



Windmill farms like this one in Cyprus are an example of how Cyprus is actively seeking to encourage the growth of its green economy over the period 2021–2030 by increasing its renewable energy mix, energy efficiency, and electro-mobility infrastructure.

2

# Islands and the Sustainable Development Goals (SDGs): A holistic perspective

## ABSTRACT

*Islands, while individually distinct, share a set of common socio-economic and environmental vulnerabilities and assets which simultaneously impede and support their ability to achieve the United Nations 2030 Agenda for Sustainable Development and its accompanying Sustainable Development Goals*

PREEYA S.  
MOHAN

Sir Arthur Lewis Institute of  
Social and Economic Studies,  
University of the West Indies,  
St. Augustine, Trinidad and Tobago



*(SDGs). COVID-19 has amplified these vulnerabilities and opportunities. Many islands have experienced substantial drops in international tourism revenues and remittances while dealing with negative health impacts and associated lockdown measures. Despite these challenges, islands have been among the most successful jurisdictions in managing pandemic outbreaks, leading some to believe that they may recover better and safeguard progress on the SDGs. Islands are pushing forward through innovative development strategies such as climate action and green energy transformation, propelling the blue economy, and accelerating digital transformation. The objective of this chapter is to provide a holistic perspective on island sustainability through an assessment of their SDG progress and actions in the post-COVID-19 period through a systematic analysis of SDG Reports, Voluntary National Reviews (VNRs), and other SDG-related country plans. Actions on islands that positively contribute to SDG progress are presented through island case studies. The chapter concludes with suggestions on how islands can better achieve the SDGs, and lessons going forward through closer interactions with the SDGs and country development plans and goal-based development, deepening financing, improved stakeholder engagement, and strengthening technical capacity in a post-COVID-19 era.*

## **INTRODUCTION**

Island states are spread across the globe in the Caribbean, Pacific, Atlantic, and Indian Oceans, and the Mediterranean and South China Seas. They account for about 1% of the world's population (Baldacchino, 2007) but represent one-fifth (45 out of 193) of all United Nations (UN) member states. Thirty-eight of these island states fall within the Small Island Developing States (SIDS) grouping recognized by the UN as a distinct group of developing countries facing specific social, economic, and environmental vulnerabilities which impede their ability to achieve sustainable development. There are also four 'developed' island states in Europe, referred to as 'small island states' (Connell, 2013). In addition, there are substantial numbers of sub-national island jurisdictions (SNIJs), which are territories that continue to be associated with a larger sovereign state, but with a high level of internal autonomy found mainly in the developing world (Baldacchino, 2006; McElroy & Pearce, 2006; Stuart, 2009). Island countries and territories have a long history of commitment to the goal of sustainable development. They pioneered and adopted the Barbados Plan of Action (BPoA) in 2004, followed by the 2005 Mauritius Strategy of Implementation (MSI) and the 2010 MSI+5 review, and the SIDS Accelerated Modalities of Action (SAMOA) Pathway in 2014 and its review in 2018. At the UN Sustainable Development Summit in New York in 2015, island states delivered passionate and compelling speeches regarding the adoption of the 2030 Agenda for Sustainable Development and the Sustainable Development Goals (SDGs) which were unanimously adopted by 193 member states (Randall, 2021).

The 2030 Agenda and its accompanying 17 SDGs and 169 targets provide an integrated, ambitious, and transformative global roadmap for achieving sustainable development by 2030. The literature purports that it provides a framework for recovery from COVID-19 (Allen et al., 2021; Sachs et al., 2020). The SDGs “recognize that ending poverty is the greatest global challenge and an indispensable requirement for sustainable development” (United Nations, 2015, p. 5). The SDGs are fundamentally different from the Millennium Development Goals in that they are considered to be robust and inter-linked based on the framework of the three pillars of sustainability: economic, social, and environmental. The SDGs are built on the core principles of “leaving no one behind,” “inclusiveness,” and “multi-stakeholder partnerships” (United Nations, 2015), emphasizing a holistic approach to achieving sustainable development for all. The COVID-19 pandemic has stalled and even erased some of the achievements made on the SDGs (Mukarram, 2020). The pandemic presents a real threat that islands may be left behind; it has resulted in increased poverty and unemployment for the first time since the adoption of the Goals (Sachs et al., 2021). The attainment of the SDGs nevertheless remains a key policy objective for island countries and territories and, for most forums, an important component of their post-COVID-19 recovery and growth strategy.

**THE PANDEMIC PRESENTS A real threat that islands may be left behind; it has resulted in increased poverty and unemployment for the first time since the adoption of the Goals.**

Islands, while individually distinct, share a common set of structural characteristics, including small size, remoteness, export concentration and tourism dependence, high food imports, and exposure to climate risks and natural disaster shocks, all of which impede their socio-economic outcomes and ability to achieve the SDGs (Sachs et al., 2020; Sachs et al., 2021). Islands also differ by income level, population size, land area, and type of economic activity. Consequently, their performance on the SDGs varies significantly. COVID-19 has also impacted islands differently. Most islands have been successful in managing COVID-19 outbreaks and have kept their population safe owing to their geography and the timely and stringent lockdown measures adopted (Sindico et al., 2020). There are, however, places such as The Bahamas, Jamaica, and Trinidad and Tobago where the number of COVID-19 cases and deaths were high due to a prevalence of pre-existing health conditions and a lack of capacity for detection and treatment (United Nations Department of Economic and Social Affairs [UN DESA], 2020). While health impacts varied, all island states and territories were among the worst hit by the associated economic crisis of COVID-19. GDP in 2021 is likely to shrink by 6.9% in small island economies (International Monetary Fund, 2020). Islands have experienced substantial drops in international tourism revenues, remittances, and capital flows, and face high and growing debt (UN DESA, 2020). The pandemic has also revealed the fragility of islands’ socio-economic

assets such as tourism, food security, health, and digital infrastructure (Sindico et al., 2020). Nevertheless, slogans such as ‘building back better’, ‘new normal’, and ‘greening of the economy’ demonstrate that islands view the pandemic as an opportunity to recover and safeguard progress on the SDGs (Randall, 2021). Islands are pushing forward through innovative development strategies such as climate action and renewable energy transition, propelling the blue economy, and accelerating digital transformation. These strategies are, however, dependent on access to international financing, goal-based development, and technical capacity, as well as stakeholder buy-in and engagement.

**THE COVID-19 PANDEMIC HAS also revealed the fragility of islands’ socio-economic assets such as tourism, food security, health, and digital infrastructure.**

The objective of this chapter is to provide a holistic perspective on island sustainability through an assessment of their SDG progress and actions. The chapter provides an overview of islands’ SDG progress and projections in the post-COVID-19 period through a systematic analysis of island states’ SDG Reports and their Voluntary National Reviews (VNRs) and SDG-

related country plans. Actions on islands that positively contribute to SDG progress are presented through island case studies; on renewable energy, the blue economy, and digitalization. The chapter concludes with suggestions on how islands can better achieve the SDGs, and lessons going forward in a post-COVID-19 era.

