



Natural World Heritage in Oceania

Progress and prospects

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Executive summary

This report assesses the implementation of the UNESCO World Heritage (WH) Convention¹ in Oceania in relation to natural and mixed WH sites. The report is structured into seven chapters.

Chapter 1: Introduction

This chapter provides background to the report including project objectives, target audiences and scope. Report preparation has been guided by a number of principles, including the need for full and open consultation with all stakeholders and the development of clear, concise and practical recommendations to improve the application of the WH Convention in the Pacific region as it relates to natural WH sites. The report is based on the collection and analysis of relevant data, stakeholder interviews, expert consultation and literature review.

The report outlines information on the WH Convention which provides for the identification and protection of the most outstanding natural and cultural areas on the planet, referred to as sites of “*Outstanding Universal Value*” (OUV). WH sites are thus sites having international significance, rather than sites which are important regionally or nationally. Processes associated with the WH Convention² are lengthy and expensive, thus making the nomination of new WH sites in the Pacific very challenging, without external support.

There are 6 natural and mixed WH sites within the 23 Pacific Island Countries and Territories (PICTs): (1) East Rennell, Solomon Islands; (2) Phoenix Islands Protected Area (PIPA), Kiribati; (3) Rock Islands Southern Lagoon, Palau (mixed WH site); (4) Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems, France (New Caledonia); (5) Henderson Island, United Kingdom of Great Britain and Northern Ireland; and (6) Te Henua Enata – The Marquesas Islands, France (French Polynesia). The WH Convention, and natural WH sites, make a significant contribution to biodiversity conservation and sustainable development, globally and in the Pacific. However, the report notes that the potential of natural WH sites, and the WH Convention in general, is yet to be realized in the Pacific region.

Although some natural WH sites are recognised specifically for their biodiversity values, there are significant opportunities for reinforcing the linkages between biodiversity conservation, cultural values and sustainable use in all WH properties. Nature and culture are inextricably linked in the Pacific, with the majority of land and in-shore water resources under customary ownership by local communities. Some cultural WH sites in the region have important natural values, and many natural WH sites have high cultural significance. There is great potential for strengthening linkages between nature and culture in WH sites in the Pacific.

Natural WH sites, if planned and managed effectively and appropriately, make a significant contribution to the sustainable development of local communities and national economies, including through tourism. This is particularly relevant in the Pacific region where a key factor of success, or lack of success, for natural WH sites, is whether the site can and does contribute to the sustainable development of local economies. For example, part of the success of the Rock Islands Southern Lagoon WH site in Palau is that tourism associated with the site has made a tangible contribution to local communities, and to the national economy, including through the “Green Fee”.

Chapter 2: Oceania’s global significance for natural and cultural heritage conservation

This chapter provides an overview of the Pacific region, which is divided into three main sub-regions: Micronesia, Melanesia and Polynesia. The report covers 23 PICTs in the Pacific region, which is dominated by the Pacific Ocean, the largest ocean on the planet, covering a quarter of the earth’s surface.

The Pacific region is characterized by a wide range of biogeographical and geomorphological features, ranging from large, mountainous islands, predominately in Melanesia and Timor-Leste, to smaller volcanic high islands and extensive atolls in Polynesia and Micronesia, and raised coralline limestone islands, such as Henderson, Nauru and Niue. The region features unique and varied ecosystems and has a considerable climatic range, from tropical to sub-tropical and temperate climates and even glacial on some summits in New Guinea. The major feature of the Pacific is the Pacific Ocean, and the vast open ocean areas and pelagic ecosystems are a defining feature of the Pacific environment. Coral reefs are a significant feature of Oceania, particularly in Melanesia and Timor-Leste.

¹ Convention Concerning the Protection of the World Cultural and Natural Heritage.

² These include site identification, preparation of nomination documents, evaluation, inscription, and site management.

The Pacific region is characterized by high levels of biodiversity and species endemism, and extreme vulnerability to external impacts, such as climate change, natural disasters, and plastic pollution. A feature of Pacific biodiversity is a general reduction in species diversity from west to east in the region. The Pacific region has globally significant areas for biodiversity. For example, the western edge of Oceania, including New Guinea, Solomon Islands and Timor-Leste, within the Coral Triangle region, is broadly considered the centre of highest marine biodiversity on the planet.

The human discovery and settlement of islands in the Pacific occurred over thousands of years, from the early settlement of Papua New Guinea 46,000 years ago to the more recent occupation of islands in Polynesia. The discovery and colonization of the Pacific Islands is recognised as one of the greatest feats of human endeavour. Pacific peoples evolved with the environment over thousands of years and the region features a diversity of cultures, languages and traditional practices, most focussed on the environment. Many traditional practices were developed to manage and protect important areas or species, including through closure of areas on a permanent or temporary basis to ensure sustainable use of resources. Customary conservation methods are still practiced today in many Pacific countries, such as Ra’ui in the Cook Islands and in French Polynesia.

The majority of Pacific inshore land and sea resources are owned by local communities in the Pacific, there is very little State-owned land or inshore waters. This underlines the importance of traditional approaches to resource conservation and also the importance of working with and through local communities, Indigenous peoples and traditional owners, in developing any new conservation or sustainable development programmes in the Pacific. There are a number of examples of “home grown” community conservation initiatives, such as Locally Managed Marine Areas (LMMAs) where marine conservation efforts are largely or wholly led by local coastal communities, with the support of governments and partners.

Pacific Island ecosystems and species are highly vulnerable to impacts such as climate change, habitat destruction and invasive species, which have resulted in significant impacts to the flora and fauna of this region. PICTs are at the front line of impacts from climate change. Despite accounting for only 0.03% of the world’s total greenhouse gas emissions the countries and territories of the Pacific region are among the most vulnerable on earth to climate change impacts. Pacific Island leaders have consistently noted climate change as being the most important threat to the people and environments of the region.

There are a range of other threats to the Pacific environment, including habitat loss, particularly associated with activities such as logging and mining, and marine pollution, including from marine debris and plastic waste, increasingly recognized as a major threat to nature and people in the Pacific region.

PICTs have responded to these and other environmental threats and have taken a number of actions to improve the management of their environments and to address the loss of biodiversity in particular. These actions have been at international, regional and national levels and are documented in Section 3.4 of this report. A number of Pacific Island Countries are signatories to international environmental Conventions and Agreements. These, and their relevance to environmental management and natural WH in the Pacific, are also outlined in Chapter 2.

Chapter 3: Taking Stock: Overview of natural World Heritage sites and their conservation status

This Chapter outlines relevant details for natural, cultural and mixed WH sites, as well as the status of State Party ratification of the WH Convention, for the 23 PICTs covered under this project (refer Table 3). WH sites in the wider Pacific region, outside the 23 focus PICTs are also described in this section (refer Figure 3).

This chapter analyses existing WH sites, makes a number of observations regarding WH in the Pacific region, and concludes that the Pacific region is very poorly represented on the WH List. Despite this current poor representation on the WH List, there are areas within the region which potentially could meet the criteria of “Outstanding Universal Value” under the WH Convention. The report suggests that greater attention to WH in the Pacific region is warranted, at global, regional and national levels.

Many of the 23 PICTs do not have any WH sites. Two of the five natural and mixed sites are large and protect important marine values (PIPA and Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems). They were amongst the largest WH sites in the world at the time of inscription on the WH List. The majority of cultural WH sites are small and protect sites of significant cultural value for Pacific peoples and communities. Several existing cultural WH sites in the Pacific region have important natural values. Tentative Lists for WH sites have been prepared for the majority of the States and Territories of the Pacific region. Section 3.2 describes strategic issues for each natural and mixed WH site in the region³. This section concludes with an analysis of issues at these sites and suggests implications for natural WH in the Pacific region, including the need for increased investment in Pacific Island WH sites if they are to be viable and to succeed.

3 With the exception of Te Henua Enata – The Marquesas Islands, which was inscribed in 2024.

The institutional framework for WH and heritage conservation at regional, national and local levels is outlined in this chapter covering current institutional capacities, key gaps and capacity development needs. Governance structures for WH are outlined at the: (a) global level, including the UNESCO WH Convention, and IUCN; (b) regional level, including the UNESCO Regional Office, Pacific Regional CROP Agencies, the Pacific Heritage Hub (PHH) and Non-Governmental Organisations (NGOs); and (c) national level, including Pacific Island National Government Agencies involved in natural and mixed WH, and local communities.

The chapter concludes that while WH sites have been inscribed throughout the Pacific region (a greater number of cultural than natural properties), many countries and territories in the region remain without any inscribed WH sites. Better linkages need to be developed between natural and cultural WH in the Pacific region. In relation to the number of WH sites, the Oceania region is poorly represented on the WH List, by comparison to other regions of the world. Despite this poor representation on the WH List there are natural areas within the region that potentially could meet the criteria of Outstanding Universal Value under the WH Convention.

Chapter 4: Challenges and opportunities for natural World Heritage in the Pacific

This chapter is structured in two parts: (a) an outline and analysis of key challenges and opportunities for natural and mixed WH in the Pacific region; and (b) a Strength, Weakness, Opportunities, and Threats (SWOT) analysis regarding natural and mixed WH in the Pacific region. The chapter is based on interviews with, and written input from, State Parties, natural and mixed WH site managers and natural WH experts, as well as information from a range of sources including the IUCN WH Outlook. The three groups consulted all identified similar issues, as outlined below, although there were some differing areas of emphasis: (a) State Parties emphasized the need for effective governance structures and resources for WH; (b) managers of WH sites prioritized practical site management issues such as problems of access to remote areas and how to effectively engage with local communities; and (c) WH experts placed emphasis on rigorous science in helping to define the areas with the greatest future potential as natural and mixed WH sites.

Key challenges and opportunities for natural and mixed WH in the Pacific region are detailed in Section 4.1 under the following headings: (a) Awareness and understanding (Section 4.1.1); (b) Gaps in coverage (Section 4.1.2); (c) Inadequate funding (Section 4.1.3); (d) Engagement of local communities and national governments (Section 4.1.4); (e) Capacity (Section 4.1.5); (f) Nature and culture linkages (Section 4.1.6); (g) Coordination and partnership (Section 4.1.7); (h) Leadership (Section 4.1.8); and (i) Broader context (Section 4.1.9)

Some elements of the Strengths, Weaknesses, Opportunities, and Threats (SWOT) analysis of natural and mixed WH in the Pacific region in Section 4.2 include:

- **Strengths:** (a) WH is a recognized global label, which can support efforts to raise funding for heritage management; (b) WH provides an unparalleled opportunity to showcase the unique nature and culture of the Pacific region at a global stage; (c) WH provides opportunities for sustainable development for national governments and local communities, including through sustainable tourism; and (d) WH provides a framework for capacity building in heritage conservation, which is particularly important given the limited capacity for natural and mixed WH in most PICTs.
- **Weaknesses:** (a) Unrealistic expectations about WH have posed significant problems for natural and mixed WH sites in the Pacific, particularly regarding what is required after WH inscription and what benefits WH will deliver to local communities; (b) Limited funding and resources for all phases of WH, including nomination and management. (c) There is a low level of interest and awareness about WH in most PICTs, certainly by comparison with other Conventions regarding biodiversity (CBD) and climate (UNFCCC); (d) There is a poor linkage between nature and culture in relation to the WH Convention in the Pacific; (e) There has been no effective representation from the region on the WH Committee since 2007.
- **Opportunities:** (a) WH provides opportunities for raising the profile of particular sites and issues in the Pacific at global, regional and national levels. WH is a globally recognized brand which could enhance and support heritage conservation throughout the region; (b) WH can be a source of considerable national and local pride in that these sites are those recognized as being of international importance and significance; (c) There are opportunities for increased funding for PICTs and WH sites, including through tourism, however this will need to be approached in a more strategic manner than has been to date.
- **Threats:** (a) Most natural WH sites face significant direct and indirect threats, as detailed in Section 2.5 of the report, including climate change, invasive species and overuse of marine resources; (b) Resource developments such as logging and mining are a threat to existing and potential natural WH sites in the Pacific; (c) Lack of interest in WH and a perceived lack of tangible benefits arising from WH may contribute to limited progress for the WH Convention in the Pacific region.

Chapter 5: Looking ahead: Overview of possible priorities for new natural World Heritage sites

This chapter reviews possible priorities for new natural WH sites in the Pacific region. It introduces WH Tentative Lists which are an inventory of those properties which WH States Parties consider have potential to be inscribed on the WH List. The development of a Tentative List is a prerequisite to nomination of sites by States Parties to the WH Convention. First introduced in 2010, and integrated as a part of the nomination process by the World Heritage Committee in 2015, the Upstream Process has also enabled the Advisory Bodies and the UNESCO World Heritage Centre (the Secretariat of the Convention) to provide advance support to States Parties in the form of advice, consultation and analysis. Table 8 outlines the status of natural and mixed Tentative List sites in the 23 PICTs as of July 2024.

