The UNOPS input for the background note on SDG 14

1. The present note has been developed by UNOPS as input to the Secretary-General’s background note for the high-level 2020 United Nations Conference to support the Implementation of Sustainable Development Goal 14: conserve and sustainably use the oceans, seas and marine resources for sustainable development in Lisbon, 2-6 June 2020. “Scaling up ocean action based on science and innovation for the implementation of Goal 14: stocktaking, partnerships and solutions.”

Introduction

2. UNOPS is a United Nations resource for services and solutions across peace and security, humanitarian, and development efforts. Its mission is to help people build better lives and countries achieve peace and sustainable development. While UNOPS can expand capacity towards achievement of all the sustainable development goals, the focus is based on partners’ demand and the needs of people and countries. Importantly, the organization has an implementation mandate to support the planning and implementation of infrastructure.

3. The UNOPS implementation mandate and technical expertise can also be brought to the fore in support of SDG 14 – life below water. Conservation and sustainable use of the oceans, seas and marine resources presents a host of challenges and opportunities many of which are related to infrastructure.

4. Through its implementation activities, UNOPS has over the years gained experience and demonstrated its technical expertise in support of small island developing States and other coastal countries.

5. UNOPS can help countries scale up ocean actions based on science and innovation. It can support countries’ application of scientific, evidence-based approaches to planning of quality infrastructure, as well as the innovation needed to find new solutions.

6. UNOPS is engaged in a number of important partnerships in the United Nations and beyond, and has demonstrated its ability to bring in alternative financing in support of the sustainable development goals.

Challenges and opportunities relating to SDG 14

7. Oceans are vital to life. They provide half of the oxygen in the world and are a source of food for billions. They regulate the climate – absorbing heat and more than a quarter of man-made CO2 – and act as a backbone of the global economy. Today, oceans face tremendous challenges, including marine pollution, heating, and acidification. Infrastructure plays a significant part in these challenges – both as a threat and as a potential preserver of the ocean.

8. Waste management infrastructure, i.e. the lack of it, is a leading contributor to marine pollution. Eighty per cent of debris in the ocean comes from the land, for which poor waste
management is partially responsible. For example, eight million tonnes of plastic flow into the ocean every year, which can then remain in the environment for centuries. This means oceans could contain more plastic than fish by 2050. Poor waste management infrastructure can have far-reaching consequences; for instance, burning waste emits greenhouse gases, which in turn harms the oceans. Sustainable waste management infrastructure is therefore the key to curtailing such negative effects when addressing these challenges.

9. Lack of sustainable wastewater management infrastructure also poses a risk to oceans. Close to 80 per cent of the world’s wastewater is released without being treated, and in developing economies, an estimated 80-90 per cent of wastewater flows directly into bodies of water, which ultimately make their way into the oceans, negatively impacting the environment, economy and health along the way. Proper wastewater infrastructure prevents pollution and enables treated water to be reused, which can not only help protect the oceans, but also support industry and agriculture, and create more jobs.

10. Global warming is another threat influenced by infrastructure. In the past, infrastructure has contributed to more than 60 per cent of global greenhouse gas emissions. Carbon emissions cause higher temperatures and acidity in the ocean, which in turn lead to bleaching of the coral reefs. Acidification also affects food security and coastal protection, as well as the ocean’s ability to moderate changes in the climate. If current rates of CO2 emissions from infrastructure continue, acidity is predicted to increase by 100-150 per cent by the end of the century.

11. Using infrastructure to address this threat involves looking at all parts of the process: from identifying projects with minimal emissions (e.g. using renewable energy over fossil fuels), to ensuring projects have lower embodied carbon in their materials, and designing assets so their operation requires lower energy input over their lifetime.

Implementation activities in support of SDG 14

The UNOPS work in quality infrastructure

12. The very challenges posed by infrastructure can be turned into opportunities through sustainable infrastructure development. UNOPS aims to address these issues from a strategic perspective, which is reflected in our approach to partnering with governments. We provide advisory services to support governments in planning, managing and developing sustainable infrastructure projects. By getting involved earlier in the process and considering the entire lifetime of a piece of infrastructure, we not only ensure that our impact on the environment is minimised, but that infrastructure fulfils its potential as a preserver of the environment, including the oceans.

13. For example, UNOPS provided technical assistance in Saint Lucia with the objective of building the government’s capacity in planning long-term infrastructure systems. The health of the ocean is key for the island’s economy, which thrives on tourism. The challenges to address were solid waste management, as the island’s landfills were reaching maximum capacity, and inadequate wastewater treatment facilities, which were causing health risks – such as high
bacteria level and transmission of water-borne diseases – and threatening ecosystems both on land and in water.