## METHODS

The methodology for this chapter employed a systematic analysis of island states’ SDG Reports, their VNRs, and SDG-related country plans which provided quantitative and qualitative data in order to put forward a holistic perspective on the SDGs and island sustainability. To track SDG progress and projections, two data sources were used: the *Online database for the Sustainable Development Report 2021* (Sachs et al., 2021) and 2020’s *Sustainable Development Report* (Sachs et al., 2020). The *Online database for the Sustainable Development Report 2021*, compiled by Sachs and colleagues (2021), provides overall results for all countries (not just islands) including index score, goal dashboard, and trend dashboard for all SDG indicators and goals. These data form the basis for preparing the annual *Sustainable Development Report* (Sachs et al., 2020), which gives an overview of how countries are progressing towards meeting each of the SDGs. The data come primarily from the World Bank, as well as “non-official sources” (Sachs et al., 2020, p. 23) at the country level such as research institutes and non-governmental organizations. To create the composite SDG score, each of the goals are weighed equally and the score signifies a country’s position between the worst (0) and the best (100) outcomes (Sachs et al., 2020). The goal dashboard classifies SDG progress under four-groups: *goal achievement*, *challenges remain*, *significant challenges*, and *major challenges*.

The trend dashboard gives the following categories: *on track or maintaining achievement*, *moderately increasing*, *stagnating*, and *decreasing*. A lack of data in island states hindered a full assessment of their progress. While the data provide an overview of the relative success of island states in meeting the SDGs, the data are not disaggregated by SNIJs. To consider island jurisdictions' progress on the SDGs, surveys of 782 individuals using a closed-ended questionnaire were undertaken between 2020 and 2021 in island states and SNIJs on their perception of the success of their governments in achieving the SDGs under the Sustainable Island Futures Project at the University of Prince Edward Island (UNESCO Chair in Island Studies and Sustainability, 2021). The surveys were carried out within the broader framework of a research project comparing small island states and semi-autonomous island jurisdictions under the aegis of the UNESCO Chair in Island Studies and Sustainability.

SDG themes, as well as actions on islands that positively contribute to achieving the SDGs, are presented using information from countries' VNRs and SDG-related national plans provided by island states in 2021 as they seek to re-build following the COVID-19 pandemic. From these plans, actions on renewable energy, the blue economy, and digitalization on islands that positively contribute to SDG progress are presented through island case studies, namely those of Antigua and Barbuda, Cabo Verde, Cyprus, Seychelles, Samoa, Solomon Islands, and Mauritius.

## TRACKING SDG PROGRESS

The SDG scores and rankings of all island states using data from the *SDG Report 2021* compiled by Sachs et al. (2021) are shown in Table 2.1. The report demonstrates wide heterogeneity in SDG progress among island states. Small island states in Europe, along with Japan and New Zealand, have high SDG scores and are highly ranked, while SIDS, particularly Madagascar, Papua New Guinea, and Haiti, have relatively lower scores and rank. Table 2.1 also reveals a lack of data in many jurisdictions, which hindered their SDG progress assessment.

Table 2.2 illustrates island states' SDG trend across the 17 Goals, again using data from the *SDG Report 2021* (Sachs et al., 2021). Generally, all islands have performed well and are making good progress on SDG 4 (*quality education*) and SDG 7 (*affordable and clean energy*). Performance on SDG 13 (*climate action*) has also been good, although in some cases (Bahrain and Singapore) there are high levels of domestic or imported CO<sub>2</sub> emissions. Islands face their biggest challenge in achieving SDG 1 (*no poverty*), SDG 2 (*zero hunger*), SDG 3 (*good health and well-being*), SDG 9 (*industry, innovation, and infrastructure*), SDG 14 (*life below water*), and SDG 15 (*life on land*), as their structural vulnerabilities affect their ability to achieve these goals (Sachs et al., 2021). Islands, particularly SIDS, have low scores under SDG 17 (*partnerships for the goals*) because of their data gaps, which makes it challenging to monitor. The top five

performing islands by SDG trend were the UK, Iceland, Malta, Japan, and New Zealand, while the bottom five were Haiti, Papua New Guinea, Madagascar, São Tomé and Príncipe, and Vanuatu.

The results of a survey of 782 individuals undertaken between 2020 and 2021 in island states and SNIJs and compiled by the UNESCO Chair in Island Studies and Sustainability (2021) are shown in Table 2.3. These results generally demonstrate that in ‘developed’ island states and SNIJs, such as Cyprus, Iceland, Prince Edward Island, and Newfoundland, there is a stronger perception of government success in achieving the SDGs compared to those participants responding from SIDS and developing subnational jurisdictions such as Grenada, St. Lucia, Tobago, and Lesvos.

**TABLE 2.1: Island States’ SDG Scores and Ranks**

| Continent      | Island State          | SDG Score | SDG Rank | Island Rank |
|----------------|-----------------------|-----------|----------|-------------|
| <b>Asia</b>    | Japan                 | 79.8      | 18       | 3           |
|                | Singapore             | 69.9      | 76       | 11          |
|                | Indonesia             | 66.3      | 97       | 19          |
|                | Timor-Leste*          | –         | –        | –           |
|                | Brunei Darussalam     | 68.3      | 84       | 15          |
|                | Philippines           | 64.5      | 103      | 21          |
|                | Sri Lanka             | 68.1      | 87       | 17          |
|                | Maldives              | 69.3      | 79       | 12          |
|                | Bahrain               | 66.1      | 100      | 20          |
| <b>Europe</b>  | Cyprus                | 74.9      | 40       | 7           |
|                | Iceland               | 78.2      | 29       | 5           |
|                | United Kingdom        | 81.0      | 13       | 1           |
|                | Ireland               | 80.0      | 17       | 2           |
|                | Malta                 | 75.7      | 33       | 6           |
| <b>Africa</b>  | Cabo Verde            | 68.1      | 86       | 16          |
|                | Madagascar            | 49.0      | 159      | 27          |
|                | Seychelles*           | –         | –        | –           |
|                | Mauritius             | 66.7      | 95       | 18          |
|                | Comoros*              | –         | –        | –           |
|                | São Tomé and Príncipe | 58.8      | 124      | 24          |
| <b>Oceania</b> | New Zealand           | 79.1      | 23       | 4           |
|                | Papua New Guinea      | 51.3      | 151      | 26          |
|                | Solomon Islands*      | –         | –        | –           |
|                | Vanuatu               | 60.5      | 119      | 23          |

**TABLE 2.1: Island States' SDG Scores and Ranks (cont'd)**

| Continent         | Island State                    | SDG Score | SDG Rank | Island Rank |
|-------------------|---------------------------------|-----------|----------|-------------|
|                   | Fiji                            | 71.2      | 62       | 9           |
|                   | Tonga*                          | –         | –        | –           |
|                   | Samoa*                          | –         | –        | –           |
|                   | Nauru*                          | –         | –        | –           |
|                   | Micronesia, Fed. States*        | –         | –        | –           |
|                   | Marshall Islands*               | –         | –        | –           |
|                   | Kiribati*                       | –         | –        | –           |
|                   | Tuvalu*                         | –         | –        | –           |
|                   | Palau*                          | –         | –        | –           |
|                   | Cook Islands+                   | –         | –        | –           |
|                   | Niue+                           | –         | –        | –           |
| <b>Caribbean/</b> | Cuba                            | 73.7      | 49       | 8           |
| <b>Americas</b>   | Haiti                           | 51.4      | 150      | 25          |
|                   | Dominican Republic              | 70.8      | 67       | 10          |
|                   | Jamaica                         | 69.0      | 81       | 13          |
|                   | Bahamas, The*                   | –         | –        | –           |
|                   | St. Kitts and Nevis*            | –         | –        | –           |
|                   | Antigua and Barbuda*            | –         | –        | –           |
|                   | St. Vincent and the Grenadines* | –         | –        | –           |
|                   | St. Lucia*                      | –         | –        | –           |
|                   | Grenada*                        | –         | –        | –           |
|                   | Barbados                        | 68.4      | 83       | 14          |
|                   | Trinidad and Tobago             | 63.5      | 108      | 22          |
|                   | Dominica*                       | –         | –        | –           |

NOTES: Island rankings were determined by the author.