While most Pacific countries have prepared Tentative Lists, most of these are out of date, in large part reflecting a general lack of capacity within Pacific countries for heritage management. There have been some exercises to revise Tentative Lists, and these were noted as relevant and useful exercises which enhanced communication and cooperation for WH. However, preparation of Tentative Lists requires time and funding which is beyond the resources of most PICTs, and more external support is required.

Several experts were consulted for this project and asked to suggest areas which may have potential as natural and mixed WH. The responses are outlined in Table 9. It is noted that only some of these sites are on the Tentative Lists of PICTs. Potential priority WH sites are outlined in section 5.3, derived from relevant international and regional assessments of WH and a summary of WH thematic studies. Table 10 provides a summary of key gaps and possible priorities for natural WH in the Oceania region considering a number of assessment systems that can be used to identify global conservation priorities.

A number of priority areas in the wider Pacific region have also been identified in previous WH studies and analyses, including in previous Pacific World Heritage Action Plans for 2010–2015 and 2016–2020. IUCN, as the Advisory Body on natural WH, has also prepared several thematic studies which provide useful guidance in relation to potential WH sites. This chapter presents possible priority areas in the Pacific region: (a) Table 11 provides an overview of “priority areas” in the wider Pacific that may warrant consideration as potential natural and/or mixed WH sites according to these studies and analyses; (b) Table 12 shows the overlap of natural and mixed Tentative List sites in the wider Pacific region (as of May 2024) with global conservation priorities and broad gaps; (c) Table 13 outlines the overlap of potential WH candidate sites suggested during the consultations (and which are not yet included on the Tentative Lists of State Parties) with global conservation priorities and broad gaps.

Sites that are likely to possess a high potential as natural WH sites in the Pacific Region are listed in Section 5.4. This section is based on priorities for potential natural WH sites identified through PICTs Tentative Lists (Section 5.2), through expert assessments (Section 5.2), and various conservation priority assessment systems (Section 5.3). Several sites are mentioned in both the majority of assessments and the Tentative Lists and can therefore be considered as high priority sites with potential for meeting the natural criteria of OUV under the WH Convention. These sites have been identified on the basis of the following criteria: (a) recognition of biodiversity importance within biodiversity and other classification systems; (b) an assessment of the relative possibility of nomination within the short to mid-term; and (c) the level of integrity issues which may potentially affect the future success of the nomination.

Table 14 outlines high potential natural and mixed WH sites in the Pacific Region. Table 15 outlines high potential natural and mixed serial/transnational WH sites in the Pacific Region. Sites in Tables 14 and 15 may have high potential as future natural and mixed WH sites. However, further work would be required to clarify and refine boundaries and address integrity issues should State Parties wish to proceed with the nomination of any of these sites to the WH List. The moderating reality that counters these assessments is the very limited resources, capacity and funding that exist in PICTs, and that nomination processes are lengthy and challenging. External resources are essential.

Chapter 6: Towards more effective implementation of Natural World Heritage in the Pacific

This chapter outlines the key actions required for the more effective implementation of the WH Convention in the Pacific region, in relation to natural and mixed WH sites. A number of detailed recommendations are included throughout this chapter. The following eleven key actions are identified and elaborated:

- Several important natural areas within the Pacific region may have potential as WH and these should be considered by PICT State Parties (Section 6.1).
- WH Tentative Lists should be revised and updated (Section 6.2).
- The awareness of natural and mixed WH in the Pacific region needs to be increased (Section 6.3).
- Substantial additional funding is required by PICT State Parties if the WH Convention is to succeed in the Pacific region (Section 6.4).
- Local communities need to be more effectively involved if natural and mixed WH is to succeed in the Pacific region (Section 6.5).

- World Heritage must deliver tangible benefits for local communities and expectations about WH must be realistic and clearly communicated, at all stages of the WH process (Section 6.6).
- Capacity for natural and mixed WH in the Pacific needs to be developed and strengthened at all levels (Section 6.7).
- There needs to be better linkages between natural and cultural WH in the Pacific region (Section 6.8).
- Better coordination and partnership for natural and mixed WH is required at all levels in the Pacific region (Section 6.9).
- Leadership is important and should be encouraged for natural and mixed WH to succeed (Section 6.10).
- Natural and mixed WH needs to be considered in a broader context in the Pacific region (Section 6.11).

Chapter 7: Conclusions and recommendations

Natural and mixed WH has generally not been a success in the Oceania region, due to limited support at all levels, unrealistic expectations about what WH can and cannot deliver, and a lack of resources to support all aspects of the WH process, particularly WH site management.

By comparison to other regions of the world, the Oceania region is very poorly represented on the WH List and is an area where much greater attention is required and warranted, at global, regional and national levels. Despite this poor representation on the WH List there are clearly several areas within the region, both marine and terrestrial, which potentially could meet the criteria of OUV for natural WH under the WH Convention and a number of potential WH sites are outlined in Chapter 5 of this report.

There must be a significant increase in resources for WH in the region for the WH Convention to be effective. Without substantial additional resources natural and mixed WH is unlikely to succeed in the region. Increased support is required from donors and partners, UNESCO and IUCN.

This report outlines recommendations which will, if applied, contribute to the more effective implementation of natural WH in the Pacific region. Priorities for each recommendation are assessed and outlined in Section 7.2 of the report. This report recommends the oversight of implementation of recommendations rest with UNESCO World Heritage Centre, the UNESCO Pacific Office and the IUCN Oceania Regional Office, in close consultation with SPREP and the Pacific Heritage Hub. It is further recommended that UNESCO and IUCN prepare an Implementation Plan for these recommendations and that the level of achievement of the implementation plan be assessed by these organisations on a biennial basis.

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4 Listed in alphabetic order

Abbreviations and acronyms

ACP	African, Caribbean and Pacific countries
AIMS	Australian Institute of Marine Science
ASEAN	Association of Southeast Asian Nations
AZE	Alliance for Zero Extinction
BI	BirdLife International
BIOPAMA	Biodiversity and Protected Areas Management Programme
BLG	Biodiversity Liaison Group
BR	Biosphere Reserve
CBD	Convention on Biological Diversity
CEN	Conservatoire d'Espaces Naturels, New Caledonia
CEPF	Critical Ecosystem Partnership Fund
CI	Conservation International
CITES	Convention on International Trade in Endangered Species of Wild Fauna and Flora
CMS	Convention on the Conservation of Migratory Species of Wild Animals
COP	Conference of the Parties
CROP	Council of Regional Organisations of the Pacific
CT	Coral Triangle
CTI	Coral Triangle Initiative
DSOC	Desired State of Conservation (for WH sites)
EBA	Endemic Bird Area (of BirdLife International)
EBSA	Ecologically or Biologically Significant Marine Area
EEZ	Exclusive Economic Zone
EOH	Enhancing our Heritage Toolkit 2.0
EPA	Environment Protection Authority
ER	East Rennell (WH Site)
FAD	Fish Aggregation Device
FAO	Food and Agriculture Organization of the United Nations
FP	French Polynesia
FPIC	Free, Prior and Informed Consent (of Indigenous peoples and local communities)
FSM	Federated States of Micronesia
GCF	Green Climate Fund
GEF	Global Environment Facility
HA	Hectare
HBWAs	High Biodiversity Wilderness Areas
IBA	Important Bird and Biodiversity Area
ICCROM	International Centre for the Study of the Preservation and Restoration of Cultural Property
ICOMOS	International Council on Monuments and Sites
ICH	Intangible Cultural Heritage
IDL	International Date Line
IMMA	Important Marine Mammal Area
IUCN	International Union for Conservation of Nature
JRC	Joint Research Centre (of the European Commission)
KBA	Key Biodiversity Area
LMMAs	Locally Managed Marine Areas
MACBIO	Marine and Coastal Biodiversity Management Programme (in PICTSs)
MEA	Multilateral Environmental Agreement
MoU	Memorandum of Understanding
MHWM	Mean High Water Mark
MPA	Marine Protected Area

MSG	Melanesian Spearhead Group
NBSAP	National Biodiversity Strategies and Action Plans (of CBD)
NC	New Caledonia
NGO	Non-Government Organisation
NHT	Natural Heritage Trust (of the Cook Islands)
NZ	New Zealand
ORO	Oceania Regional Office of IUCN
OUV	Outstanding Universal Value (regarding the WH Convention)
PA	Protected Area
PACC	Pacific Adaptation to Climate Change Programme (of SPREP)
PHH	Pacific Heritage Hub
PICs	Pacific Island Countries
PICTs	Pacific Island Countries and Territories
PILN	Pacific Invasive Learning Network
PIP	Pacific Invasives Partnership
PIPA	Phoenix Islands Protected Area (in Kiribati; a WH site)
PIRT	Pacific Islands Roundtable for Nature Conservation and Protected Areas
PNA	Parties to the Nauru Agreement
PNG	Papua New Guinea
POWPA	Programme of Work on Protected Areas (of CBD)
PRISMSS	Pacific Regional Invasive Species Management Support Service
RISL	Rock Islands Southern Lagoon (WH Site)
RRF	Rapid Response Facility (of the UNESCO WH Centre)
SCBD	Secretariat of the Convention on Biological Diversity
SD	Sustainable Development
SDG	Sustainable Development Goal (of the UN)
SIDS	Small Island Developing States
SOC	State of Conservation
SOE	State of the Environment
SPC	Secretariat of the Pacific Community
SPREP	Secretariat of the Pacific Regional Environment Programme
SUMA	Special and/or Unique Marine Areas Programme
TL	Tentative List (regarding the WH Convention)
TNC	The Nature Conservancy
UK	United Kingdom
UN	United Nations
UNEP	United Nations Environment Programme
UNEP-WCMC	United Nations Environment Programme World Conservation Monitoring Centre
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNFCCC	United Nations Framework Convention on Climate Change
USA	United States of America
USP	University of the South Pacific
W&F	Wallis and Futuna
WCPA	World Commission on Protected Areas (of IUCN)
WCPFC	Western and Central Pacific Fisheries Commission
WCS	Wildlife Conservation Society
WH	World Heritage
WHT	World Heritage Team of IUCN
WHAP	WH Action Plan for the Pacific
WHC	WH Convention
WH OGs	WH Operational Guidelines
WWF	World Wild Fund for Nature

Introduction

1



Forested Limestone Islands of the Rock Islands Southern Lagoon, Palau © Stuart Chape

1.1 Background

1.1.1 Objectives of the report

This report assesses the implementation of the United Nations Educational, Scientific and Cultural Organization (UNESCO) World Heritage (WH) Convention⁵ in Oceania in relation to natural and mixed World Heritage (WH) sites. The specific objectives⁶ of this project were to:

- i. Conduct an independent expert review of progress, challenges and prospects of the WH Convention in Oceania, focused on natural and mixed WH Sites.
- ii. Synthesize the key findings into a report which will cover:
 - Oceania's global significance for natural and cultural heritage conservation.
 - Challenges and opportunities for WH in the region.
 - Taking stock: overview of existing natural sites and their conservation status.
 - Looking ahead: overview of possible priorities for nominations and extensions.
 - How to make this happen: overview of current capacities and capacity needs.

This project was conducted through the Biodiversity and Protected Areas Management (BIOPAMA) Programme⁷, which is an initiative of the Organisation of African, Caribbean and Pacific States (OACPS) financed by the European Union's 11th European Development Fund. The project team consisted of persons from the European Commission's Joint Research Centre (JRC)⁸, International Union for the Conservation of Nature (IUCN⁹) and the Secretariat of the Pacific Regional Environment Programme (SPREP)¹⁰.

1.1.2 Target audience for this report

The key target audience for the report are the Pacific Island Countries and Territories (PICTs)¹¹, including those that are State Parties to the UNESCO WH Convention. For the purposes of this report, Timor-Leste is included within the term PICTs. Other target groups will include:

- Donors;
- National and sub national authorities and agencies responsible for nature conservation;
- Regional development and planning agencies and organizations, relevant to the integration of WH planning with sustainable development;
- Local communities;
- NGOs; and
- Other relevant partners.

1.1.3 Scope of study: countries and territories covered by this report

Twenty-three (23) Pacific Island Countries and Territories (PICTs)¹² in Oceania are the focus of this report (Figure 1)¹³. These 23 PICTs are: American Samoa, Cook Islands, Federated States of Micronesia, Fiji, French Polynesia, Guam, Kiribati, Marshall Islands, Nauru, New Caledonia, Niue, Northern Mariana Islands, Palau, Papua New Guinea, Pitcairn Islands, Samoa, Solomon Islands, Timor-Leste, Tokelau, Tonga, Tuvalu, Vanuatu, and the Wallis and Futuna Islands. Fifteen (15) of these countries and territories are State Parties to

5 More information on the UNESCO WH Convention at: <https://whc.unesco.org/en/convention/>.

6 From the Report's Terms of Reference (ToR).

7 The Biodiversity and Protected Areas Management (BIOPAMA) Programme assists African, Caribbean and Pacific (ACP) countries to address their priorities for improved management and governance of biodiversity and natural resources. BIOPAMA provides a variety of tools, services and funding to conservation actors in the ACP countries. More information at: <https://biopama.org/>.

