans are often transboundary. However, inner country SDG 17 must also be considered in implementing a complex management tool as the SMSP.

The assessment of the compliance of the SMSP project with SDG 14 and 17 is as follows.

Firstly, a specific SDG target was chosen, and their measurement was determined using the target indicator. Next, the support SMSP contributes to this indicator is evaluated. Finally, the assessment is concluded with an analysis of financial or legal support in the SMSP implementation.

Considering the application of SDG 14 first, the implementation of the SMSP initiative was actually an effort of the region to achieve the SDG 14 targets about “Life below water” in the regional BE (The Ocean Conference, 2022).

Table 1 below illustrates one specific application of an SDG 14 target on the Seychelle case.

SDG Target	Assessment of Target 14.4	Implementation of indicator 14.4.1 in SMSP		
Target 14.4: “Effectively regulate Harvesting and End Overfishing, Illegal, Unreported and Unregulated Fishing, and Destructive Fishing Practices”	Target 14.4.1 Indicator: “Proportion of fish stocks within biologically sustainable levels”	Commitment	Implementation	Financing
		1.Ecosystem approach to fisheries (EAF) 2.Reduction of fisheries by-catch and product waste/losses	By 2020, Seychelles identified 15% of the exclusive zone for medium biodiversity and sustainable use zones, improving fisheries management.	Protected EEZ as a pre-requirement condition for blue bonds.

Sources table 2: (Division, 2022), (Smith, Sims & Cosgrow, 2019), (Governance Framework, 2021)

As showcased in the table the target 14.4 is the sustainable proportion of fish stocks. SMSP supports the protection and biodiversity of fish stocks by implementing the exclusive zone. This implementation underlines that the MSP project in Seychelle is aligned with this target of SDG 14, and thus one can conclude the ambiguity of MSP was considered. Furthermore, strategies were undertaken to stress the ecosystem protection in Seychelle. Finally, sustainable financing in the project was established using blue bonds. As illustrated in the table, protected exclusive zones were a pre-requirement condition for these bonds.

To assess how the SMSP project implemented the 17th sustainability goal, the table below represents an application of the SMSP governance framework and the SDG 17 target 17.17 (Seychelles ∴ Sustainable Development Knowledge Platform, 2020).

SDG Target	Assessment of Target 17.17	Implementation of indicator 17.17.1 in SMSP		
Target 17.17: “Encourage and promote effective public, public-private and civil society partnerships, building on the experience and resourcing strategies of partnerships”	Target 17.17.1 Indicator: “Amount of US dollars committed to public-private partnerships for infrastructure”	Commitment	Implementation	Legal Consideration
		The SMSP takes and integrated, science-based, multi-sector approach with robust stakeholder engagement.	Governance Framework: Including government, scientists, environmental organisations, and private sector representatives.	The Blue Economy Roadmap (including MSP projects) uses national policies e.g. Nairobi Convention, to ensure a legal framework that includes participation of all stakeholders.

Sources table 2: (Division, 2022), (Smith, Sims & Cosgrow, 2019), (Governance Framework, 2021)

Considering the indicator of target 17.17.1, no specific information about the amounts of US dollars spent on building partnerships in the SMSP project are disclosed. However, project reports describe an extensive “participatory process,” including about 100 workshops and meetings with 11 different marine sectors representatives and other stakeholder groups (Smith, Sims & Cosgrow, 2019).

However, the suitability of this indicator is questionable principally. Measuring the engagement and participation of the different public, private and civil stakeholders in monetary values creates room for false assumptions and shortcomings of this measure. For example, as in the case of SMSP, multiple workshops were offered to create the opportunity for different stakeholders to be informed and engaged in the MSP process to participate in advisory and decision-making boards, as seen in the projects Governance Framework above. However, the measure of monetary value spend on these workshops and meetings provides little information about the quality of the participatory process. Large amounts of US dollars spent here could be merely a means to rent an expensive venue but disclose little information about the content of these engagement strategies.