\* Islands excluded from the 2021 SDG Index due to insufficient data.

+ Islands excluded from SDG Index 2021 report.

Source: Author's compilation based on Randall (2021) and data from Sachs et al. (2021).

TABLE 2.2: Island States' Sustainable Development Goal Trends

| Country                 | Sustainable Development Goal (SDG) Number |   |   |   |   |   |   |   |   |    |    |    |    |    |    |    |    |
|-------------------------|---|---|---|---|---|---|---|---|---|----|----|----|----|----|----|----|----|
|                         | 1   | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 |
| Antigua and Barbuda     | .   | → | ↗ | ↑ | ↗ | → | ↑ | ↑ | ↗ | .  | .  | .  | →  | →  | →  | .  | .  |
| Bahrain                 | .   | → | ↗ | ↑ | → | ↗ | ↑ | ↑ | ↗ | .  | ↓  | .  | ↗  | →  | ↓  | →  | .  |
| Bahamas, The            | .   | ↗ | ↗ | . | ↗ | ↑ | ↑ | ↗ | ↗ | .  | .  | .  | →  | →  | ↓  | ↑  | ↗  |
| Barbados                | →   | ↗ | ↗ | ↑ | ↗ | ↑ | ↑ | ↗ | → | .  | .  | .  | →  | →  | ↓  | ↗  | .  |
| Brunei Darussalam       | .   | → | ↗ | ↑ | ↗ | ↑ | ↗ | → | ↑ | .  | .  | .  | →  | →  | →  | ↗  | .  |
| Comoros                 | ↓   | → | → | ↓ | ↗ | → | ↗ | ↓ | → | .  | →  | .  | ↑  | →  | ↓  | →  | .  |
| Costa Rica              | ↗   | ↗ | ↗ | ↑ | ↑ | ↑ | ↑ | → | ↗ | .  | ↑  | .  | ↗  | →  | ↓  | ↗  | ↗  |
| Cuba                    | .   | ↗ | ↗ | ↗ | → | ↗ | ↑ | ↑ | ↗ | .  | ↗  | .  | ↑  | →  | →  | →  | .  |
| Cyprus                  | ↑   | → | ↗ | ↑ | ↗ | ↗ | ↗ | ↑ | ↗ | .  | ↗  | .  | →  | ↗  | ↗  | ↗  | →  |
| Dominica                | .   | → | . | ↓ | . | . | ↑ | . | ↗ | .  | .  | .  | ↑  | ↗  | ↓  | →  | ↑  |
| Dominican Republic      | ↑   | ↗ | ↗ | ↑ | ↑ | ↗ | ↗ | → | ↗ | .  | →  | .  | ↗  | ↗  | →  | →  | →  |
| Fiji                    | ↗   | ↗ | → | ↑ | → | ↗ | ↗ | ↑ | ↗ | .  | ↗  | .  | →  | ↗  | ↓  | .  | →  |
| Micronesia, Fed. States | .   | . | ↗ | ↑ | . | ↗ | ↗ | . | → | .  | .  | .  | ↑  | →  | ↓  | .  | ↗  |
| Gabon                   | →   | → | → | . | → | → | ↑ | ↗ | ↗ | .  | →  | .  | ↑  | →  | ↗  | ↓  | →  |
| Grenada                 | .   | → | ↗ | ↑ | ↑ | → | ↑ | . | ↑ | .  | →  | .  | →  | →  | ↓  | →  | ↓  |
| Haiti                   | ↓   | → | → | . | → | → | → | ↗ | ↗ | .  | →  | .  | ↑  | ↗  | →  | →  | →  |
| Iceland                 | ↑   | ↗ | ↑ | ↗ | → | ↗ | ↑ | ↗ | ↑ | ↑  | ↗  | .  | ↗  | →  | ↓  | ↑  | ↗  |
| Jamaica                 | ↓   | → | ↗ | ↓ | ↑ | ↗ | ↗ | ↑ | → | .  | →  | .  | →  | →  | ↓  | →  | ↗  |
| Japan                   | ↑   | ↗ | ↑ | ↑ | ↗ | ↑ | ↗ | ↑ | ↑ | .  | ↑  | .  | →  | →  | ↓  | ↑  | ↗  |
| Kiribati                | .   | → | ↗ | . | → | ↗ | ↗ | . | → | .  | .  | .  | ↑  | ↗  | .  | .  | ↗  |
| Madagascar              | ↓   | ↗ | → | ↓ | ↗ | → | → | ↗ | → | .  | ↗  | .  | ↑  | →  | ↓  | →  | ↗  |
| Maldives                | ↑   | ↗ | ↗ | ↑ | → | ↑ | ↑ | → | ↗ | .  | ↑  | .  | ↗  | ↗  | ↓  | ↑  | ↗  |
| Marshall Islands        | .   | ↓ | . | ↓ | ↓ | ↗ | ↗ | . | → | .  | .  | .  | .  | .  | .  | .  | ↗  |
| Malta                   | ↑   | ↗ | ↗ | ↑ | ↗ | ↗ | ↑ | ↑ | ↗ | .  | ↑  | .  | ↗  | ↗  | ↗  | →  | ↗  |
| Mauritius               | ↑   | → | ↗ | ↑ | ↗ | ↗ | ↗ | → | ↗ | .  | ↗  | .  | →  | →  | ↓  | →  | →  |
| Nauru                   | .   | → | . | ↑ | → | ↗ | ↑ | . | → | .  | ↗  | .  | →  | ↗  | .  | .  | .  |
| New Zealand             | ↑   | ↗ | ↗ | ↗ | ↑ | ↑ | ↑ | ↑ | ↗ | .  | ↗  | .  | ↗  | →  | ↓  | ↗  | ↗  |
| Philippines             | ↗   | ↗ | ↗ | ↓ | → | ↗ | → | ↗ | ↗ | .  | →  | .  | ↑  | →  | ↓  | →  | →  |
| Palau                   | .   | → | . | . | . | ↑ | ↑ | . | ↗ | .  | ↑  | .  | .  | ↗  | ↓  | .  | .  |
| Papua New Guinea        | ↓   | → | → | . | → | → | ↗ | ↑ | → | .  | →  | .  | ↑  | →  | ↓  | →  | ↗  |
| Singapore               | ↑   | ↗ | ↗ | ↑ | ↗ | ↗ | ↑ | ↗ | ↑ | .  | ↗  | .  | ↗  | →  | ↓  | ↗  | ↗  |
| Solomon Islands         | →   | → | ↗ | ↓ | → | ↓ | ↗ | . | → | .  | →  | .  | ↑  | →  | ↓  | →  | ↗  |
| São Tomé and Príncipe   | ↓   | → | ↗ | . | → | ↗ | → | → | → | .  | →  | .  | ↑  | ↗  | ↓  | →  | →  |