8 More information at: https://ec.europa.eu/info/departments/joint-research-centre_en.

9 IUCN involvement on the report team is through the IUCN World Heritage Team (WHT) <https://www.iucn.org/our-work/topic/world-heritage> and the IUCN Oceania Regional Office (ORO) <https://www.iucn.org/regions/oceania/about/our-team-oceania>.

10 More information at: <https://www.sprep.org/>.

11 Timor-Leste is included in this report as a PICTs as it is a member of several Pacific regional organisations, such as the Secretariat of the Pacific Community (SPC), and also due to the similarity of issues faced by Timor-Leste and the Small Island Developing States of the Pacific.

12 Pacific Territories are associated with one of the following Partner countries: France, US, UK, Australia and New Zealand. An example is American Samoa which is a territory of the US.

13 These are the same 23 countries/territories covered by the complementary State of Protected and Conserved Areas Report produced by the BIOPAMA Programme.

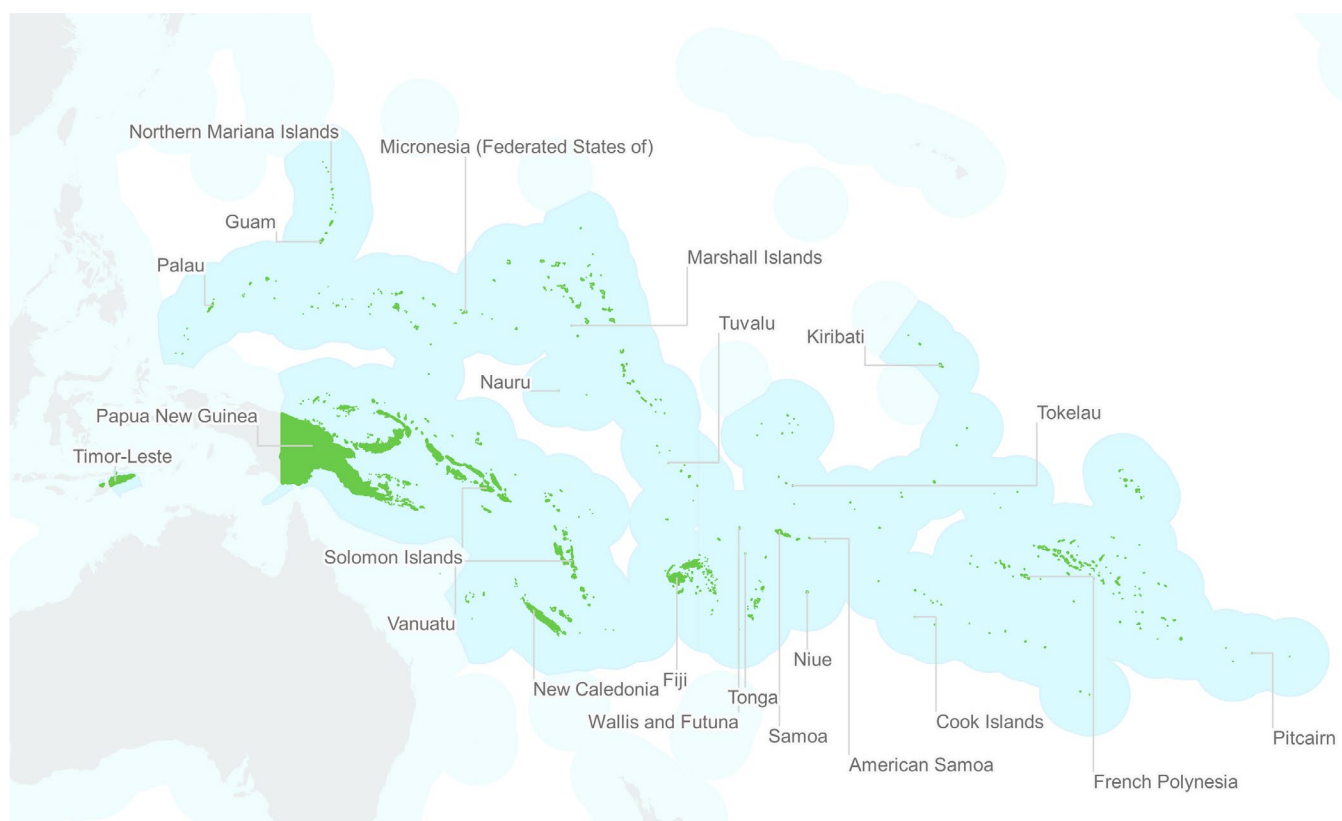


Figure 1. Map of the 23 Pacific Island Countries and Territories (PICTs) covered by this report with boundaries of their Exclusive Economic Zone (EEZ) area. The land and sea areas of the 23 PICTs are shaded in green and blue, respectively, and the study area is collectively referred to as Oceania. Produced by Luca Battistella

the UNESCO WH Convention¹⁴. The study area of the 23 PICTs is collectively referred to as ‘Oceania’ in this report. It is noted that this report also draws on examples of natural and mixed World Heritage from countries outside the boundaries of the 23 focus PICTs. These provide examples of, and issues from, natural and mixed WH on islands in the ‘wider Pacific’ region (including Australia, New Zealand, the Hawaii Islands, etc.) which are relevant to this report.

1.1.4 Key principles which have guided this report

Preparation of this report has been guided by the following principles:

- Open, full and comprehensive consultation with PICTs and other key stakeholders involved in natural WH.
- Working closely with PICTs and other stakeholders to identify key issues and challenges and practical recommendations to address them.
- Working closely with potential partners and donors with an interest in supporting the future implementation of the World Heritage (WH) Convention in the Pacific Region.
- Development of clear, concise and practical recommendations which will aim to improve the application of the WH Convention in the Pacific region as it relates to natural WH sites.
- Close linkage and coordination with other similar and related exercises of relevance to this project, including the development of the UNESCO Pacific Regional WH Action Plan 2021–2025 (WH Action Plan)¹⁵ and the report *“Conserving our sea of islands: The state of protected areas in Oceania”*¹⁶.

¹⁴ Cook Islands, Federated States of Micronesia, Fiji, Kiribati, Marshall Islands, Nauru, Niue, Palau, Papua New Guinea, Samoa, Solomon Islands, Timor-Leste, Tonga, Tuvalu, Vanuatu.

¹⁵ The “Review of World Heritage Priorities in the Pacific Region 2021–2025” was intended to inform UNESCO in its Report on the 3rd Cycle of Periodic Reporting for the Asia Pacific Region, and to inform the subsequent development of the next World Heritage Action Plan for the Asia Pacific Region presented to the 45th session of the World Heritage Committee.

¹⁶ Reference: van Nimwegen et al. (2022).

1.1.5 Approach taken in this report

This report is based on the collection and analysis of relevant data, including through interviews, according to the principle of consulting as widely as possible with key stakeholders, as well as a review of relevant literature. A number of interviews were carried out jointly with consultants working on the “*Review of World Heritage Priorities in the Pacific Region 2021–2025*”¹⁷. Data collection for this project involved:

- **Interviews:** Interviews were undertaken with: (a) representatives of PICTs, including Parties and non-Parties to the WH Convention; (b) WH site managers; (c) senior staff from the key project partners: IUCN, SPREP and JRC; and (d) other key stakeholders.
- **Expert consultation:** Many WH regional experts provided their views on possible natural WH sites in the Pacific region and also on key issues and challenges facing WH in the region.
- **Literature review:** An assessment of literature relevant to the project was undertaken, with key issues arising from this assessment included in this report.

The list of all agencies and organisations interviewed and/or consulted for this report¹⁸, including those who responded, are detailed in Annex A. The summary of the consultation strategy is outlined in Table 1 below.

Table 1. Summary of consultation strategy for this report

Agency/Organisation consulted	Aims and process of consultation
PICT State Parties to the WHC: PICTs representatives of countries which are State Parties to the WH Convention. Ten (10) PICT State Parties were either interviewed or provided written responses to questions for this project	Aims: (1) to identify PICT State Party views on and experience with WH including key challenges and issues; (2) to seek views as to how the WH Convention could be more effectively implemented; and (3) to identify views on possible future sites within their country. Process: involved an interview with a representative(s) of each country/territory with tailored questions addressing each of the above aims. Some PICTs provided written responses to the listed questions.
PICTs which are not States Parties to the WHC: PICTs representatives of Pacific Island countries which are not State Parties to the WH Convention. Three (3) non WH State Parties PICTs were either interviewed or provided written responses to questions for this project:	Aims: to identify PICT non-State Party views on the WH Convention and specifically to: (1) identify whether they may be considering joining the WH Convention in the future; and (2) whether they consider there are sites within their country/territory which may have the potential for being inscribed on the WH List. Process: involved an interview with a representative(s) of each country/territory with tailored questions to address each of the above aims.
WH site managers: covering managers of WH sites in the Pacific region. Written responses were received from the site managers of 4 WH sites in the region.	Aims: To identify the views of WH site managers regarding: (1) the key challenges and issues facing the WH site they are responsible for; (2) their views on potential future WH sites in their country and within the Pacific region; and (3) their general views on the application of WH Convention in the Pacific region. Process: involved a request for written feedback on questions addressing each of the above aims.
Experts in WH in the Pacific region: requests for advice and input were sent to more than 50 WH experts covering the fields of marine biodiversity, terrestrial biodiversity and geology. Written responses were received from representatives of 21 agencies/organisations. Written responses were also received from 18 WH experts who were not affiliated with an organisation.	Aims: to identify expert views on: (1) potential additional WH sites in the Pacific region; (2) key issues and challenges facing WH in the Pacific region; and (3) opportunities for increasing support and funding for WH in the Pacific region Process: involved a request for written feedback on questions addressing each of the above aims.

¹⁷ The full title of this report is: “Weaving Nature with Culture: Review of World Heritage Priorities in the Pacific Region - to inform and guide the Pacific Regional World Heritage Action Plan 2021-2025”.

¹⁸ The names of persons consulted are not included in this report for privacy reasons, the summary table in Annex A lists the agencies consulted and those which were either interviewed and/or provided written responses.

1.1.6 Structure of the report

This report is structured under six chapters:

- Oceania's global significance for natural and cultural heritage conservation (Chapter 2).
- Taking stock: Overview of existing natural WH sites and their conservation status (Chapter 3).
- Challenges and opportunities for natural WH in the Pacific (Chapter 4).
- Looking ahead: Overview of possible priorities for new natural WH sites (Chapter 5).
- Towards more effective implementation of WH in the Pacific (Chapter 6).
- Conclusions and recommendations (Chapter 7).

1.2 Context

1.2.1 About the WH Convention and natural WH sites

The Convention Concerning the Protection of the World Cultural and Natural Heritage^{19, 20} provides for the identification and protection of the most outstanding natural and cultural areas on the planet, referred to as sites of “*Outstanding Universal Value*” (OUV). As defined in the Operational Guidelines for the Implementation of the World Heritage Convention^{21, 22} “*Outstanding Universal Value means cultural and/or natural significance which is so exceptional as to transcend national boundaries and to be of common importance for present and future generations of all humanity*”²³. These are sites which are so important that their protection is not only the responsibility of a single nation, but also the duty of the international community. Further information on the Convention, and its application to natural WH sites is outlined in Box 1.

The inscription of natural and mixed sites on the WH List follows a clear and rigorous process, outlined in the WH Operational Guidelines (OGs). Natural WH sites must meet the criteria of “*Outstanding Universal Value*” as set out in Sections 77-78 of the WH OGs, which notes nominated properties shall meet one of four criteria. To be inscribed on the WH List, sites must also meet the conditions of integrity, as set out in Sections 87-95 of the WH OGs, and in particular must have adequate protection and management. Further information is outlined in Box 1.

The process of site identification, preparation of the nomination document, evaluation, inscription, and then management is a lengthy and expensive process, thus making the nomination of new WH sites in the Pacific very challenging or nearly impossible without external support, due to the limited financial and human resources available for PICTs. It is important to note that WH designation does not come with any automatic funding source or external support to the country, although there often can be an expectation that this is the case.

19 Full Convention Text at: <https://whc.unesco.org/en/conventiontext/>.

20 Hereafter in this report referred to as the WH Convention.

21 Hereafter in this report referred to as the WH Operational Guidelines (OGs).

22 The WH Operational Guidelines are outlined at: <https://whc.unesco.org/en/guidelines/>.

23 Paragraph 49 of the WH Operational Guidelines.

Box 1. Additional information on the WH Convention and natural WH sites

The WH Convention, adopted in 1972, has become one of the most important global conservation instruments. The primary mission of the Convention is to identify and conserve the world's natural and cultural heritage sites considered to be of “Outstanding Universal Value”, sites so important that their protection is not only the responsibility of a single nation, but also the duty of the international community. WH sites are inscribed under one of four natural criteria and six cultural criteria. As of October 2024, there are 952 Cultural WH sites, 231 Natural sites and 40 Mixed (natural and cultural) sites.