Whereas the SMSP project does not disclose a specific monetary value, its compliance with SDG target 17.17 can be assessed using the legal framework within which the SMSP exists. The completion of SMSP by 2020 was included in Strategic Priority 4 as aforementioned in the Seychelles Blue Economy Roadmap, making its full implementation a governmental duty. This roadmap further mandated improved stakeholder participation and partnerships between

“the government, industry, civil society and regional partners” (Seychelles Government, 2018). Such a legally binding requirement for strengthening alliances of stakeholders, both domestically and internationally, can be found in the Nairobi Convention, which unifies stakeholders of the Western Indian Ocean Region to ensure sustainable and prosperous use of the marine resources in a said region (UNEP, n.d.). This convention further amplifies stakeholder participation. It provided intern-governmental conferences and increased data sharing specifically targeted to improving the ocean based sectors while upholding a high standard for the environment (Nairobi Convention, 1985).

4. Policy Recommendations

These policy recommendations could be implemented nationally, at regional, and international legislative levels. Firstly, the introduction of blue bonds, MSP, and other projects fostering BE into national action plans by creating legislative initiatives modeled after the Seychelles Blue Economy Roadmap, which is especially recommended for other SIDS. Secondly, by amending existing respective conventions of RSPs around the world, such as the Nairobi Convention, meaning that the successful Seychelles flagships would be introduced in an already established regional legal framework specifically targeting prosperous ocean use. Lastly, projects like MSP could be introduced into the United Nations legal instrument currently being drafted, as the BBNJ is set out to govern beyond territorial waters.

Based on the assessment, the recommendations for legal, MSP, and financial considerations respectively for all states, but especially SIDS, to grow their ocean-based economy sustainability are as follows:

1. encourage implementation and, if needed, creation of nationally, regionally, and internationally binding legal instruments anchored in the UNCLOS and modeled after the legal framework utilized in Seychelles in line with SDG 14.c
2. derive from the SMSP, especially regarding the nationally implemented legislation and policies anchored in the UNCLOS for the BBNJ in line with SDG Target 14. c and SDG 17

3. implement MSP projects; it is crucial to consider the targets of SDG 14 and to ensure to align the objectives of the sustainability measurement and the project
 - a. implementing a complex management tool like MSP requires the inclusion of stakeholders and interest groups in line with SDG 17
4. establish a data platform under which firms are required to upload sustainable finance disclosures based upon common metrics on an UN-wide level
5. foster the use of blue bonds by SIDS as an instrument for significant improvement in marine resource protection and climate change resilience in line with SDG 14.7

5. Future Research

Research in the realm of blue finance, specifically blue bonds, should investigate how blue bonds can most effectively grow by increasing the comparability of sustainability data and sustainable finance disclosure regulations. This standardization will allow policymakers to tailor policy solutions to the ESG market's problems more effectively. Ultimately, and most importantly, this will circumvent greenwashing by clearly defining what sectors are entitled to receive funds according to sustainability criteria.

Additionally, further research should be conducted about the suitability of MSP to serve as a strategy to implement a regional BE. This research is essential specifically for SIDS, whose economy heavily relies on marine resources and space.

This future research will be crucial to inform the creation of new policies and legal instruments like the BBNJ that further aim to secure the sustainable use of marine resources to promote BE, both for SIDS and other states alike.

References

Constitution of the Republic of Seychelles, consolidated to 1 June 2020 (1993). <https://seylli.org/sc/legislation/consolidated-act/42>

Division, U. (2022). SDG Indicators — SDG Indicators. Retrieved 18 January 2022, from <https://unstats.un.org/sdgs/metadata/?Text=&Goal=17&Target=>

European Commission, Executive Agency for Small and Medium-sized Enterprises, (2020). *Study on the economic impact of maritime spatial planning : final report : abridged version*, Publications Office. <https://data.europa.eu/doi/10.2826/057133>

Fritsch, D. (2020). Investors and the Blue Economy. Credit Suisse. <https://www.credit-suisse.com/media/assets/microsite-ux/docs/2021/decarbonizingyourportfolio/investors-and-the-blue-economy-en.pdf>