**TABLE 2.2: Island States’ Sustainable Development Goal Trends (cont’d)**

| Country                        | Sustainable Development Goal (SDG) Number |   |   |   |   |   |   |   |   |    |    |    |    |    |    |    |    |
|--------------------------------|---|---|---|---|---|---|---|---|---|----|----|----|----|----|----|----|----|
|                                | 1   | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 |
| Sri Lanka                      | ↑   | ↗ | ↗ | ↑ | → | ↗ | ↗ | ↗ | ↗ | .  | →  | .  | ↑  | →  | ↓  | →  | →  |
| Seychelles                     | .   | → | ↗ | ↑ | ↓ | → | ↑ | . | ↗ | .  | .  | .  | →  | ↗  | →  | ↑  | ↗  |
| St. Vincent and the Grenadines | .   | ↗ | ↗ | ↑ | ↗ | → | ↑ | ↓ | → | .  | .  | .  | ↓  | →  | ↓  | ↗  | ↗  |
| St. Kitts and Nevis            | .   | → | . | . | . | . | ↑ | . | ↗ | .  | .  | .  | →  | →  | ↗  | .  | .  |
| St. Lucia                      | ↗   | → | → | ↑ | ↗ | ↗ | ↑ | ↗ | ↗ | .  | ↗  | .  | ↑  | →  | ↓  | →  | ↓  |
| Samoa                          | ↗   | → | ↗ | ↑ | → | ↑ | ↗ | → | → | .  | ↗  | .  | ↑  | →  | →  | ↑  | →  |
| Togo                           | →   | → | → | ↗ | → | ↗ | → | ↑ | ↗ | .  | ↓  | .  | ↑  | ↗  | →  | →  | →  |
| Timor-Leste                    | ↓   | → | ↗ | ↑ | → | ↗ | ↗ | ↓ | → | .  | ↑  | .  | .  | ↗  | →  | ↑  | ↗  |
| Tonga                          | ↗   | → | ↗ | . | ↗ | ↗ | ↗ | . | → | .  | ↑  | .  | ↑  | →  | .  | ↑  | ↗  |
| Trinidad and Tobago            | ↑   | ↗ | ↗ | . | ↗ | ↗ | ↗ | ↗ | ↗ | .  | ↑  | .  | →  | ↓  | ↓  | →  | ↗  |
| Tuvalu                         | .   | → | . | ↓ | ↓ | → | ↗ | . | → | .  | ↑  | .  | ↑  | ↗  | .  | .  | .  |
| United Kingdom                 | ↗   | → | ↗ | ↗ | ↗ | ↗ | ↑ | ↗ | ↑ | ↓  | →  | .  | ↗  | ↗  | ↗  | ↗  | ↑  |
| Vietnam                        | ↑   | ↗ | ↗ | ↑ | ↗ | ↑ | ↑ | ↗ | ↗ | .  | ↑  | .  | →  | →  | ↓  | ↗  | →  |
| Vanuatu                        | ↓   | → | ↗ | . | → | ↗ | ↗ | ↑ | ↗ | .  | →  | .  | ↑  | →  | ↓  | ↑  | ↗  |

NOTES: ↑ On track or maintaining achievement  
 ↗ Moderately Increasing  
 → Stagnating  
 ↓ Decreasing;

A dot (.) indicates missing information.

Top five performing islands by SDG trend are shaded in orange; lowest five are shaded in grey.

Source: Author’s compilation based on data from Sachs et al. (2021).

**TABLE 2.3: Island Success in Achieving SDGs**

|                     | Sustainable Development Goal (SDG) Number |      |      |      |      |      |      |      |
|---------------------|---|------|------|------|------|------|------|------|
|                     | 1   | 2    | 3    | 4    | 5    | 6    | 7    | 8    |
| <b>Tobago</b>       | 4.44                                      | 4.5  | 4.53 | 3.93 | 4.2  | 4.21 | 4.77 | 4.82 |
| <b>Grenada</b>      | 4.51                                      | 4.23 | 4.51 | 4.09 | 3.7  | 3.66 | 4.61 | 4.74 |
| <b>PEI</b>          | 4.62                                      | 4.33 | 4.12 | 3.64 | 3.94 | 3.86 | 4.29 | 4.36 |
| <b>St. Lucia</b>    | 4.89                                      | 4.87 | 4.98 | 4.27 | 3.8  | 4.18 | 4.76 | 5.04 |
| <b>Lesvos</b>       | 5.46                                      | 5.27 | 5.21 | 4.64 | 4.71 | 4.67 | 5.26 | 5.17 |
| <b>Cyprus</b>       | 4.16                                      | 4.11 | 3.71 | 3.63 | 3.79 | 3.22 | 3.86 | 4.08 |
| <b>Newfoundland</b> | 4.28                                      | 4.5  | 4.08 | 3.75 | 3.8  | 4.27 | 4.58 | 4.99 |
| <b>Iceland</b>      | 4.41                                      | 3.76 | 3.24 | 2.88 | 2.65 | 2.71 | 2.63 | 3.65 |
| <b>La Réunion</b>   | 4.85                                      | 4.5  | 4.23 | 4.1  | 4.44 | 3.92 | 4.44 | 5.0  |
| <b>Mauritius</b>    | 3.82                                      | 3.86 | 3.64 | 4.0  | 4.36 | 4.11 | 4.32 | 4.27 |

**NOTES:** The higher the mean value, the less successful governments are perceived to be in achieving the SDGs.

'PEI' is Prince Edward Island.

Source: Survey data, Sustainable Island Futures Project, UNESCO Chair in Island Studies and Sustainability (2021).

**TABLE 2.3: Island Success in Achieving SDGs (cont'd)**

| Sustainable Development Goal (SDG) Number |      |      |      |      |      |      |      |      |             | Overall SDG Score |
|---|------|------|------|------|------|------|------|------|-------------|-------------------|
| 9   | 10   | 11   | 12   | 13   | 14   | 15   | 16   | 17   |             |                   |
| 4.73                                      | 5.09 | 4.61 | 5.0  | 4.68 | 4.52 | 4.36 | 4.86 | 4.65 | <b>4.58</b> |                   |
| 4.49                                      | 5.43 | 4.45 | 4.61 | 3.81 | 4.28 | 4.38 | 4.28 | 4.43 | <b>4.36</b> |                   |
| 4.48                                      | 5.73 | 4.17 | 4.92 | 4.67 | 4.66 | 4.79 | 4.31 | 5.57 | <b>4.5</b>  |                   |
| 4.89                                      | 5.09 | 5.0  | 4.64 | 4.5  | 4.41 | 4.42 | 4.83 | 4.85 | <b>4.67</b> |                   |
| 5.25                                      | 5.22 | 5.0  | 5.7  | 5.52 | 5.56 | 5.46 | 5.42 | 5.79 | <b>5.25</b> |                   |
| 3.62                                      | 4.32 | 4.0  | 4.22 | 4.24 | 4.03 | 4.38 | 4.22 | 4.11 | <b>3.98</b> |                   |
| 4.64                                      | 5.66 | 4.36 | 5.07 | 5.19 | 4.55 | 4.7  | 4.41 | 5.54 | <b>4.61</b> |                   |
| 3.65                                      | 4.2  | 4.1  | 4.44 | 4.39 | 3.73 | 4.14 | 3.47 | 4.2  | <b>3.66</b> |                   |
| 4.67                                      | 5.5  | 4.68 | 4.85 | 5.48 | 5.15 | 4.3  | 4.94 | 5.5  | <b>4.74</b> |                   |
| 4.05                                      | 4.57 | 4.34 | 4.68 | 4.66 | 4.7  | 4.63 | 4.45 | 4.41 | <b>4.29</b> |                   |

**PREVAILING SDG THEMES AND ACTIONS**

**Green energy transformation**

Green energy transformation is instrumental to the achievement of the SDGs. Access to affordable, reliable, and sustainable energy is essential to achieving almost all of the SDGs, including reducing poverty and inequality; improvements in education, health, housing, water, and industrialization; and adaptation and mitigation of climate change impacts. Green energy is directly linked to SDG 7 (*affordable and clean energy*), which focuses on access to affordable, reliable, sustainable, and modern energy for all, and closely linked to SDG 13 (*climate action*), which centres around urgent action to combat climate change and reduce greenhouse gas emissions. The literature details various ways in which SDG 7 and renewable energy are fundamentally tied to all other SDGs (McCollum et al., 2018; Nerini et al., 2018). Moreover, the adoption of green energy and energy efficiency can promote long-term socio-economic recovery from COVID-19 (Allen et al., 2021).