The Convention sets out the role of States Parties in identifying potential sites and in protecting and preserving them. By signing the Convention, each country pledges to conserve not only the WH sites situated on its territory, but also to protect its national heritage. The Convention provides for a WH Fund to support States Parties on WH activities and set out how it is to be used and managed.

To date, 271 of the world's most remarkable protected and conserved areas have been inscribed as natural or mixed sites on the UNESCO WH List. The Convention is governed by the WH Committee with support by the UNESCO WH Centre, the Convention Secretariat, and three technical advisory bodies. The advisory body on natural heritage is IUCN whose role includes evaluating new nominations to the WH List, monitoring the conservation status of existing WH sites, and assisting with the implementation of the WH Global Strategy. The [WH Operational Guidelines \(OGs\)](#) provide the core guiding framework for the practical implementation of the Convention, including all details relating to the nomination, inscription and management of WH sites.

Natural WH sites must meet the criteria of “Outstanding Universal Value” as set out in Sections 77-78 of the WH OGs, which notes nominated properties shall:

- a) contain superlative natural phenomena or areas of exceptional natural beauty and aesthetic importance (criteria vii);
- b) be outstanding examples representing major stages of earth's history, including the record of life, significant on-going geological processes in the development of landforms, or significant geomorphic or physiographic features (criteria viii);
- c) be outstanding examples representing significant ongoing ecological and biological processes in the evolution and development of terrestrial, fresh water, coastal and marine ecosystems and communities of plants and animals (criteria ix); and
- d) contain the most important and significant natural habitats for in-situ conservation of biological diversity, including those containing threatened species of OUV from the point of view of science or conservation (criteria x).

To be inscribed on the WH List, sites must also meet the conditions of integrity, including protection and management, as set out in Sections 87-95 of the WH OGs. For natural WH sites, examining the conditions of integrity (Section 88) requires assessing the extent to which the property:

- a) includes all elements necessary to express its Outstanding Universal Value;
- b) is of adequate size to ensure the complete representation of the features and processes which convey the property's significance; and
- c) suffers from adverse effects of development and/or neglect.

In addition, there is a corresponding condition of integrity for each natural criterion: criteria vii (Section 92 of the OGs); criteria viii (Section 93 of the OGs); criteria ix (Section 94 of the OGs); and criteria x (Section 95 of the OGs).

Source: The WH Operational Guidelines (OGs) — <https://whc.unesco.org/en/guidelines/>

This report assesses the application of the WH Convention in the Pacific, in relation to natural and mixed WH sites. Considerable detail is outlined in Section 3 of this report and is not repeated in this section. Most Pacific countries are States Parties to the WH Convention. The following natural and mixed Pacific WH sites are currently inscribed on the UNESCO WH List.

Within the 23 focus PICTs of this report

- East Rennell, Solomon Islands²⁴.
- Phoenix Islands Protected Area, Kiribati²⁵.
- Rock Islands Southern Lagoon, Palau²⁶ (mixed WH site²⁷).
- Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems, France (New Caledonia)²⁸.
- Te Henua Enata – The Marquesas Islands²⁹.

24 World Heritage site page: <https://whc.unesco.org/en/list/854>.

25 World Heritage site page: <https://whc.unesco.org/en/list/1325>.

26 World Heritage site page: <https://whc.unesco.org/en/list/1386>.

27 Mixed sites are inscribed under both natural and cultural WH criteria.

28 World Heritage site page: <https://whc.unesco.org/en/list/1115>.

29 World Heritage site page: <https://whc.unesco.org/en/list/1707/>

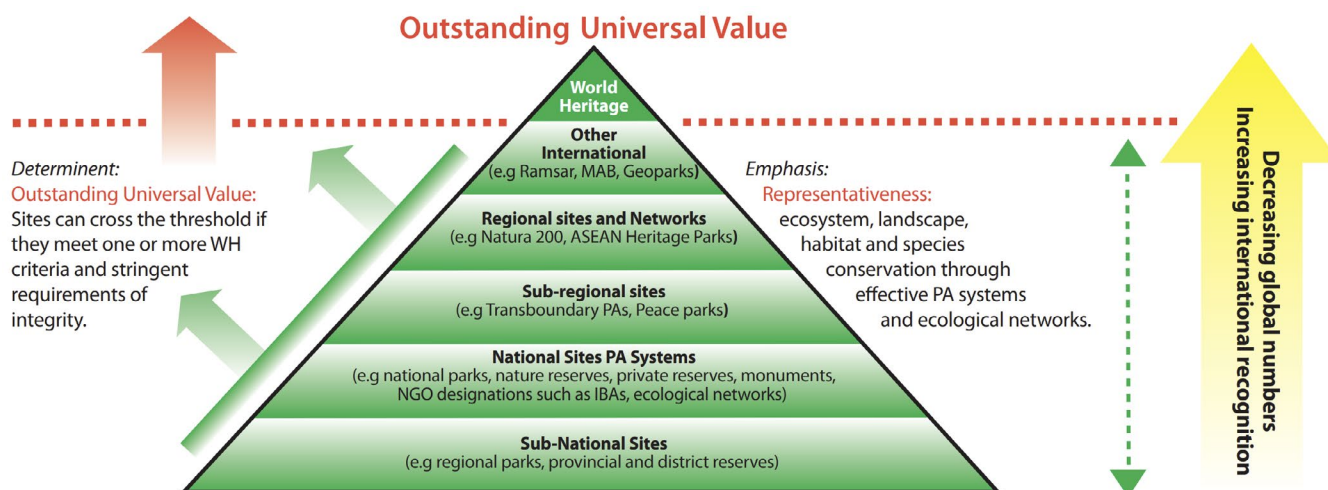


Figure 2. Relationship between WH and other site-based Conventions and approaches to site based-conservation. The broad relationship between the WH Convention and other site-based Conventions is that the WH Convention requires a higher threshold before inscription on the List can take place. Source: Chape, 2012

- Island WH sites in the Pacific which are relevant to this report, but are outside the 23 focus PICTs
- Hawaii Volcanoes National Park, Hawaii, USA³⁰.
- Henderson Island, UK³¹.
- Papahānaumokuākea, Hawaii, USA³² (mixed WH site)
- Lord Howe Island Group, Australia³³.

The WH Convention, and natural WH sites, make a significant contribution to biodiversity conservation and sustainable development, globally and in the Pacific. However, as this report will illustrate, the potential of natural WH sites, and the WH Convention in general, is yet to be realized in the Pacific region.

The WH Convention is one of a range of mechanisms to protect biodiversity and promote sustainable development. For example, the Ramsar Convention on Wetlands of International Importance Especially as Waterfowl Habitat (Convention on Wetlands)³⁴ is an intergovernmental treaty that provides the framework for national action and international cooperation for the conservation and wise use of wetlands. The UNESCO Man and the Biosphere Programme³⁵ identifies sites which provide models of conservation and sustainable development. Protected areas³⁶ have been established in most countries of the world, including the Pacific, to protect biodiversity and associated values. There are other relevant Conventions and Agreements which relate to the protection of natural sites and their values, including through species conservation such as through the Convention on International Trade in Endangered Species, CITES³⁷, which is an international agreement between governments which aims to ensure that international trade in specimens of wild animals and plants does not threaten the survival of the species.

However, what sets the WH Convention, and WH sites, apart is that any site so designated must meet the rigorous criteria and standards of Outstanding Universal Value and the associated conditions of integrity, in particular those relating to protection and management. WH sites are thus sites having international significance, rather than sites which are important regionally or nationally. The distinction is outlined in Figure 2 which shows how natural WH sites relate to other sites designated for important natural values. The key issue is that the WH Convention requires a higher threshold, of Outstanding Universal Value, before inscription on the WH List can occur.

30 World Heritage site page: <https://whc.unesco.org/en/list/409>.

31 World Heritage site page: <https://whc.unesco.org/en/list/487>.

32 World Heritage site page: <https://whc.unesco.org/en/list/1326>.

33 World Heritage site page: <https://whc.unesco.org/en/list/186>.

34 More information at: <https://www.ramsar.org/>.

35 More information at: <https://en.unesco.org/mab>.

36 More information at: <https://www.iucn.org/theme/protected-areas/about>.

37 More information at: <https://cites.org/eng>.

1.2.2 About the WH Convention and natural WH sites and biodiversity conservation

Natural WH sites protect critical areas for biodiversity around the world. These WH properties are the most outstanding natural places on the planet, from a biological and geological perspective, and constitute a significant subset of the global protected area system, critical for conservation of ecosystem integrity and biodiversity³⁸. The WH Convention recognises some WH properties specifically for their outstanding biodiversity values, being “*outstanding examples representing significant on-going ecological and biological processes in the evolution and development of terrestrial, fresh water, coastal and marine ecosystems and communities of plants and animals*” (criterion ix), or containing “*the most important and significant natural habitats for in-situ conservation of biological diversity, including those containing threatened species of outstanding universal value from the point of view of science or conservation*” (criterion x).

Although some WH sites are recognised specifically for their biodiversity values, there are significant opportunities for reinforcing the linkages between biodiversity conservation, cultural values and sustainable use in all WH properties. For example, mixed WH sites and many cultural landscapes safeguard important biodiversity and cultural values, often based on inter-linkages between culture and nature. This linkage between natural and cultural heritage has been promoted by UNESCO and the Secretariat of the Convention on Biological Diversity (SCBD) through their Joint Programme on Biological and Cultural Diversity³⁹ since 2010. The UNESCO Biodiversity Initiative⁴⁰ has been developed to support the UN Strategic Plan for Biodiversity, including through the WH Convention, to increase awareness of biodiversity and ecosystem services, and to strengthen the biodiversity-nature-policy-science-culture interface. The UNESCO WH Centre cooperates closely with the biodiversity-related Conventions⁴¹ individually and through the mechanism of the Biodiversity Liaison Group (BLG)⁴². The BLG meets regularly to explore opportunities for synergistic activities and increased coordination, and to exchange information. It provides an important opportunity to link WH with the biodiversity initiatives of other related Conventions, and to support the Kunming-Montreal Global Biodiversity Framework.

Nature and culture are inextricably linked in the Pacific, and this linkage is explored in Section 4.1.6 of this report. The majority of land and in-shore water resources are under customary ownership by local communities and any planning for natural WH sites must be done with the explicit Free, Prior and Informed Consent (FPIC)⁴³ of the rights holders and through local communities. Some cultural WH sites in the region have important natural values, and many natural WH sites have high cultural significance. There is great potential for strengthening linkages between nature and culture in World Heritage sites in the Pacific, including through greater attention to the identification of WH cultural landscapes and mixed WH sites.

1.2.3 About the WH Convention, natural WH sites and sustainable development

The protection and safeguarding of the world cultural and natural heritage through the WH Convention is recognized as contributing to Sustainable Development (SD) in the 2030 UN Agenda for Sustainable Development⁴⁴. UNESCO has approved a policy on WH and Sustainable Development⁴⁵ which outlines the important links between SD and WH, including “*in applying a sustainable development perspective within the implementation of the WH Convention, States Parties should also recognize the close links and interdependence of biological diversity and local cultures within the socio-ecological systems of many WH properties*”⁴⁶. Natural WH sites, if planned and managed effectively and appropriately, make a significant contribution to the sustainable development of local communities and national economies.

This is particularly relevant in the Pacific region where a key factor of success, or lack of success, for natural WH sites, is whether the site can and does contribute to the sustainable development of local economies. For example, part of the success of the Rock Islands Southern Lagoon WH site in Palau is that tourism associated with the site has made a tangible contribution to local communities, and to the national economy, particularly through the “Green Fee”. Conversely, at the East Rennell WH site in the

38 More information at: <https://whc.unesco.org/en/biodiversity/>.

39 More information at: <https://www.cbd.int/lbcd/>.

40 More information at: <https://en.unesco.org/themes/biodiversity>.

41 These include: the WH Convention, Convention on Biological Diversity (CBD), the Convention on Wetlands, Convention on Migratory Species (CMS), Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), International Treaty on Plant Genetic Resources for Food and Agriculture, International Plant Protection Convention (IPPC), and International Whaling Commission (IWC).

42 More information at: <https://whc.unesco.org/en/blg>.

43 More information at: <https://www.un.org/development/desa/indigenouspeoples/publications/2016/10/free-prior-and-informed-consent-an-indigenous-peoples-right-and-a-good-practice-for-local-communities-fao/>.

44 More information at: <https://sdgs.un.org/2030agenda>.

45 Policy Document for the Integration of a Sustainable Development Perspective into the Processes of the WH Convention as adopted by the General Assembly of States Parties to the WH Convention at its 20th session (UNESCO, 2015). More information at: <https://whc.unesco.org/document/139146#:~:text=11.-,The%20integration%20of%20a%20sustainable%20development%20perspective%20into%20the%20processes,interdisciplinary%20and%20inter%2Dsectorial%20spectrum>.

46 Paragraph 8 of the above Policy Document.

Solomon Islands, the lack of tangible benefits for local communities is a key reason for the lack of local and national support and was a contributing factor behind East Rennell being placed on the List of WH in Danger. More detail on these, and other natural WH sites in the Pacific, is outlined in Chapters 3 and 4.