14. Through the project, UNOPS supported the government in devising a solid waste management strategy. UNOPS also used centralised and community-based approaches and built on synergies with the water supply sector to provide safe levels of collection and treatment of wastewater. Protecting terrestrial and marine ecosystems from wastewater will lead to long-term opportunities for employment and economic growth through tourism. Furthermore, the ocean will be protected from key threats as a result of the implementation of sustainable infrastructure.

15. Other examples of how UNOPS is expanding the capacity of governments of mainland coastal and island countries in their efforts to achieve the targets of SDG 14 with quality infrastructure include:

a) As outlined in a recent Insight article published on the UNOPS website, fighting the pollution of our oceans begins on land, and integrated water and sanitation management (IWSM) solutions are key. The article highlights UNOPS collaboration with the European Union in Sri Lanka, which worked with local actors to establish a comprehensive waste management solution tailored to local needs, and leveraged technology to ensure efficiency.

b) In the Maldives, UNOPS implemented a range of projects fostering water security/treatment and climate resilience. These measures enabled the improvement of solid waste disposal and treatment, ultimately impacting ocean health in a positive way; and of access to fresh potable water, alleviating the pressure from urbanisation, land use and tourism.

The UNOPS support to small island developing States and other coastal countries

16. Healthy oceans are essential for sustainable development. This is particularly true for countries and territories that due to their location, topography and size are dependent on oceans for their livelihoods, and at the same time disproportionately exposed to the effects of climate change and ocean pollution. As such, coastal countries small island developing States (SIDS) are particularly vulnerable to natural disasters, as well as the environmental pressure created by ocean pollution and coastal developments, which endanger marine and coastal ecosystems, and in turn, livelihoods based on fisheries and tourism.

17. Between 2014 and 2018, UNOPS supported SIDS across all regions, through the delivery of more than USD 242 million worth of projects. As of 2018, UNOPS had significantly stepped up its engagement, supporting all but one small island developing State through more than 70 projects. The current outlook indicates that UNOPS collaboration with and for SIDS will continue to grow over the coming years.
18. A significant portion of UNOPS support to coastal countries and SIDS pertains to water and sanitation infrastructure, as well as grants management in the areas of environmental protection and energy generation:

a) Through the India-UN Development Partnerships Fund ("India-UN Fund"), UNOPS supports for example the Marshall Islands (in solar power) and Nauru (in waste management). During her speech commemorating the second anniversary of the Fund in June 2019, UNOPS Executive Director highlighted the role of partnerships such as this one for transferring technology and expertise.

b) Further, through its global programme on water and energy, the organization has supported the implementation of integrated water resource management programmes in a number of SIDS, so they are better equipped for the negative impacts of climate change. This includes for example efforts in Comoros to address negative effects on the oceans from contaminated river water resulting from overuse. Further details and examples can be found here.

c) UNOPS also works directly on supporting the improved management of marine ecosystems. This includes for example supporting the development of transboundary diagnostics analysis and strategic planning for the Yellow Sea Large Marine Ecosystems (YSLME), and capacity building support for stakeholders of the Caribbean and North Brazil Shelf Large Marine Ecosystems. Both projects were implemented in partnership with the Global Environmental Facility.

Science in support of SDG 14

19. A 2018 study conducted by the University of Oxford and UNOPS showed that sustainable infrastructure underpins 92 per cent of targets across all SDGs.

20. For SDG 14, this includes reducing marine pollution through improved wastewater management; incorporating coastal erosion in flood risk management plans; supporting a move towards renewable energy sources; enhancing port infrastructure to reduce transportation routes and thus fuel use and exhausts; or leveraging digital technologies for combating overfishing. For all coastal cities, including SIDS, land-based infrastructure is essential to safeguard the oceans and seas as a continuous source of livelihoods. The right, well-planned and -executed infrastructure can positively influence the current and future state of marine and coastal ecosystems.

21. In this regard, UNOPS promotes a holistic and evidence-based approach to quality infrastructure. As part of the Evidence-Based Infrastructure (EBI) approach, UNOPS has successfully piloted its Capacity Assessment Tool for Infrastructure (CAT-I) in a number of countries, including in support of the government of Curaçao. In a pilot for evidence-based infrastructure, UNOPS together with the Ministry of Transport, Traffic and Urban Planning of Curaçao and Oxford University, performed a Fast Track Analysis (FTA) of the national infrastructure capacity and interdependencies. The results are presented in a report from May.
Strengthening national capacity, this methodology empowers government partners to plan, deliver and manage their infrastructure systems with a clear focus on sustainability and resilience, including effects on oceans, seas and marine ecosystems.