Island states and territories are still largely dependent on fossil fuels to meet their energy needs, although they tend to have high renewable energy resource potential relative to energy demand, particularly in solar and wind (Harrison & Popke, 2018; Surroop et al., 2018). Even before the COVID-19 pandemic, islands have shown a strong interest in introducing greener options for meeting their electricity demands (Harrison & Popke, 2018). Investment in renewable energy is seen as a means of diversifying energy supplies to mitigate risks associated with oil price changes given frequent oil price shocks (Dornan, 2015; Lucas et al., 2017). Islands have also been champions in submitting their Nationally Determined Contributions under the 2015 Paris Climate Agreement to combat climate change and reduce greenhouse gas emissions, and to strengthen their position in climate change negotiations (Fry, 2016). Sindico et al. (2020) suggest that the post-COVID-19 recovery debate must include island efforts to drive a green energy transformation.

**OVER THE LAST DECADE, islands have established some of the most ambitious renewable energy targets in the world.**

There are many barriers that prevent the use of large-scale renewable energy on islands, including a lack of data, need for policy and regulatory frameworks, scarcity of financial opportunities and costly infrastructure, lack of human resources and technical skills, lack of economies of scale, and socio-cultural impediments (Dornan, 2015; Lucas et al., 2017). On the other hand, renewable energy generation coupled with battery or pumped hydro energy storage makes renewable energy technically and

economically feasible in small islands (Vaiaso & Jack, 2021). Over the last decade, islands have established some of the most ambitious renewable energy targets in the world. For instance, Pacific SIDS aim to increase their share of renewable energy in their electricity sector by 60%–100% by 2030 but, given financial constraints, are largely dependent on financing from development partners (Dornan, 2015), which have been exacerbated by the pandemic.

There are successful examples of a green energy transition in small islands which can contribute to the attainment of the SDGs. To improve the performance and reliability of renewable energy as well as the sustainable and cost-effective utilization of indigenous renewable resources, Samoa constructed the Afolau 750 kW Biomass Gasi-fication Plant (Government of Samoa, 2020). The plant utilizes biomass resources such as local invasive trees to generate electricity. The use of locally available resources was deemed crucial given the uncertainty brought about by the COVID-19 pandemic. In December 2019, the Solomon Islands announced the Tina River Hydropower Project, a public–private partnership worth over US\$ 200 million financed through loans and grants. When the project is completed, the country will transition from a 3% share of renewable energy (hydro and solar in 2017) to 67% (Solomon Islands Government, 2020). The project will reduce the country’s reliance on imported diesel by 70%, and



When complete, the Tina River hydropower project in Solomon Islands will reduce the country's reliance on imported diesel by 70%, and transition its renewable energy from the current 3%, to 67%.

Photo: tuproyecto/Pixabay

will also reduce the country's greenhouse gas emissions by two and half times its national 2025 target (Solomon Islands Government, 2020). These renewable energy initiatives demonstrate action on achieving not only SDG 7 (*affordable and clean energy*), but also SDG 11 (*sustainable cities and communities*), SDG 12 (*responsible consumption and production*), and SDG 13 (*climate action*).

During the COVID-19 outbreak on the two-island country of Antigua and Barbuda, the nation was still recovering from 2017's Hurricane Irma. Irma completely wiped out Barbuda, following which it adopted a 'green island concept' to build resilience against external shocks (such as the COVID-19 pandemic) by increasing energy and food security, and attracting tourists. The Antigua and Barbuda Government intends to build an 800 kW solar and 800 kWh Lithium-ion Battery storage plant on the island that is hurricane-resilient, climate-resilient, safe, reliable, and sustainable. The plant is expected to save the country over US\$ 320,000 per year through the reduction in oil imports, and to offset 690 tonnes of carbon dioxide annually (Government of Antigua and Barbuda, 2021). The program requires significant funding, which will be drawn from the Barbuda Recovery Fund, private investors, bilateral assistance, development partners, and donor agencies. Antigua and Barbuda's green island concept supports the attainment of SDG 7 (*affordable and clean energy*), SDG 11 (*sustainable cities and communities*), SDG 12 (*responsible consumption and production*), and SDG 13 (*climate action*).



In 2016, Antigua installed this 3-MW ground-mounted solar power plant project at its newly constructed V.C. Bird International Airport. This was Antigua's first major infrastructure project to utilize renewable technology.

Source: 2021 Voluntary National Review of Antigua + Barbuda

Cyprus is actively seeking to encourage the growth of its green economy over the period 2021–2030 by increasing its renewable energy mix, energy efficiency, and electro-mobility infrastructure, and by promoting the circular economy (Republic of Cyprus, 2021). The country will be investing €1.2 billion to promote projects, actions, and reforms that contribute to reducing the impacts of climate change and greenhouse gas emissions. The country is ending its energy isolation through the EuroAsia Interconnector. This is a cross-border interconnector between Cretan, Cypriot, and Israeli power grids via a subsea direct current cable with High-Voltage Direct Current onshore converter stations at each connection point, and highlights the importance of partnerships and cooperation. The case of renewable energy in Cyprus, while directly supporting SDG 7 (*affordable and clean energy*), also supports SDG 11 (*sustainable cities and communities*), SDG 12 (*responsible consumption and production*), SDG 13 (*climate action*), and SDG 17 (*partnerships for the goals*).

### **The blue economy**

The World Bank (2017) defines the ‘blue economy’ as the sustainable use of ocean resources for economic growth, improved livelihoods, and jobs while preserving the health of the ocean ecosystem. The ocean can support countries in creating improved conditions for sustainable development, and the blue economy highlights balancing the economic, social, and environmental dimensions of sustainable development in relation to oceans (Griggs et al., 2013). This balance is, however, not easily achievable given that the conditions of the oceans have deteriorated because of human and industrial activities and conflicting goals, including pollution, unsustainable fishing, and biological degradation (Lee et al., 2020). The blue economy is specifically recognized by the SDGs in Goal 14 (*life below water*), which sets a target that, by 2030, economic benefits will be increased from the sustainable use of marine resources, including through sustainable management of fisheries, aquaculture, and tourism

(Griggs et al., 2013; Spalding, 2016). However, sustainable development of the oceans would have wider sustainable development effects and hence contribute to the achievement of all 17 SDGs (Lee et al., 2020; Ocean University Initiative, 2021).

Islands' ocean resources — that is, their Exclusive Economic Zones — are on average more than 2,000 times the size of their land masses, and ocean-based sectors such as tourism and fisheries are already important economic activities (World Bank, 2017). While COVID-19 has halted ocean-based activities globally, demand continues to be driven by a growing population and need for energy, food, and jobs — and islands can take advantage of this opportunity (Organisation for Economic Co-operation and Development [OECD], 2021). Islands have vast untapped reserves of fish stocks, marine algae, and micro-organisms which have biotechnological applications and pharmaceutical uses. To develop these resources, international cooperation, technology, and capacity building, and innovative financing approaches such as blue bonds, debt swaps, and debt restructuring are important (OECD, 2021). Moreover, overfishing, ocean pollution, and climate change threaten the development of marine resources (Hadjimichael, 2018). Small islands also lack the infrastructure and capacities for maritime security and coastal protection which are essential for establishing a blue economy (Childs & Hicks, 2019). Nevertheless, there are cases of extensive development of the blue economy in islands.