1.2.4 About BIOPAMA

The Biodiversity and Protected Areas Management Programme (BIOPAMA) is a €60 million initiative of the European Union (EU) and the Organisation of African, Caribbean and Pacific States (OACPS) to improve the long-term conservation and sustainable use of natural resources through the better use and monitoring of information and capacity development on management and governance. In the Pacific, BIOPAMA is led by the IUCN Oceania Regional Office, in partnership with the European Commission Joint Research Centre (JRC) and the Secretariat of the Pacific Regional Environment Programme (SPREP). BIOPAMA supports the 15 countries of the region (the independent states included in this report). The regional focus of the project is to support partners and communities to improve the effectiveness and livelihood benefits of marine and terrestrial protected areas. This is being achieved through implementing activities under four main areas:

- Grants mechanism to support ground action.
- Training and direct support to government and partners on tools and practices that improve management effectiveness.
- Regional protected area support hub, which will support improved decision-making and reporting (implemented through SPREP).
- Technical reports that highlight the status of protected areas in the region.

BIOPAMA provides a range of tools and services to help conservation in ACP Countries⁴⁷, particularly through Regional Observatories for Protected Areas and Biodiversity which support data collection, analysis, monitoring and reporting, develop the capacities of staff and organisations to manage this information and provide policy guidance for better decision making on biodiversity conservation. Further information on the services provided through BIOPAMA is outlined in Box 2.

BIOPAMA is directly relevant to natural WH in the Pacific, including through support for initiatives such as this review of WH and the broader review of the State of Protected Areas in Oceania. Of particular relevance is the fact that SPREP is one of five key regional partners for the Regional Protected Area Support Hub Regional Observatories and can thus potentially provide a range of tools and support services to support the management and protection of natural WH sites in the Pacific region. BIOPAMA has been successful in the Pacific, based on comments from persons interviewed for this project, however it has provided limited support to natural WH sites in the region. There is also a major challenge of sustainability as funding for BIOPAMA will finish in 2025⁴⁸.

Greater effort needs to be made to better link the services and tools available through BIOPAMA in the Pacific with the challenges facing natural WH sites in the Pacific, particularly to address challenges faced in the East Rennell WH site in the Solomon Islands and the PIPA WH site in Kiribati. BIOPAMA should be orientated to better address the challenges faced by natural WH sites of the region.

1.2.5 About the Pacific Regional WH Action Plan

This project has been linked closely with work undertaken to support the preparation of the *“Review of World Heritage Priorities in the Pacific Region 2021-2025”*, which informed UNESCO in its Report on the 3rd Cycle of Periodic Reporting for the Asia-Pacific Region, and the subsequent development of the WH Action Plan for the Asia-Pacific Region presented to the 45th session of the WH Committee (WHC). The *“Review of World Heritage Priorities in the Pacific Region 2021-2025”* overlaps with the project outlined in this report although there are distinctions: the *“Review of World Heritage Priorities”* covers both natural, cultural and mixed WH sites (this project focussed on natural and mixed WH sites) and also the Review focussed on PICT State Parties to the WH Convention (this project covered 23 countries and territories in the Pacific region). Given the close linkages between the two projects, there was very close cooperation between the project teams, particularly through the implementation of joint interviews with Pacific Island State Parties to the WH Convention. This close and effective cooperation greatly strengthened both WH reports.

⁴⁷ More information on services and support through BIOPAMA at: <https://biopama.org/what-we-offer/>.

⁴⁸ This issue is being addressed by SPREP which has initiated a project to review options for the financial sustainability of the SPREP Protected Areas Programme, a key element of BIOPAMA in the Pacific region, after existing BIOPAMA funding concludes in 2025.

Box 2. Services provided through BIOPAMA

BIOPAMA – Supporting protected area data collation and coordination

The Secretariat of the Pacific Regional Environment Programme (SPREP) is the recognised regional data collation, coordination and resource hub for protected areas in Oceania. This work is currently being supported by BIOPAMA. SPREP collaborates closely with the Secretariat of the Convention on Biological Diversity (CBD). This collaboration is formalised through recurring Memoranda of Understanding (MoU), which recognise SPREP as the coordination focal point for CBD activities and initiatives. SPREP also has a formal agreement with UNEP-UNEP-WCMC to be the regional collator of WDPA data.

In this role, SPREP is assisting its members to implement CBD protected area-related decisions (including the Programme of Work on Protected Areas) and national protected area priorities (such as NBSAPs). It is also supporting countries to collect and collate protected area data to inform improved decision-making. In addition, SPREP provides coordination support for regional partner organisations, through the Pacific Islands Roundtable for Nature Conservation (PIRT), to align their activities towards a coherent implementation of the Pacific Islands Framework for Nature Conservation and Protected Areas 2021–2025.

Moreover, the regional organisation has joined the Global Partnership on Aichi Target 11, which was launched in November 2018 on the margins of the 14th Meeting of the Conference of the Parties to the CBD, in Sharm El-Sheikh, Egypt. The Target 11 Partnership aims “to facilitate the achievement of Target 11 in a concerted manner. The Partnership is expected to stimulate regional implementation support networks and donors to align their activities towards the decentralized implementation of focussed actions for the achievement of Target 11” (CBD Secretariat, 2019).

Relevance for Pacific natural WH Sites

- BIOPAMA provides a number of services and tools which are directly relevant to the management and protection of natural and mixed WH sites in the Pacific. It is particularly useful and relevant given the weak and limited capacity of most natural WH sites in the Pacific (refer to Section 4.1.5 of this report).
- SPREP is the host for the BIOPAMA Regional Observatory in the Pacific and this enables BIOPAMA to directly engage with relevant PIC national agencies, which are mostly SPREP Member agencies, and generally have the lead responsibility for natural WH in the Pacific, as well as engaging with regional and other institutions.

Source: Box 2.4 of SoCPA (van Nimwegen, P., Leverington, F.J., Jupiter, S. and Hockings, M. (eds.) (2022).

Oceania's global significance for natural and cultural heritage conservation

2



2.1 Overview of the region

This report covers 23 Pacific Island Countries and Territories (PICTs) in the Pacific region⁴⁹. The region is dominated by the Pacific Ocean, the largest ocean on the planet, covering a quarter of the earth's surface. In fact, all of the world's continents could fit within the Pacific Basin⁵⁰. The Pacific has a combined Exclusive Economic Zone (EEZ)⁵¹ of more than 30 million km², although with a very small land area, including more than 25,000 islands of around 552,000 km², with Papua New Guinea comprising 84 per cent of that area⁵². Thus, the Pacific region is comprised of 2% land and 98% ocean, reinforcing the importance of oceanic and marine resources for Pacific people.

In recognition of this vast oceanic region Pacific Island Leaders⁵³ have, in recent years, referred to their countries as Large Ocean States rather than the more commonly used term Small Island Developing States (SIDS)⁵⁴. The importance of the ocean to Pacific countries and peoples is also reflected in the development of leader-driven, Pacific-wide initiatives such as the Pacific Oceanscape⁵⁵ and the Blue Pacific⁵⁶, which aim to ensure conservation and sustainable use of Pacific oceanic and marine resources.

The Pacific is divided into three main sub-regions: Micronesia, Melanesia and Polynesia. Micronesia which lies north of the Equator and predominately west⁵⁷ of the International Date Line (IDL), includes the Northern Mariana Islands in the northwest, the Marshall Islands to the east and the islands of Kiribati in the southeast. Other Micronesian countries and territories include Guam, the Federated States of Micronesia, Kiribati, Nauru, and Palau. Melanesia to the southwest, includes Papua New Guinea, the world's second largest island and the largest of the Pacific islands. Other Melanesian countries and territories include Solomon Islands, Vanuatu, Fiji, New Caledonia and the Wallis and Futuna Islands.

Polynesia stretches from Hawaii in the north to New Zealand in the south, and includes Tuvalu, Tokelau, Samoa, Tonga to the west, and the Cook Islands and French Polynesia to the east. Other Polynesian countries and territories include American Samoa, Niue, Pitcairn Islands, Tokelau and Tuvalu.

Timor-Leste is located in the Eastern Malay Archipelago and west of Papua New Guinea. The country is part of the Pacific ACP states. For the purposes of this report, the term PICTs is used to collectively describe the Pacific Island Countries and Territories as well as Timor-Leste. There are many cultural and historical connections between the country and Melanesia. Timor-Leste works with a range of regional inter-governmental organisations and groupings in the Pacific, including SPREP and SPC⁵⁸, and the Melanesian Spearhead Group⁵⁹ (MSG), and with groupings in Southeast Asia, such as ASEAN⁶⁰ and the Coral Triangle Initiative (CTI)⁶¹.

2.2 The Pacific environment

The Pacific region is characterized by a wide range of biogeographical and geomorphological features, these range from large, mountainous islands⁶², predominately in Melanesia and Timor-Leste, to smaller volcanic high islands and extensive atolls in Polynesia and Micronesia, and raised coralline limestone islands, such as Henderson, Nauru and Niue.

49 American Samoa, Cook Islands, Federated States of Micronesia, Fiji, French Polynesia, Guam, Kiribati, Marshall Islands, Nauru, New Caledonia, Niue, Northern Mariana Islands, Palau, Papua New Guinea, Pitcairn Islands, Samoa, Solomon Islands, Timor-Leste, Tokelau, Tonga, Tuvalu, Vanuatu, and the Wallis and Futuna Islands.

50 NOAA, 2024. More information at: <https://oceanservice.noaa.gov/facts/biggestocean.html#:~:text=The%20Pacific%20Ocean%20is%20the,of%20the%20world%20ocean%20basins.&text=Covering%20approximately%2063%20million%20square,fit%20into%20the%20Pacific%20basin>.

51 More information at: https://www.oecd-ilibrary.org/glossary_5jftbcg8wcs0.pdf?itemId=%2Fcontent%2Fcomponent%2F9789264268586-21-en&mimeType=pdf

52 Chape, 2012.

53 PIC Heads of Government (Prime Ministers or Presidents).

54 For the use of this term see, for example: <https://www.greenpeace.org.au/blog/the-rise-of-Pacific-power-from-small-island-states-to-large-ocean-states/>.

55 More information at: <https://sdgs.un.org/partnerships>

56 More information at: <https://www.forumsec.org/2050strategy/>.

57 Although there are ocean areas of RMI and Kiribati which are east of the IDL.

58 Timor-Leste is currently not a member of SPREP or SPC. They are a member of the Melanesian Spearhead Group (MSG). More information at: <https://msgsec.info/about-msg/>.

59 More information at: <https://msgsec.info/>.

60 More information at: <https://asean.org/>.

61 The Coral Triangle Initiative on Coral Reefs, Fisheries, and Food Security, or the Coral Triangle Initiative, is a multilateral collaborative partnership among six countries. CTI covers both SE Asia and Pacific. More information at: <https://www.coraltriangleinitiative.org/>

62 Hawaii is the highest mountain in the world measured from its base on the ocean floor. Some volcanic islands are small but not their volcanoes.

The region features unique and varied ecosystems, including tropical montane rainforests, open woodlands and grass savannahs, freshwater lakes and streams, salt marshes and mudflats, mangrove and coastal littoral forests, seagrass, fringing and offshore coral reefs, and deep-sea trenches, seamounts and abyssal plains. There is also considerable climatic range, from tropical to sub-tropical and temperate climates⁶³ and even glacial on some summits in New Guinea. The major feature of the Pacific is the Pacific Ocean, the vast open ocean areas and pelagic ecosystems are a defining feature of the Pacific environment.

Coral reefs⁶⁴ are a feature of Oceania, particularly in Melanesia and Timor-Leste. Examples include the World Heritage listed Lagoons of New Caledonia and the Great Barrier Reef off northeastern Australia, the most significant reef system on the planet.

2.3 Importance of the Pacific for biodiversity

The Pacific region is characterized by high levels of biodiversity and species endemism, and extreme vulnerability to external impacts, such as climate change and natural disasters, and plastic pollution. Pacific Island ecosystems have high species turnover and an unusual richness of endemic terrestrial and freshwater species, driven by their relatively small land area compared with sea area and vast oceanic distances between land masses⁶⁵.

A feature of Pacific biodiversity is a general reduction in species diversity as one moves from west to east in the region. The highest marine species diversity is concentrated in Southeast Asia and Papua New Guinea, with a general attenuation in marine and terrestrial biodiversity from west to east⁶⁶. There are no native amphibians east of Fiji and there are no native terrestrial mammals east of the Cook Islands. The eastward diminution of biodiversity reflects several factors, including the filtering out of species that are not adept at crossing ocean gaps, the eastward decline in island size and rainfall, and the decreasing complexity of island types, with continental islands disappearing east of Fiji⁶⁷.

The Pacific region has globally significant areas for biodiversity. For example, the western edge of Oceania, including New Guinea, Solomon Islands and Timor-Leste, within the Coral Triangle region, is broadly considered the centre of highest marine biodiversity on the planet⁶⁸. As noted, marine and terrestrial species richness tapers off towards the eastern islands of Polynesia, with proportionally increasing endemism in some taxa⁶⁹. Further information on the Coral Triangle is outlined in Box 3.