Governance Framework. (2021). *Seychelles Marine Spatial Plan Initiative*. Retrieved 27 January 2022 from <https://seymsp.com/the-initiative/structure/>

Hale, K. (2021, October 18). Africa's Seychelles Blue Bond Economy Inspires Belize. Forbes. Retrieved 18 January 2022, from <https://www.forbes.com/sites/korihale/2021/10/14/africas-seychelles-blue-bond-economy-inspires-belize/?sh=9f9aed169cc1>

Hub, Iisd. S. K. (n.d.). *Blue Economy Innovations by SIDS Can Advance Climate Action and Survival | News | SDG Knowledge Hub | IISD*. Retrieved January 19, 2022, from <https://sdg.iisd.org/news/blue-economy-innovations-by-sids-can-advance-climate-action-and-survival/>

Hunt, P., Franklin, A., & Ardilla, C. (2019). *Capital Market: Blue Bonds - Out of the blue*. International Financial Law Review. <https://www.lw.com/thoughtLeadership/iflr-out-of-the-blue-discuss-seychelles-first-blue-bond>

Kirkfeldt, T., & Frazão Santos, C. (2021). A Review of Sustainability Concepts in Marine Spatial Planning and the Potential to Supporting the UN Sustainable Development Goal 14. *Frontiers In Marine Science*, 8. doi: 10.3389/fmars.2021.713980

Legislation & Policy. (n.d.). Retrieved January 26, 2022, from Seychelles Marine Spatial Plan Initiative website: <https://seymsp.com/resources/legislation-policy/>

Nairobi Convention, Consolidated to 31 March 2010 (1985).
<https://wedocs.unep.org/bitstream/handle/20.500.11822/21167/UNEP-DEPI-EAF.CP.7.Inf4a%20-en%20Amended%20Nairobi%20Convention.pdf?sequence=1&isAllowed=y>

OECD (2016) *The Ocean Economy in 2030*. <https://doi.org/10.1787/9789264251724-en>

SMSP ON THE LEADING EDGE OF MARINE CONSERVATION AND CLIMATE ADAPTATION. (2015). Retrieved from <https://www.cbd.int/doc/meetings/mar/soiom-2016-01/other/soiom-2016-01-seychelles-02-en.pdf>

Seychelles ∴ Sustainable Development Knowledge Platform. (2020). Retrieved 18 January 2022, from <https://sustainabledevelopment.un.org/memberstates/seychelles>

Seychelles Government (2018). *Strategic Policy Framework and Roadmap: Seychelles' Blue Economy*. Retrieved January 26, 2022, from <https://seymsp.com/wp-content/uploads/2018/05/CommonwealthSecretariat-12pp-RoadMap-Brochure.pdf>

Smith, J., Sims, H., & Cosgrow, W. (2019). Seychelles Marine Spatial Plan Initiative – an update on milestones and implementation planning. *Research Notes*, 1(2). Retrieved from <https://seychellesresearchjournalcom.files.wordpress.com/2019/08/seychelles-marine-spatial-plan-initiative-j.-smith-h.-sims-w.-cosgrow-a.-de-comarmond-w.-agricole-r.-tingey.pdf>

Smith, J. (2019). Marine Spatial Planning in Seychelles. doi: <https://dx.doi.org/10.13140/RG.2.2.21820.67208>

THE 17 GOALS | Sustainable Development. (2022). Retrieved 25 January 2022, from <https://sdgs.un.org/goals>

The Commonwealth Blue Charter (n.d.). *Marine Protected Areas Case Study*. Retrieved January 26, 2022, from https://bluecharter.thecommonwealth.org/wp-content/uploads/2021/02/CBC-Case-Studies_49-MPA-Seychelles.pdf

The Ocean Conference | Develop a marine spatial plan for Seychelles' Exclusive Economic Zone. (2022). Retrieved 18 January 2022, from <https://oceanconference.un.org/commitments/?id=17923>