**Innovation in support of SDG 14**

Innovation is key to addressing the challenges of our time, and to achieving the goals and targets of the 2030 Agenda. Through its growing network of global innovation centres (GICs), UNOPS aims to facilitate innovation contributing to a sustainable society and answering real-life challenges faced by people and countries in need. The centres provide innovators and start-ups with knowledge and skills to take their ideas forward; with financing to support them with the time needed to develop their ideas; with a physical space to host individuals and teams from a global pool of innovators; and with access to local infrastructure, including academia, mentoring teachers and professors, and regulators.

In 2018, UNOPS established its first GIC in Antigua and Barbuda (Antigua and Barbuda Science and Innovation Park, or ABSIP), partnering with the government, as well as a number of private partners, such as Google, SONY, Ocean Generation, Minesto and AirBox. UNOPS renders full operational support, including providing space, organizing annual Hackathons, and facilitating the engagement of private investors. The 2019 winner of the ABSIP Hackathon focused on the hazardous Zaragoza seaweed, which poses a major health issue for the island population, and causes costs of well above USD 15 million annually.

By mid-2019, the GIC in Antigua and Barbuda had attracted USD 600,000 in foreign direct investment, and in-kind donations of around USD 1.5 million, and created 17 new jobs.

In October 2019, UNOPS launched a second GIC in Lund, Sweden, in partnership with the government of Sweden, and Vinnova, Sweden’s innovation agency. Experts from SONY will provide support to accelerate innovation, and contribute to efforts to strengthen the connection between Sweden’s aid initiatives and innovation.

It is widely recognized that addressing the developing needs, including in relation to SDG 14, of the small island developing States will require significant private investments and financing. At the same time, a number of factors inhibit the ability of these countries to access the required resources, including limited capacity to effectively access and absorb such funding. In line with its 2018-2021 strategic plan, UNOPS aims to support countries in expanding the pool and effect of resources available to achieve the 2030 Agenda.

Under its Social Impact Investing Initiative (S3I), the organization commits to helping find innovative financing solutions in order to close the financing gap and accelerate progress towards the 2030 Agenda. The focus is on health infrastructure, affordable housing, and renewable energy. In addition to Ghana, Kenya and India, a first agreement was signed for engaging in the delivery of affordable housing in the Caribbean. This demonstrates how UNOPS can break down the barriers that may prevent private sector investors from engaging in long-term sustainable infrastructure projects in developing and emerging economies.
Partnerships in support of SDG 14

28. UNOPS strongly believes in, and remains committed to, partnerships for achieving SDG 14.

29. Representatives of the SIDS, most notably the Caribbean Community (CARICOM), over the years have first encouraged and then commended UNOPS increased engagement in and partnership with the small island developing States. In its most recent statement during the Second Regular Session 2019 of the UNDP/UNFPA/UNOPS Executive Board, the Representative of Antigua and Barbuda, on behalf of CARICOM, requested extended support in relation to resilient infrastructure, as well as project management and sustainable procurement.

30. On March 1, 2019, UNOPS became a member of UN-OCEANS, an inter-agency mechanism that, amongst other things, seeks to strengthen and promote coordination and coherence of UN system activities related to ocean and coastal areas; identify possible areas for collaboration ahead of time; and facilitate exchange of lessons learnt and best practices.

31. UNOPS is signatory of the United Nations Pacific Strategy (UNPS) 2018-2022, which covers 14 Pacific island countries and territories as well as 26 United Nations agencies working in the Pacific. It is aligned with the SAMOA Pathway as well as a localized response to the 2030 Agenda. The UNPS presents a coordinated approach in support of the 14 signatory Pacific Island Countries and Territories. Outcome 1 aims to address climate change, disaster resilience and environmental protection.

32. Upon receiving an invitation from the government of Palau, UNOPS concluded an agreement with the government to support the organization of the 2020 Our Ocean conference in Palau (the related story on UNOPS website can be found here). The conference will gather between 500-800 participants and leaders who are expected to commit to positive changes related to marine protected areas, climate change, sustainable fisheries, marine pollution, sustainable blue economy and maritime security.

Conclusion

33. The conservation and sustainable use of the oceans, seas and marine resources presents a host of challenges and opportunities. Many of these relate to infrastructure. Through its implementation activities in support of small island developing States and other coastal countries UNOPS has over the years gained experience and demonstrated its technical expertise.

34. UNOPS can help countries scale up ocean actions based on science and innovation. It can support countries’ application of scientific, evidence-based approaches to planning of quality infrastructure, as well as the innovation needed to find new solutions.

35. UNOPS is engaged in a number of important partnerships in the United Nations and beyond, and has demonstrated its ability to bring in alternative financing in support of the sustainable development goals.