Box 3. Information on the Coral Triangle

The Coral Triangle

The Coral Triangle is a marine area located in the western Pacific Ocean. It includes the waters of Indonesia, Malaysia, Philippines, Papua New Guinea, Timor-Leste and Solomon Islands. Named for its staggering number of corals (nearly 600 different species of reef-building corals alone), the region nurtures six of the world's seven marine turtle species and more than 2,000 species of reef fish. The Coral Triangle also supports large populations of commercially important tuna, fuelling a multi-billion-dollar global tuna industry. Over 120 million people live in the Coral Triangle and rely on its coral reefs for food, income and protection from storms.

Current levels and methods of harvesting fish and other resources are not sustainable and place this important marine area and its people in jeopardy. A changing climate threatens coastal communities and imperils fragile reefs. The challenge ahead is to develop sustainable solutions for the Coral Triangle's inhabitants and to protect one of the most diverse marine habitats on Earth at the same time.

Source: WWF — <https://www.worldwildlife.org/places/coral-triangle>

Species endemism is a major feature of the Pacific region, largely driven by the geographical isolation of many islands. The biodiversity hotspots of East Melanesia, Polynesia-Micronesia and New Caledonia contain more than 8,500 endemic plant species and 165 threatened endemic birds and mammals⁷⁰.

⁶³ Chape, 2012.

⁶⁴ Coral reefs are large underwater structures composed of the skeletons of colonial marine invertebrates called coral. The coral species that build reefs are known as hermatypic, or "hard", corals because they extract calcium carbonate from seawater to create a hard, durable exoskeleton that protects their soft, sac-like bodies. Other species of corals that are not involved in reef building are known as "soft" corals. More information at: <https://www.livescience.com/40276-coral-reefs.html>.

⁶⁵ Jupiter et al., 2014.

⁶⁶ More information at: <https://www.cepf.net/resources/documents/polynesia-micronesia-ecosystem-profile-2007>

⁶⁷ More information at: <https://www.cepf.net/resources/documents/polynesia-micronesia-ecosystem-profile-2007>

⁶⁸ Asaad et al, 2018

⁶⁹ Hughes et al., 2014.

⁷⁰ Critical Ecosystem Partnership Fund, 2015.

Moreover, the island of New Guinea is recognized as one of the world's five High-Biodiversity Wilderness Areas (HBWAs)⁷¹, and Papua New Guinea as one of the 17 megadiverse countries around the world⁷². It is noted that HBWAs have the same endemism levels as hotspots but are largely intact, with minimal or no environmental disturbance.

The global importance of the biodiversity of the Pacific region is underlined in a number of credible global assessments of high biodiversity areas. The key findings from these assessments are outlined in Section 5.3.1 of this report. A summary of some of these assessments is outlined in Box 4.

Box 4. Global biodiversity assessments relevant to the Pacific

Global Biodiversity Assessments relevant to the Pacific

WWF Global 200: The Global 200 is the list of ecoregions identified by WWF as having the highest priority for biodiversity conservation. Priority terrestrial ecosystems within the region in the Global 200 list include the South Pacific Island Forests, three priority ecoregions in New Caledonia, the Fiji Barrier Reef, and marine areas of French Polynesia.

Megadiverse countries: PNG is one of the 17 so-called megadiverse countries on the planet that does not have a natural or mixed WH site yet. Each megadiverse country holds at least 1% of the world's endemic plant species (i.e. not occurring anywhere else).

Biodiversity hotspots: Four of the world's 36 terrestrial biodiversity hotspots overlap with one or more of the 23 countries/territories covered by this report. Both New Caledonia and the East Melanesian Islands currently have very little WH coverage. The vast Polynesia-Melanesia hotspot is already covered in several natural or mixed WH sites. The biggest contribution by land area comes from the Hawaii Volcanoes National Park in the USA, which is beyond the scope of this project and is not inscribed for its biodiversity values. The Wallacea hotspot also has marginal coverage and, within the project focal area, concerns Timor-Leste only.

Endemic Bird Areas (EBAs): There are a number of EBAs in the Pacific region without WH coverage. The most important gaps are the Solomon Group EBA, which has more restricted-range bird species (79 species) than any other EBA in the world, and the New Britain and New Ireland EBA in PNG with 54 restricted-range species.

Important Bird and Biodiversity Areas (IBA): Provide a fundamental indicator for areas of high conservation value. The IBA approach has been applied in a number of Pacific countries.

Key Biodiversity Areas (KBAs): Identifies the most important places in the world for species and their habitats. The KBA Programme supports the identification, mapping, monitoring and conservation of KBAs to help safeguard the most critical sites for nature on our planet – from rainforests to reefs, mountains to marshes, deserts to grasslands and to the deepest parts of the oceans.

Global Marine Centers of Endemism: Conservation International has identified 18 global marine centers of endemism based on the number of restricted range reef fish, corals, snails and lobsters (Roberts et al 2002). There are two centers in the Polynesia Micronesia Hotspot, namely the Hawaiian Islands and Easter Island.

IUCN World Heritage Outlook: Provides a global assessment of natural WH and is composed of a website and a three-yearly global report. Launched in 2014 and with two subsequent reports in 2017 and 2020, it is the first global assessment of natural WH and the first to recognise conservation success in the world's most iconic places. The WH Outlook provides an assessment of natural WH at global, regional and national levels. The assessment of Pacific natural WH sites in Section 3.2 of this report draw heavily on the WH Outlook. Data in the Outlook can also be compiled and assessed at regional levels. The fourth edition of the WH Outlook is expected to be released in October 2025.

Relevance for Pacific natural WH sites

- Global assessments of biodiversity, as outlined in Section 5.3.1 and summarized above, underline the outstanding significance of the unique biodiversity of the Pacific.
- This biodiversity is poorly represented within natural WH sites in the Pacific, with the glaring example of PNG, a megadiverse country having no natural WH sites

Source: This is a shortened version of Section 5.3.1 of this report.

⁷¹ More information at: <https://biodiversitya-z.org/content/high-biodiversity-wilderness-areas-hbwa#:~:text=The%205%20HBWAs%20are%20Amazonia,of%20United%20States%20of%20America.>

⁷² Mittermeier et al., 1997; 2003; 2004.

All global, regional and national biodiversity assessments highlight the importance of the biodiversity of Papua New Guinea, as well as the many threats to this biodiversity, and the relatively low level of protection, with protected areas in PNG covering 3.69% of the terrestrial area and 0.14% of the marine area⁷³. Further information relating to biodiversity in PNG is outlined in Box 5⁷⁴.

Box 5. Papua New Guinea – A megadiverse country

Papua New Guinea – A megadiverse country

Papua New Guinea is one of seventeen megadiverse countries in the world, containing more than 7% of the world's biodiversity in less than 1% of the world's land area. This includes over 18,000 described plant species, 719 birds, 271 mammals, 227 reptiles, 266 amphibians, 341 freshwater fish species, 600 species of coral and 3000 species of reef fish. In addition to biodiversity, Papua New Guinea has significant cultural diversity, with more than 800 languages and 96% of the land still being held under customary ownership.

The biodiversity of Papua New Guinea is threatened by a rapidly growing population and resource development, including forestry, agriculture, fisheries, mining and petroleum.

Papua New Guinea's status as a megadiverse country is recognized under [Goal 4 of the PNG Constitution](#) which states, inter alia: "*The Natural Resources and the environment of Papua New Guinea should be conserved and used for the collective benefit of the people and should be replenished in the interest of future generations*". This is formal recognition of the importance of biodiversity for the people and the culture of PNG, building on their traditions and livelihoods since humans first settled in the country about 50,000 years ago.

Overall protection of PNG's biodiversity is the responsibility of the Conservation and Environment Protection Authority (CEPA), working closely with other relevant PNG agencies. PNG is a signatory to the Convention for Biological Diversity under which PNG developed the National Biodiversity Strategy and Policy in 2007, however uptake has been very slow, uncoordinated and lacking in both funding and capacity.

Protected Areas have been established in Papua New Guinea and cover 3.69% of terrestrial area and 0.14% of marine area. These protected areas fall into IUCN management categories III and VI. As of February 2022, there are no natural WH sites in PNG.

Sources:

<https://www.protectedplanet.net/country/PNG>

<https://iucngreenlist.org/country/papua-new-guinea/>

<http://georges.biomatix.org/blog/post/endemic-and-flagship-species-workshop>

2.4 People, nature and culture in the Pacific region

The human discovery and settlement of islands in the Pacific occurred over thousands of years, from the early settlement of Papua New Guinea 46,000 years ago to the more recent occupation of islands in Polynesia by 1,200 AD⁷⁵. The discovery and colonization of the Pacific Islands, many of which are thousands of kilometres from other islands, is recognised as one of the greatest feats of human endeavour⁷⁶. Voyaging across the Pacific was not considered a barrier to the cultures and peoples of the region but a "blue highway" that not only connected them to each other, but also ensured that oral traditions, and cultural norms were, while not exactly the same, consistent⁷⁷. This settlement wave led to declines and extinctions of species ill-equipped to deal with humans and accompanying predators, for example about 50% of indigenous birds were eliminated from the Hawaiian Islands after Polynesians arrived⁷⁸.

Pacific peoples evolved with the environment over thousands of years and the region features a diversity of cultures, languages and traditional practices, most focussed on the environment. Pacific communities relied on the services provided through terrestrial and marine ecosystems and developed a range of traditional fishing, agricultural and hunting practices designed to maintain the biodiversity on which they depend. Many traditional practices were developed to manage and protect important areas or species, including through closure of areas on a permanent or temporary basis to ensure sustainable use of resources.

73 More information at: <https://www.iucn.org/resources/conservation-tools/protected-planet> and <https://iucngreenlist.org/country/papua-new-guinea/>.

74 There is significant biodiversity in West Papua, Indonesia, as one reviewer noted: "The megadiversity doesn't magically stop at the West Papua boundary". However, this is outside of the geographical focus of this report.

75 Diamond, 2005.

76 Chape, 2012.

77 Personal communication with Athline Clark.

78 Perez, 2021.



A traditional Polynesian voyaging canoe at sea, Samoa © Stuart Chape

Pacific island communities today still depend on marine and terrestrial resources for their daily needs such as food, water, shelter, and medicine. Biodiversity conservation is therefore critical for life, for the maintenance of essential ecosystem functions, and for sustainable development in the Pacific⁷⁹. Customary conservation methods are still practiced today in many Pacific countries, such as *Ra'ui* in the Cook Islands, (Box 6) and in French Polynesia where many *ra'ui* (*ra'ui* of Rapa) continue to be implemented today.

The majority of Pacific inshore land and sea resources are owned by local communities in the Pacific, there is very little State-owned land or inshore waters. In some Pacific Island countries, such as the Cook Islands, this is the case for the land area, though from the mean high-water mark (MHW) outwards is Crown owned. Natural resources and features have high cultural significance in the Pacific and the concepts of nature and culture are strongly inter-twined throughout the region, there is no clear line dividing the two. This underlines the importance of traditional approaches to resource conservation and also the importance of working with and through Indigenous peoples and traditional owners, in developing any new conservation or sustainable development programmes in the Pacific, including those relating to natural WH. Programmes should build on and reinforce traditional practices and should ensure the full and effective involvement of local communities⁸⁰.

There are a number of examples of “home grown” community conservation initiatives. For example, the Pacific has pioneered community-based approaches to the protection of marine resources, such as Locally Managed Marine Areas (LMMAs)⁸¹ where marine conservation efforts are largely or wholly led by local coastal communities, with the support of governments and partners. These often build on centuries old traditional practice to ensure sustainable use of coastal and marine resources, such as *ra'ui* in the Cook Islands, and underline the importance of contemporary conservation programmes, including natural WH, building on customary practice and knowledge. Further information on LMMAs is outlined in Box 7. Not only has the Pacific pioneered the community-based approaches to protection of marine resources but the region is also where many countries have protected large sections of their vast exclusive economic zones through the designations of Large Scale MPAs⁸².

79 Chape, 2012.

80 Conservation programmes should also link with place-based connections, as referenced in the SoPACA report (Box 6.1).

81 Roccliffe & Peabody, 2014

82 More information at: <https://bigooceanmanagers.org/>.

Box 6. Ra'ui – A traditional conservation practice applied in the Cook Islands**Ra'ui – A traditional conservation practice applied in the Cook Islands**

Ra'ui is a traditional form of resource management that is of particular significance and widely used in the Cook Islands. The term refers to both a geographic locality and traditional custom that involves imposing restrictions on the access to and/or use of specific resources of a particular area (land, lake, stream, reef or lagoon). Restrictions are usually/often temporary (can sometimes be permanent as in the case of *ra'ui motokore*) and resource use is forbidden or restricted for a given period, as determined by traditional leaders of the area (there can sometimes be a take limit, e.g. 2 birds per person, versus overall ban).