Mauritius and Seychelles achieved global recognition for championing the blue economy. Mauritius made the blue economy a pillar of its sustainable development strategy with the aim of doubling its contribution to GDP by 2025. To accomplish this, it created an 'Ocean Economy Roadmap' (Government of Mauritius, 2013) to make use of untapped ocean resources in tourism, seaports, and fishing while building capacity in aquaculture, marine biotechnology, and renewable energy. The country set up a Ministry of Blue Economy, Marine Resources, Fisheries, and Shipping with the authority to coordinate and manage ocean-related activities. It also established a Coordinating Committee to bring together relevant stakeholders and technical working groups, which focus on aligning blue economy development with the SDGs. Seychelles, through its *Blue Economy Strategic Policy Framework and Roadmap (2018-2030)*, implemented the 'Blue Economy Framework' and a 'Marine Spatial Plan' to encourage sustainable and inclusive use of its ocean (Republic of Seychelles, 2020; Senaratne, 2020). The Seychelles *Roadmap* demonstrates how countries can bring national development thinking in line with the SDGs. The country also sold the world's first sovereign blue bond — “debt for dolphins” — valued at US\$ 15 million (Republic of Seychelles, 2020). The Republic recognizes that there is need for stakeholder engagement in the development of the sector, and the private sector and civil society

**MAURITIUS AND SEYCHELLES achieved global recognition for championing the blue economy. Mauritius made the blue economy a pillar of its sustainable development strategy with the aim of doubling its contribution to GDP by 2025.**

provide marine education and marine conservation activities to tourists and residents. Development of the blue economy in both Mauritius and Seychelles shows the interplay between SDG 14 (*life below water*) and other goals, including SDG 8 (*decent work and economic growth*), SDG 9 (*industry, innovation, and infrastructure*), and SDG 12 (*responsible consumption and production*).

SIDS acknowledge the importance of building research and technical capacity for the development of marine resources. In an aim to develop the blue economy in the Caribbean, it was announced in November 2020 that a Centre of Excellence for Oceanography and the Blue Economy would be established as a collaboration between the Government of Antigua and Barbuda and the University of the West Indies (Government of Antigua and Barbuda, 2021). The Centre aims to advance intellectual progress and build institutional and technical capacity in marine science and the blue economy, and to identify economic opportunities for Caribbean SIDS (Government of Antigua and Barbuda, 2021), which can enable positive action around SDG 4 (*quality education*), SDG 8 (*decent work and economic growth*), SDG 9 (*industry, innovation, and infrastructure*), and SDG 14 (*life below water*).

### **Digital transformation**

Digital transformation is a process that can be harnessed for equitable and sustainable development, and is defined by the Organisation for Economic Co-operation and Development (OECD; 2019, p. 18) as “the economic and societal effects of digitization and digitalization.” While SDG 4 (*quality education*), SDG 5 (*gender equality*), SDG 9 (*industry, innovation, and infrastructure*), and SDG 17 (*partnerships for the goals*) include information and communications technology (ICT) related goals and targets, digital transformation can be a powerful and cross-cutting tool that can accelerate progress towards all SDGs (Castro et al., 2021; International Telecommunication Union [ITU], 2019). COVID-19 has accelerated the uptake of digital solutions and sped up the digital transformation. The use of digital technology has helped governments, businesses, and people manage pandemic responses, and to cope with the immediate effects of social distancing and other containment measures through remote working and online schooling (Vargo et al., 2020). There are, however, instances where poor and vulnerable groups without digital devices and persons that are not familiar with technology can be excluded from this process (Masiero, 2020; Vargo et al., 2020).

Island states and territories have relatively good access to internet connectivity. It is estimated that mobile broadband coverage reaches 90% of the population in SIDS, and the average price of a mobile data package is 5% of per capita income (ITU, 2019). Further, disruptive and transformative technologies such as artificial intelligence, blockchains, drones, and mobile money are being used to enhance sustainable development (Singh et al., 2020) – however, their application in SIDS is limited, given tech-



nical, financial, and human resource constraints (ITU, 2019). Nevertheless, there are prominent examples where islands have adopted widespread use of digital technology for sustainable development.

Cyprus is establishing a long-term strategy in its recovery from COVID-19 with a strong focus on digitalization in its *Long-Term Economic Strategy and National Digital Strategy* (Republic of Cyprus, 2021). The pandemic accelerated the digitalization of public and private sectors and led to new electronic services, and the country will leverage these developments and utilize its strong and growing ICT sector to expand value-added and innovation in services such as consulting, engineering, shipping, tertiary education, and health (Republic of Cyprus, 2021). The country established the Deputy Ministry of Research, Innovation and Digital Policy to boost its digital transformation. Other initiatives include the ‘Smart City Strategy’ which involves smart parking, smart lighting, and smart waste collection management solutions, and the ‘e-Skills Action Plan’, which is a set of reforms and initiatives aimed at enhancing the digital skills of the current and future workforce and the general population. Digital transformation in Cyprus contributes to the achievement of several goals, namely SDG 3 (*good health and well-being*), SDG 4 (*quality education*), SDG 5 (*gender equality*), SDG 8 (*decent work and economic growth*), SDG 9 (*industry, innovation, and infrastructure*), SDG 10 (*reduced inequalities*), and SDG 11 (*sustainable cities and communities*).

Antigua and Barbuda has a high mobile-cellular penetration rate with low pricing compared to other countries worldwide, resulting in a high share of the population using the internet. Prior to COVID-19, internet access was provided in all schools and there was a drive to implement the curriculum in a digitized format (Government of Antigua and Barbuda, 2021). The country also provided devices for secondary school students and teachers in need, and introduced eBooks and computers in the secondary schools (Government of Antigua and Barbuda, 2021). This program proved useful when the pandemic struck, as it meant that disruptions to schooling were minimal, and has also been beneficial in terms of SDG 4 (*quality education*), SDG 5 (*gender equality*), and SDG 10 (*reduced inequalities*).

Islands enjoy strategic geopolitical positions giving them an advantage in connecting to fibre-optic submarine cables, thereby increasing their digital connectivity and revenue earnings. Cabo Verde was connected to the Atlantis-2 fibre-optic submarine cable in 2000, the West African Cable Systems in 2012, and, most recently, the EllaLink cable in 2021 (Governo de Cabo Verde, 2021). In another example, the Coral Sea Cable System is a 4,700 km long fibre optic submarine cable system linking Sydney, Australia

**CYPRUS IS ESTABLISHING a long-term strategy in its recovery from COVID-19 with a strong focus on digitalization . . . Initiatives include the ‘Smart City Strategy’ which involves smart parking, smart lighting, and smart waste collection management solutions, and the ‘e-Skills Action Plan’.**

to Port Moresby, Papua New Guinea and Honiara, Solomon Islands. While the Government of Australia is the primary partner, Papua New Guinea and Solomon Islands jointly contributed up to one third of project costs and will hold majority ownership of the international cable and receive all revenue generated (Solomon Islands Government, 2020), which helps directly with SDG 8 (*decent work and economic growth*) and SDG 9 (*industry, innovation, and infrastructure*).