The Nature Conservancy. (2019, April 15). An Audacious Plan to Save the World's Ocean. <https://www.nature.org/en-us/what-we-do/our-insights/perspectives/an-audacious-plan-to-save-the-worlds-oceans/>

UNCTAD. (2021). *Evidence-based and policy coherent Oceans Economy and Trade Strategies* | unctad.org. Retrieved January 18, 2022, from <https://unctad.org/project/evidence-based-and-policy-coherent-oceans-economy-and-trade-strategies>

UNDESA (n.d.) Exploring the potential of the blue economy | United Nations. Retrieved January 19, 2022, from <https://www.un.org/en/desa/exploring-potential-blue-economy#:~:text=%E2%80%9CA%20blue%20economy%20is%20a>

UNEPFI. (2018). The Principles – United Nations Environment – Finance Initiative. UNEPFI.Org. Retrieved 27 January 2022, from <https://www.unepfi.org/blue-finance/the-principles/>

United Nations. (n.d.). Intergovernmental Conference on Marine Biodiversity of Areas Beyond National Jurisdiction | United Nations. Un.org. Retrieved 27 January 2022, from <https://www.un.org/bbnj/>

United Nations. (2021). *Goal 14 | Department of Economic and Social Affairs*. Sdgs.un.org. Retrieved 25 January 2022 from <https://sdgs.un.org/goals/goal14>

United Nations. (2021). *Goal 17 | Department of Economic and Social Affairs*. Sdgs.un.org. Retrieved 25 January 2022 <https://sdgs.un.org/goals/goal17>

United Nations. (n.d.) *Volume I Resolutions Adopted by the Conference [Review of Volume I Resolutions Adopted by the Conference]* In Report on the United Nations Conference on the Environment and Development. Retrieved 18 January 2022, from [https://undocs.org/en/A/CONF.151/26/Rev.1\(vol.I\)](https://undocs.org/en/A/CONF.151/26/Rev.1(vol.I))

United Nations Environment Programme (n.d.). *Regional Seas Programme*. Retrieved 18 January 2022, from <https://www.unep.org/explore-topics/oceans-seas/what-we-do/regional-seas-programme>

United Nations General Assembly (2017) Resolution 72/249: *International legally binding instrument under the United Nations Convention on the Law of the Sea on the conservation*

and sustainable use of marine biological diversity of areas beyond national jurisdiction. Retrieved 18 January 2022, from <https://undocs.org/en/a/res/72/249>

UN-OHRLLS (2021). *About Small Island Developing States | Office of the High Representative for the Least Developed Countries, Landlocked Developing Countries and Small Island Developing States.* www.un.org. Retrieved January 18, 2022 from <https://www.un.org/ohrls/content/about-small-island-developing-states>

UN-OHRLLS (2021). *List of SIDS | Office of the High Representative for the Least Developed Countries, Landlocked Developing Countries and Small Island Developing States.* www.un.org. Retrieved January 18, 2022 from <https://www.un.org/ohrls/content/list-sids>

World Bank. (2018). *Seychelles: Introducing the World's First Sovereign Blue Bond.* <https://thedocs.worldbank.org/en/doc/242151559930961454-0340022019/original/CasestudyBlueBondSeychellesfinal6.7.2019.pdf>

World Bank Group, & United Nations Department of Economic and Social Affairs. (n.d.). *The Potential of the Blue Economy: Increasing Long-term Benefits of the Sustainable Use of Marine Resources for Small Island Developing States and Coastal Least Developed Countries [Review of The Potential of the Blue Economy: Increasing Long-term Benefits of the Sustainable Use of Marine Resources for Small Island Developing States and Coastal Least Developed Countries].* Retrieved January 18, 2022, from <https://sustainabledevelopment.un.org/content/documents/2446blueeconomy.pdf>

Young, M. (2015). *Planning in Facilitating Offshore Renewable Energy Development.* *The International Journal Of Marine And Coastal Law.* Retrieved from https://brill-com.mu.idm.oclc.org/view/journals/estu/30/1/article-p148_5.xml?language=en