Typically small in size (<100ha), *ra'ui*:

- are given short term protection to allow for a specific resource (e.g. fish, shellfish, crabs, birds) to recover and/or reach maturity and to sustain harvesting;
- have no formal legal basis; and
- rely on community management and traditional authority to ensure compliance.

Ra'ui motokore (*motokore*) are a strict and permanent type of *ra'ui*. The origins of *ra'ui* go back to early settlement of the Cook Islands by Polynesian people. The approach was given new impetus when *ra'ui* was re-applied in the Cook Islands in the late 1990s when communities became concerned about declining fish and invertebrate stocks in lagoon areas.

Though there is no legal basis, traditional practices are recognised in the Cook Islands Constitution under Part IV B Custom, whereby:

- (1) In addition to its power to make laws pursuant to Article 39, Parliament may make laws recognising or giving effect to custom and usage.
- (2) In exercising its powers pursuant to this Article, Parliament shall have particular regard to the customs, traditions, usages and values of the indigenous people of the Cook Islands.
- (3) Until such time as an Act otherwise provides, custom and usage shall have effect as part of the law of the Cook Islands, provided that this sub-clause shall not apply in respect of any custom, tradition, usage or value that is, and to the extent that it is, inconsistent with a provision of this Constitution or of any enactment.
- (4) For the purposes of this Constitution, the opinion or decision of the Aronga Mana of the island or vaka to which a custom, tradition, usage or value relates, as to matters relating to and concerning custom, tradition, usage or the existence, extent or application of custom shall be final and conclusive and shall not be questioned in any court of law.

Sources:

<http://www.mmr.gov.ck/our-work/conservation-and-protection/raui-marine-protected-areas>

<http://www.mmr.gov.ck/our-work/conservation-and-protection/raui-marine-protected-areas>

Twyford, 2020.

Box 7. Locally managed marine areas**Locally Managed Marine Areas**

A Locally Managed Marine Area (LMMA) is an area of nearshore waters and its associated coastal and marine resources that is largely or wholly managed at a local level by the coastal communities, land-owning groups, partner organizations, and/or collaborative government representatives who reside or are based in the immediate area. An LMMA differs from what is commonly known as a Marine Protected Area (MPA) in that LMMAs are characterized by local ownership, use and/or control, and in some areas follows the traditional tenure and management practices of the country or location. In contrast, MPAs in the formal sense are typically designated via a top-down approach with little if any local input.

Establishment of an LMMA enables communities to make decisions on which fishing methods and other activities can or cannot be carried out in their waters. Typically, a community also designates a portion of their marine area as a no-take zone where no fishing is allowed, providing additional protection and an increase of marine life in many cases. An LMMA can vary widely in purpose and design; however, two aspects remain constant:

- A well-defined or designated area; and
- Substantial involvement of communities and/or local governments in decision-making and implementation.

In using an LMMA approach, some coastal communities are reviving traditional practices that have been used as part of their culture for many generations. Others are using more modern ideas introduced from outside. Some use a combination of both.

Sources:

IPBES: <https://ipbes.net/policy-support/tools-instruments/locally-managed-marine-area#:~:text=A%20Locally%20Managed%20Marine%20Area,or%20are%20based%20in%20the>

Community conservation initiatives, such as LMMAs, play a key role in the Pacific. However, it is vitally important that these are based on partnership and support, including from national governments, NGOs, donors and partners. The East Rennell WH site in Solomon Islands created a significant precedent for the WH Convention as it was the first ever site inscribed on the WH List under customary management and ownership⁸³. However, this nomination had variable support at different levels within the country and there was only limited financial support provided from donors and partners after inscription⁸⁴. These factors were underlying reasons behind this WH site being placed on the WH in Danger List. Additional information on the East Rennell WH site is outlined in Section 3.2.1.

2.5 Threats to the Pacific environment

The biodiversity of the Pacific region is, sadly, under great threat. Pacific Island ecosystems and species are highly vulnerable to impacts such as climate change, habitat destruction and invasive species, which have resulted in significant impacts to the flora and fauna of this region. The threats posed by these factors when combined are even more damaging. Species extinction rates for birds and land snails are among the highest in the world⁸⁵. As further noted by SPREP⁸⁶: *“The Pacific islands region has experienced an alarming rate of decline in biodiversity: 33% of reef forming corals and over 40% of amphibian species are under threat, with the average abundance of native species in most major land-based habitats decreasing by at least 20% since 1990”*. Biodiversity loss is not simply an environmental issue for PICTS, it also significantly affects human livelihoods and national economies. The direct impact on livelihoods is magnified as the majority of Pacific Island people are dependent on natural (traditionally owned/governed) environments for protein and for living materials (including medicine).

There have been significant efforts⁸⁷ by Pacific Island governments to protect and sustainably manage their biodiversity. However, loss of natural habitats and species extinction continues unabated. Some of the key threats facing the environment of the Pacific are outlined below.

2.5.1 Climate change

PICTs are at the front line of impacts from climate change. Even though they account for only 0.03% of the world's total greenhouse gas emissions⁸⁸, the countries and territories of the Pacific region are among the most vulnerable on earth to climate change impacts. Pacific Island leaders have consistently noted climate change as being the most important threat to the people and environments of the Pacific region. This has been reflected in strong, high impact statements to global audiences, including to UNFCCC COPs⁸⁹. For example, the 2019 Pacific Island Forum⁹⁰ issued the “Kainaki II Declaration for Urgent Climate Change Action Now”⁹¹. This reaffirmed that climate change is the single greatest threat facing the region, and Pacific leaders declared that there is a “climate change crisis” facing the Pacific Island nations. Some key issues highlighted in the Declaration include the need:

- to limit global average temperature increase to 1.5°C (a red line for Pacific Island nations).
- to ensure the international community meets all obligations under the Paris Agreement⁹² and for all countries to take urgent action to reduce global greenhouse gas emissions and prevent catastrophic global warming.
- for greenhouse gas emissions to peak by 2020 and decline thereafter reaching net zero by 2050.
- for industrialized nations and large emitters to phase out fossil fuel subsidies and ban the construction of new coal plants.
- for the international community to meet their climate finance commitments to jointly mobilize US\$100 billion per year by 2020 and to conclude work on the Adaptation Fund serving the Paris Agreement.
- for all parties attending to consider a work programme on oceans within the UNFCCC process (to better integrate planning and action on climate and oceans).

83 All customary ownership is legally recognized in the Solomon Islands as it is mentioned in the SI Constitution.

84 Including support from the NZ government for ecotourism, prior to the conflict in the Solomon Islands which began in 1999.

85 More information at: https://www.cepf.net/sites/default/files/final.polynesiamicronesia.ep_.pdf.

86 More information at: <https://www.sprep.org/news/threats-to-Pacific-islands-rich-biodiversity-a-key-focus-of-the-conference#:~:text=The%20Pacific%20islands%20region%20has,at%20least%2020%25%20since%201990>.

87 Refer to Section 2.6 of this report for some of these efforts and responses.

88 More information at: https://link.springer.com/chapter/10.1007/978-3-030-32878-8_1.

89 UNFCCC – UN Framework Convention on Climate Change – COP – Convention of the Parties.

90 The Pacific Islands Forum is the region's premier political institution (18 members and 2 associate members). The Forum's Pacific Vision is for a region of peace, harmony, security, social inclusion and prosperity. More information at <https://www.forumsec.org/who-we-arePacific-islands-forum/>.

91 More information at: <https://www.climatechangenews.com/2019/08/28/Pacific-leaders-set-new-bar-collectively-declaring-climate-crisis/>.

92 The Paris Agreement is a legally binding international treaty on climate change. It was adopted by 196 Parties in Paris, in December 2015 and entered into force in November 2016. More information at: <https://unfccc.int/process-and-meetings/the-paris-agreement/the-paris-agreement>.

The impacts of climate change on Pacific people and environments are widespread and severe. Pacific Islands are extremely vulnerable to climate change, noting that three of the five lowest countries in the world⁹³ are located in the region and are thus the first countries likely to disappear under current sea level rise predictions. Advice provided by SPREP in 2008⁹⁴ is still valid today: *“Climate change will affect the Pacific way of life and the sustainable development of our islands in profound way: the most substantial impacts of climate change include losses of coastal infrastructure and land, more intense cyclones and droughts, failure of subsistence crops and coastal fisheries, losses of coral reefs and mangroves, and the spread of certain diseases”*.

Climate change will have significant impact on the biodiversity of the Pacific region, particularly when linked with other significant threats such as invasive species and habitat loss. Pacific islands are characterized by high levels of species endemism, and climate change and associated sea-level rise will pose serious challenges for species viability and survival. High-elevation ecosystems such as cloud montane forests are projected to disappear entirely by the year 2100, due to the impacts of climate change, with corresponding global losses of their endemic biodiversity. Sea level rise threatens restricted range species on small low-lying atolls. Shifts in distribution may be possible for generalist species, but range shifts will be difficult for species with small distributions, specialized habitat requirements, slow dispersal rates, and species at high elevations⁹⁵. The impacts of climate change on the marine environment are highly significant, with loss of coral reefs, including through coral bleaching, and ocean acidification, having major negative impacts on marine biodiversity.

Climate change is very challenging for PICTs to address, particularly considering that the causes, greenhouse gases, are mostly generated outside the region and are challenging for PICTs to address by themselves. However, the countries of the Pacific region are developing innovative approaches to mitigate and adapt to climate change, building on programmes such as the SPREP Pacific Adaptation to Climate Change (PACC)⁹⁶ project. Increasing attention is also being placed in the Pacific region on ecosystem-based adaptation⁹⁷ linking responses to climate change with the protection and effective management of natural ecosystems, such as mangroves, to act as a “front-level” response to the impacts of rising sea levels, extreme weather events and other climate change impacts. As an example of an innovative programme, New Caledonia, through CEN⁹⁸, hosts the Resilient Reef Initiative⁹⁹ which is a global initiative to help World Heritage coral reefs, and the communities that depend on them, survive, recover and adapt to climate change and local threats. The initiative is working with each of the four pilot sites (Belize, Palau, Ningaloo, and the New Caledonian lagoons) to develop a strategy that directly addresses key local issues and integrates resilience into management processes.

Climate change will have significant impacts on natural and mixed WH sites¹⁰⁰. For marine and coastal WH sites, sea level rise is impacting coastal and near shore species and ecosystems, the increasing frequency of coral bleaching events is leading to extinction of coral reefs in certain areas, and ocean acidification is impacting marine species and ecosystems. Terrestrial biodiversity within natural WH sites is affected, including through species shifting ranges, changes in the timing of biological cycles, modification of the frequency and intensity of wildfires, and the migration of pests and invasive species. There are also impacts on cultural WH sites, with physical impacts on ancient buildings as well as on social and cultural aspects, with communities changing the way they live and work and, in some cases, migrating and abandoning their built heritage. These impacts will require greater attention to forecasting, planning, mitigation and resilience responses. Additional resources will be required for natural WH sites to adapt to and mitigate against the impacts of climate change. The UNESCO WH Committee in 2021 considered the *“UNESCO 2021 draft Policy Document on the impacts of Climate Change on World Heritage properties: Summary of Vision and Goals”*¹⁰¹ which was endorsed by the WH Committee although further review, consultation and revision was requested¹⁰². Many consulted for this report have questioned the practicality and feasibility of a “business as usual” approach to WH in the face of climate change. For example, one expert consulted for this project noted¹⁰³: *“The current policies around OUV for WH sites are just about unworkable for most WH sites now thanks to climate change impacts. The recent WH climate change policy implicitly recognises that but has really not provided guidance on how to respond. The concept of OUV being ‘fixed’ is no longer feasible given the extensive, far reaching system changes that are emerging, so we need to be considering resilience along with integrity as two critical aspects of the ecosystem and management arrangements”*.

93 Kiribati, Tuvalu and the Republic of the Marshall Islands.

94 SPREP, 2008.

95 Taylor & Kumar, 2016.

96 More information at: <https://www.sprep.org/pacc>.

97 More information at: <https://www.sprep.org/sites/default/files/documents/publications/Pacific-Ecosystem-based-adaptation-climate-change.pdf>.

98 Conservatoire d'Espaces Naturels, New Caledonia. More information at: <https://www.overseas-association.eu/community/conservatoire-despaces-naturels-de-nouvelle-caledonie-cen/>.

99 More information at: <https://www.barrierreef.org/what-we-do/projects/resilient-reefs>.

100 More information on climate change and WH at: <https://whc.unesco.org/en/climatechange/>.

101 More information at: <https://whc.unesco.org/en/climatechange/>.

102 The Decision of the 2021 WH Committee is at: <https://whc.unesco.org/en/decisions/7917/>.

103 Personal communication with Di Tarte.

In the Pacific region climate change is a significant issue for existing natural WH sites but it cannot be looked at in isolation, and strategies for the planning and management of natural WH sites must be considered in conjunction with other threats such as habitat loss and invasive species. Climate change must also be considered in the nomination of any new natural WH sites, particularly in the context of ensuring large enough areas for species and ecosystems to survive and to ensure that planning for natural WH sites is linked and integrated with surrounding and internal land and sea uses.