The *Ile de Brehat* laying the Coral Sea Cable System, a 4,700-km long fibre optic submarine cable system that links Sydney, Australia to Port Moresby, Papua New Guinea and Honiara, Solomon Islands.  
DAFT / Sydney Morning Herald

## DISCUSSION OF THE FUTURE OF ISLAND SDG ACTIONS

Island states and territories have fully committed to the SDGs, which are even viewed by some as a roadmap for post-pandemic recovery. The 2030 Agenda should, however, not be treated as a stand-alone strategy, but rather should be fully owned and integrated into national plans and strategies, adapted to the local context, and coordinated sufficiently across all sectors (Allen et al., 2021; Griggs et al., 2013). A goal-based development approach which involves starting from the quantified deadline goal and designing a realistic pathway to achieve it through key interventions, costing and financing plans, and the implementation strategy may prove useful (Sachs, 2015). Furthermore, there is need for leadership at the highest level to shape national debates and support local post-pandemic recovery strategies aligned with the SDGs, and to engage subnational levels of government, especially in SNIJs, and to align priorities and promote coordinated action at different levels of government (Mukarram, 2020).

The biggest challenge in propelling action around green energy, blue growth, and digital technology in islands for advancing the SDGs is financing (Dornan, 2015; Lucas

et al., 2017; OECD, 2021). In island states, there is high public debt and low economic growth accompanied by low domestic resource mobilization from public and private sources, and climate finance and development assistance fall short of what is required (OECD, 2021). Islands should make policy reforms aimed at improving the investment climate to attract private investment and development assistance, and reform their tax systems to increase domestic revenues. A resource mobilization strategy is important to connect the private sector, development partners, and philanthropists.

Islands also need to build technical capacity to implement actions around green and blue growth and digitization and digitalization. This involves strengthening human resource knowledge and skills as well as data collection and research and development around renewable energy, circular economy, sustainable use of marine resources, coastal protection, and digital access and solutions. It is important to involve universities and other research institutes as well as Central Statistical Offices in such initiatives.

There is also a need to engage stakeholders, including the private sector and civil society, to ensure that different voices are heard and that everyone works together to identify challenges, set priorities, align actions, and mobilize resources around renewable energy, blue economy, and digital technology. The private sector has the potential to play a critical role in providing funding, innovation, training, and skills (Scheyvens et al., 2016). Much more work needs to be done to bring private players onboard to prioritize actions around the SDGs. Civil society also has a unique role in the implementation of sustainable development on account of their expertise, experience, and extensive presence in communities (Pardo, 2018).

**THE BIGGEST CHALLENGE**  
**in propelling action around**  
**green energy, blue growth, and**  
**digital technology in islands for**  
**advancing the SDGs is financing**  
**. . . climate finance and develop-**  
**ment assistance fall short of**  
**what is required.**

## CONCLUSION

This chapter provides a holistic perspective on island states' sustainability through an assessment of their SDG progress and actions in green energy, blue economy, and digital technology based on a systematic analysis of their SDG Reports, surveys, VNRs, and SDG-related country plans. Despite their structural vulnerabilities and the difficult environment created by COVID-19, island states and territories have made progress in the achievement of the SDGs, especially around SDG 4 (*quality education*) and SDG 7 (*affordable and clean energy*), and, to a lesser extent, SDG 13 (*climate action*). Greater attention and action around SDG 1 (*no poverty*), SDG 2 (*zero hunger*), SDG 3 (*good health and well-being*), SDG 9 (*industry, innovation, and infrastructure*), SDG 14 (*life below water*), SDG 15 (*life on land*), and SDG 17 (*partnerships for the goals*) are required. Notably, there are significant differences in progress made by 'developed' island states compared to SIDS. Moreover, large data limitations in SIDS prevent proper assessment of SDG progress. Examples of islands such as Antigua and Barbuda, Cyprus, Cabo Verde, Samoa, and Solomon Islands making progress in green energy, blue economy, and digital transformation suggest huge potential in these areas to achieve the SDGs. Although there is no one-size-fits-all formula, islands do share some common features, and advancing on closer interactions with the SDGs and country development plans, deepening financing, improved stakeholder engagement, and building capacity could help in their collective achievement of the SDGs in the post-COVID-19 era.

## REFERENCES

- Allen, C., Metternicht, G., Wiedmann, T., & Pedercini, M. (2021). Modelling national transformations to achieve the SDGs within planetary boundaries in small island developing states. *Global Sustainability*, 4(15), 1–13.
- Baldacchino, G. (2007). *A world of islands: An island studies reader*. Agenda Publishers & Institute of Island Studies.
- Baldacchino, G. (2006). Innovative development strategies from non-sovereign island jurisdictions? A global review of economic policy and governance practices. *World Development*, 34(5), 852–867.
- Castro, G. D., Fernández, M. C. G., & Colsa, A. U. (2021). Unleashing the convergence amid digitalization and sustainability towards pursuing the Sustainable Development Goals (SDGs): A holistic review. *Journal of Cleaner Production*, 280(1), 122204.
- Childs, J., & Hicks, C. C. (2019). Securing the blue: Political ecologies of the blue economy in Africa. *Journal of Political Ecology*, 26(1), 323–340.
- Connell, J. (2013). *Islands at risk? Environments, economies and contemporary change*. Edward Elgar.
- Dornan, M. (2015). Renewable energy development in small island developing states of the Pacific. *Resources*, 4(3), 490–506.
- Fry, I. (2016). The Paris Agreement: An insider’s perspective – The role of Small Island Developing States. *Environmental Policy and Law*, 46(2), 105–108.
- Governo de Cabo Verde. (2021). *Voluntary National Review on the implementation of the 2030 Agenda for Sustainable Development*. [https://sustainabledevelopment.un.org/content/documents/282392021\\_VNR\\_Report\\_Cabo\\_Verde.pdf](https://sustainabledevelopment.un.org/content/documents/282392021_VNR_Report_Cabo_Verde.pdf)
- Government of Antigua and Barbuda. (2021). *2021 Voluntary National Review of Antigua and Barbuda: “Building forward stronger”*. [https://sustainabledevelopment.un.org/content/documents/279502021\\_VNR\\_Report\\_Antigua\\_and\\_Barbuda.pdf](https://sustainabledevelopment.un.org/content/documents/279502021_VNR_Report_Antigua_and_Barbuda.pdf)
- Government of Mauritius. (2013). *The Ocean Economy: A Roadmap for Mauritius*. Prime Minister’s Office, Government of Mauritius.
- Government of Samoa. (2020). *Second Voluntary National Review on the implementation of the Sustainable Development Goals to ensure “improved quality of life for all”*. [https://sustainabledevelopment.un.org/content/documents/26429Samoa\\_Samos2ndVNR2020reduced.pdf](https://sustainabledevelopment.un.org/content/documents/26429Samoa_Samos2ndVNR2020reduced.pdf)
- Griggs, D., Stafford-Smith, M., Gaffney, O., Rockström, J., Öhman, M. C., Shyamsundar, P., Steffan, W., Glasser, G., Kanie, N., & Noble, I. (2013). Sustainable Development Goals for people and planet. *Nature*, 495(3), 305–307.
- Hadjimichael, M. (2018). A call for a blue degrowth: Unravelling the European Union’s fisheries and maritime policies. *Marine Policy*, 94(8), 158–164.
- Harrison, C., & Popke, J. (2018). Geographies of renewable energy transition in the Caribbean: Reshaping the island energy metabolism. *Energy Research & Social Science*, 36(2), 165–174.
- International Monetary Fund. (2020). *World Economic Outlook database: October 2020*, International Monetary Fund. <https://www.imf.org/en/Publications/WEO/weo-database/2020/October/download-entiredatabase>
- International Telecommunication Union. (2019). *Small island developing states and ICTs mid-term review of the SAMOA Pathway*. <http://handle.itu.int/11.1002/pub/813cee7c-en>
- Lee, K., Noh, J., & Khim, J. S. (2020). The blue economy and the United Nations’ Sustainable

- Development Goals: Challenges and opportunities. *Environment International*, 137(4), 105528. <http://doi.org/10.1016/j.envint.2020.105528>
- Lucas, H., Fifita, S., Talab, I., Marschel, C., & Cabeza, L. F. (2017). Critical challenges and capacity building needs for renewable energy deployment in Pacific Small Island Developing States. *Renewable Energy*, 107(7), 42–52.
- Masiero, S. (2020). COVID-19: What does it mean for digital social protection? *Big Data & Society*. <http://doi.org/10.1177/2053951720978995>
- McCollum, D. L., Echeverri, L. G., Busch, S., Pachauri, S., Parkinson, S., Rogelj, J., Krey, V., Minx, J. C., Nilsson, M., Stevance, A., & Riahi, K. (2018). Connecting the Sustainable Development Goals by their energy inter-linkages. *Environmental Research Letter*, 13(3), 033006–033029.
- McElroy, J. L., & Pearce, K. B. (2006). The advantages of political affiliation: Dependent and independent small-island profiles. *The Round Table*, 95(386), 529–539.
- Mukarram, M. (2020). Impact of COVID-19 on the United Nations Sustainable Development Goals (SDGs). *Strategic Analysis*, 44(3), 253–258.
- Nerini, F. F., Tomei, J., To, L. S., Bisaga, I., Parikh, P., Black, M., Borrion, A., Spataru, C., Broto, V. C., Anandarajah, G., Milligan, B., & Mulugetta, Y. (2018). Mapping synergies and trade-offs between energy and the Sustainable Development Goals. *Nature Energy*, 3, 10–15.
- Ocean University Initiative. (2021). *Ocean and coasts at the core of the Sustainable Development Goals*. <https://ocean-univ.org/2019/03/27/ocean-and-coasts-at-the-core-of-sustainable-development-goals/?lang=en>
- Organisation for Economic Co-operation and Development. (2021). *COVID-19 pandemic: Towards a blue recovery in small island developing states*. OECD Publishing. <https://doi.org/10.1787/5b0fd8cd-en>
- Organisation for Economic Co-operation and Development. (2019). *Going digital: Shaping policies, improving lives*. OECD Publishing. <https://doi.org/10.1787/9789264312012-en>
- Pinedo Pardo, C. (2018). Proactive civil society to achieve Sustainable Development Goals. *European Journal of Sustainable Development*, 7(4), 63. <http://doi.org/10.14207/ejsd.2018.v7n4p63>
- Randall, J. E. (Ed.). (2021). *The 21st Century Maritime Silk Road. Islands Economic Cooperation Forum: Annual report on global islands 2020*. Foreign Affairs Office of Hainan Province, P.R. China, & Island Studies Press. <https://projects.upei.ca/unescochair/publications/annual-report-on-global-islands/annual-report-on-global-islands-2020/>
- Republic of Cyprus. (2021). *Republic of Cyprus second Voluntary National Review of the Sustainable Development Goals*. [https://sustainabledevelopment.un.org/content/documents/282512021\\_VNR\\_Report\\_Cyprus.pdf](https://sustainabledevelopment.un.org/content/documents/282512021_VNR_Report_Cyprus.pdf)
- Republic of Seychelles. (2020). *Voluntary National Review 2020*. [https://sustainabledevelopment.un.org/content/documents/26382VNR\\_2020\\_Seychelles\\_Report.pdf](https://sustainabledevelopment.un.org/content/documents/26382VNR_2020_Seychelles_Report.pdf)
- Sachs, J. (2015). Goal-based development and the Sustainable Development Goals: Implications for development finance. *Oxford Review of Economic Policy*, 31(3–4), 268–278.
- Sachs, J., Kroll, C., Lafortune, G., Fuller, G., & Woelm, F. (2021). *Sustainable development report 2021: The decade of action for the Sustainable Development Goals*. Cambridge University Press.
- Sachs, J., Schmidt-Traub, G., & Lafortune, G. (2020). *Speaking truth to power about the Sustainable Development Goals* [Working paper]. United Nations Sustainable Development Solutions Network (SDSN).

- Scheyvens, R., Banks, G., & Hughes, E. (2016). The private sector and the Sustainable Development Goals: The need to move beyond 'business as usual'. *Sustainable Development*, 24, 371–382. <http://doi.org/10.1002/sd.1623>
- Senaratne, M. (2020). *The blue economy: Charting a new development path in the Seychelles* [ORF Occasional Paper 265]. Observer Research Foundation.
- Sindico, F., Sajeve, G., Sharman, N., Berlouis, P., & Ellsmoor, J. (2020). *Islands and COVID-19: A global survey*. Strathclyde Centre for Environmental Law and Governance and Island Innovation.
- Saurabh, S., Sharma, P. K., Yoon, B., Shojafar, M., Cho, G. H., & Ra, I. (2020). Convergence of blockchain and artificial intelligence in IoT network for the sustainable smart city. *Sustainable Cities and Society*, 63, 102364. <http://doi.org/10.1016/j.scs.2020.102364>
- Solomon Islands Government. (2020). *Solomon Islands Voluntary National Review*. [https://sustainabledevelopment.un.org/content/documents/26795VNR\\_2020\\_Solomon\\_Report.pdf](https://sustainabledevelopment.un.org/content/documents/26795VNR_2020_Solomon_Report.pdf)
- Spalding, M. (2016). The new blue economy: The future of sustainability. *Journal of Ocean and Coastal Economics*, 2(2), 8–29.
- Stuart, K. (2009). A listing of the world's populated subnational island jurisdictions. In G. Baldacchino & D. Milne (Eds.), *The case for non-sovereignty: Lessons from sub-national island jurisdictions* (pp. 11–20). Routledge.
- Surroop, D., Raghoo, P., & Bundhoo, Z. M. A. (2018). Comparison of energy systems in Small Island Developing States. *Utilities Policy*, 54(C), 46–54.
- UNESCO Chair in Island Studies and Sustainability. (2021). Sustainable island futures. <https://projects.upei.ca/unescochair/sustainable-island-futures/>
- United Nations. (2015). *Transforming our world: The 2030 agenda for sustainable development*. <https://sdgs.un.org/publications/transforming-our-world-2030-agenda-sustainable-development-17981>
- United Nations Department of Economic and Social Affairs. (2020). *The COVID-19 pandemic puts small island developing economies in dire straits*. United Nations Department of Economic and Social Affairs. <https://www.un.org/development/desa/dpad/publication/un-desa-policy-brief-64-the-covid-19-pandemic-puts-small-island-developing-economies-in-dire-straits>
- Vaiaso, T. V., & Jack, M. W. (2021). Quantifying the trade-off between percentage of renewable supply and affordability in Pacific island countries: Case study of Samoa. *Renewable and Sustainable Energy Reviews*, 150(1), 111468.
- Vargo, D., Zhu, L., Benwell, B., & Yan, Z. (2020). Digital technology use during COVID-19 pandemic: A rapid review. *Human Behaviour and Emerging Technology*, 3, 13–24.
- World Bank. (2017). *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*. World Bank & United Nations Department of Economic and Social Affairs. <http://hdl.handle.net/10986/26843>
- Zaballos, A. G., Iglesias, E., & Adamowicz, A. (2019). *The impact of digital infrastructure on the Sustainable Development Goals: A study for selected Latin American and Caribbean countries*. Inter-American Development Bank.