2.5.2 Invasive species

As previously noted, the Pacific faces some of the highest extinction rates in the world. The largest cause of extinction of single-country endemic species in the Pacific is the impact of invasive species¹⁰⁴. Invasive species include vertebrate animals (e.g. rats, goats, cats, mongooses, mynas, fish etc.), invertebrate pests (e.g. snails, slugs, nematode worms, mosquitos, beetles and other insects etc.), weedy plants (trees, vines, shrubs, grasses, seaweeds etc.), and pathogens (e.g. fungi, bacteria and viruses that cause plant, animal or human diseases). The 2013 State of Conservation (SoC) in Oceania assessment noted that invasive species contribute directly to a loss of ecosystem function and loss of resilience to respond to climate change threats. In the Pacific region, invasive species also severely impact sustainable development, health, ecosystem services, and the resilience of ecosystems to respond to natural disasters¹⁰⁵. The SoC report further notes that the spread of plant, vertebrate, and invertebrate invasive species and diseases costs the region millions of dollars in economic impacts annually threatening biodiversity and livelihoods. The threat is worsened by the limited human and financial resources available to Pacific Island states to prevent and manage invasive species.

Addressing invasive species requires a cross sectoral approach requiring coordination and cooperation between environment, transport and agricultural sectors. The development of practical “hands-on” approaches to the control and eradication of invasive species is also essential. An excellent example of the latter is provided by the SPREP Invasive Species Programme¹⁰⁶ which works within and between PICTs to develop practical programmes to prevent new invasions and remove or mitigate the impacts of existing invasive species. This programme aims to provide technical, institutional, and financial support to regional invasive species programmes in collaboration with other regional bodies. The Programme also coordinates the Pacific Invasive Learning Network (PILN), a network of country-based practitioners battling invasive species, the Pacific Regional Invasive Species Management Support Service (PRISMSS) and the Pacific Invasives Partnership (PIP), the umbrella regional coordinating bodies for invasive species in the Pacific.

2.5.3 Overuse of marine resources

Marine and oceanic resources are vital for the people of the Pacific Islands, for sustenance and livelihoods, for contribution to national economies, as well as having enormous cultural significance. Fisheries stocks, particularly tuna, are of major economic importance for PICTs. Tuna stocks are increasingly under threat, particularly through overfishing¹⁰⁷. Reef ecosystems and marine resources are also threatened by marine pollution and threats associated with climate change, including coral bleaching and ocean acidification. Other marine species are also under serious threat, with, for example, four of the six species¹⁰⁸ of marine turtle in the Pacific region being classified in the threatened categories on the IUCN Red List of Threatened Species¹⁰⁹.

2.5.4 Other threats

There are a range of other threats to the Pacific environment, including habitat loss, particularly associated with activities such as logging and mining, and marine pollution, including from marine debris and plastic waste, increasingly recognized as a major threat to nature and people in the Pacific region¹¹⁰. The impact of these threats on natural WH sites is outlined later in this report, for example East Rennell in the Solomon Islands¹¹¹ where logging of areas adjoining the WH site is a significant issue, and also for the Phoenix Islands Protected Area in Kiribati¹¹², where the issue of fishing is currently a major factor relating to the management, and perhaps the

104 More information at: <https://www.sprep.org/attachments/Publications/BEM/battling-invasive-species-Pacific.pdf>.

105 More information at: <https://www.sprep.org/attachments/Publications/BEM/state-conservation-oceania-report.pdf>.

106 More information at: <https://www.sprep.org/attachments/Publications/BEM/campaign-battle-invasive-species.pdf>.

107 The WCPFC Scientific Committee Report (WCPFC, 2014), outlined concerns about Bigeye Tuna (*Thunnus obesus*) noting stocks were suffering from overfishing, particularly over the preceding 6-7 years, and were, at that time, at 16% of initial abundance. More recent assessments by SPC (Hare et al, 2020) indicate improvements in fish stocks, including this species. This has been attributed to conservation measures such as PNA members putting a temporal ban on use of Fish Aggregation Devices, FADs. Personal communication with Keith Twyford.

108 Hawksbill (Critically Endangered), Green, Loggerhead (Endangered) and Leatherback (Vulnerable).

109 More information at: <http://www.iucnredlist.org/>.

110 More information at: https://www.fint.awsassets.panda.org/downloads/wwf_pif_marinedebris_landscape.pdf.

111 Refer to Section 3.2.1 of this report.

112 Refer to Section 3.2.2 of this report.



Logging adjacent to East Rennell World Heritage Site, Solomon Islands © IUCN/Paul Dingwall

future WH status, of this site. Habitat loss through logging, mining and agricultural production can also destroy or erode the values of potential natural WH sites. For example, the Marovo Lagoon, in the Solomon Islands, has been suggested as an area of potential WH value since the 1980s however since that time there has been widespread logging in catchment areas, and areas adjacent to the Lagoon, which would pose significant integrity issues for any current or future consideration of it as a natural WH site. As well as these threats to biological diversity, there are also threats to cultural diversity in the Pacific, through the loss of traditional and cultural practices, and loss of spoken languages¹¹³, in some cases due to increasing urbanization in PICTS and in some cases due to loss of habitat and biodiversity.

These threats are compounded by poorly resourced and weak governance structures for the environment and natural resource management in PICTs. The challenges outlined in Section 3.4 regarding institutional and governance frameworks for WH in the Pacific region apply equally to the broader issue of environmental management in the Pacific region.

2.6 Responses to environmental threats

PICTs have responded to these and other environmental threats and have taken a number of actions to improve the management of their environments and to address the loss of biodiversity in particular. These actions have been at international, regional and national levels and are documented in Section 3.4 of this report¹¹⁴.

2.6.1 Responses at international levels

A number of PICs are signatories to international environmental Conventions and Agreements. Implementation of these Conventions in the Pacific region has been significantly constrained by limited capacity, lack of financial and human resources and limited information and data¹¹⁵. Table 2 outlines the key environmental Conventions and Agreements and their relevance to environmental management and natural WH in the Pacific.

113 Personal communication with Elise Huffer who notes the links between strong language diversity and rich biodiversity, although there is a gap when it comes to documenting the correlation and causal effects between specific languages and biodiversity.

114 Refer to Section 3.4 - Institutional and governance frameworks for WH in the Pacific region.

115 More information at: <https://www-eastwestcenter-org.webpkgcache.com/doc/-/s/www.eastwestcenter.org/sites/default/files/private/pip006.pdf>

The distinction is outlined in Figure Table 2. Key environmental Conventions and Agreements relevant to natural WH in the Pacific¹¹⁶

Convention/ Agreement	Relevance to environmental management and WH in the Pacific
WH Convention	There are currently 12 WH sites in the region, comprising six Cultural Sites, four Natural Sites and two Mixed Sites (inscribed for both natural and cultural values). More detail on the application of WH in the Pacific region is outlined in Chapter 3 of this report.
CBD¹¹⁷	CBD addresses the conservation of biological diversity and sustainable use of its components. The CBD PoWPA ¹¹⁸ addresses protected areas in general and WH natural properties fit within this as a subset, as defined by the threshold of OUV. The CBD is associated with a financial instrument, the Global Environment Facility (GEF), which has supported biodiversity related programmes in many Pacific countries. The CBD also provides for State Parties to prepare NBSAPs ¹¹⁹ which establish key issues, priorities and strategies to address them, including for the protection of important natural sites and ecosystems. All PICTs Members of CBD have prepared Action Plans although many are out of date.
The Convention on Wetlands¹²⁰	The Convention on Wetlands (Ramsar Convention) is an intergovernmental treaty that provides the framework for national action and international cooperation for the conservation and wise use of wetlands. There are 12 Wetlands of International Importance (also called Ramsar Sites) in the Pacific region, of which six are fully or partially coastal. Globally, a number of WH natural sites are also designated as Wetlands of International Importance, such as the Okavango Delta in Botswana and experience has shown there are benefits in such joint designations, given the often complementary and reinforcing objectives of both Conventions. As of April 2022, there were 93 Wetlands of International Importance are also designated as WH sites (partly or fully). As of October 2024, there are 86 Wetlands of International Importance in Oceania, of which 48 encompass marine or coastal wetlands. Not including Aus and NZ there are 12 Wetlands of International Importance in Oceania, 6 of which encompass marine or coastal wetlands.
UNESCO Man and the Biosphere Programme¹²¹	This programme identifies and accepts sites as Biosphere Reserves which provide models of conservation and sustainable development. Globally, many WH sites are the core areas of Biosphere Reserves. This provides a complementary protection mechanism and in particular ensures that WH properties are managed in an integrated way with their surrounding land or sea area. This also links with the WH Convention requirement for buffer zones, linked to site integrity. There are currently four Biosphere Reserves in the Oceania region as defined in this study ¹²² : one in Palau, two in FSM and one in French Polynesia, highlighting that the Biosphere Reserves approach currently has limited traction in the region. However, there is great potential for Biosphere Reserves in the Pacific and scope for joint establishment and management of WH and BRs.
UNFCCC¹²³	The landmark Paris Agreement ¹²⁴ was established through UNFCCC to combat and address climate change. Its goal is to limit global warming to well below 2°C, preferably to 1.5°C, compared to pre-industrial levels. Given the importance of climate change in the Pacific region, as outlined in Section 2.5.2, the UNFCCC is a very important Convention for the Pacific region. It is associated with a financial instrument, the Green Climate Fund (GCF), which has supported climate related programmes, particularly in climate adaptation and mitigation, in many Pacific countries. Potential linkages between climate change and WH sites have not been explored to date in the Pacific region, however there is potential for this in the future.
CMS¹²⁵	CMS is an international agreement that aims to conserve migratory species throughout their ranges. Migratory species have been inscribed and proposed as serial sites on the WH list and a number of experts consulted for this project suggested the possibility of a migratory whales WH site in the Pacific (refer to Section 5.4 of this report).
CITES¹²⁶	CITES is a multilateral treaty to protect endangered plants and animals. It recommends measures to regulate the international trade in wild animals and plants. CITES provisions can be used to reinforce measures for species protection in natural WH properties, inscribed based on their species diversity and endemism. Potential linkages between CITES and WH sites have not been explored to date in the Pacific region, however there is potential for this in the future.

¹¹⁶ Compiled by the authors.

¹¹⁷ More information at: <https://www.cbd.int/>.

¹¹⁸ CBD PoWPA - Programme of Work on Protected Areas.

¹¹⁹ NBSAPs – National Biodiversity Strategies and Action Plans. More information at: <https://www.cbd.int/nbsap/>.

¹²⁰ More information at: <https://www.ramsar.org/>.

¹²¹ More information at: <https://en.unesco.org/mab>.

¹²² More information at: <https://www.protectedplanet.net/2068>.

¹²³ United Nations Framework Convention on Climate Change. More information at: <https://unfccc.int/>.

¹²⁴ More information at: <https://unfccc.int/process-and-meetings/the-paris-agreement/the-paris-agreement>.

¹²⁵ More information at: <https://www.cms.int/>.

¹²⁶ Convention on International Trade in Endangered Species. More information at <https://cites.org/eng>.

Convention/ Agreement	Relevance to environmental management and WH in the Pacific
UNCCD ¹²⁷	UNCCD promotes practices that avoid, reduce and reverse land degradation and are the driving force behind Sustainable Development Goal 15 and Land Degradation Neutrality. UNCCD refers to itself as the global voice for land and is another key environmental convention/agreement relevant to natural WH in the Pacific, given many PICTs are a Party to it.
Noumea Convention ¹²⁸	The Noumea, or SPREP, Convention has a particular focus on preventing, reducing and controlling pollution and on ensuring sound environmental management and development of natural resources within the Convention Area. It has two Protocols, the Dumping Protocol and the Emergencies Protocol. The Convention and its related Protocols were adopted in 1986 and entered into force in 1990.
Sendai Framework ¹²⁹	The Sendai Framework for Disaster Risk Reduction 2015-2030 (Sendai Framework) advocates for substantial reduction of disaster risk and losses in lives, livelihoods and health and in the economic, physical, social, cultural and environmental assets of persons, businesses, communities and countries. It recognizes that the State has the primary role to reduce disaster risk, but that responsibility should be shared with other stakeholders including local government, the private sector and other stakeholders. It is particularly relevant in the Pacific and for WH sites given heightened vulnerability of PICTs to disasters, particularly in the face of climate change – attention should be paid to how natural WH heritage can better apply DRM measures for protection.

Implications for natural and mixed WH in the Pacific region:

- There is a high level of participation by PICTs in international environmental conventions and agreements, however the level of application of these Conventions historically has been highly variable partly because of financial constraints and low levels of capability and capacity, coupled with varying levels of political commitment.
- There is a need for better coordination between these conventions and agreements at national and regional levels. SPREP plays a key role in this regard given it is formally the regional focal point for a number of conventions and agreements relevant to the WH system (e.g. CBD, UNFCCC, Ramsar, CITES and CMS).
- However, expectations must be realistic regarding international Conventions and what they can and cannot do. For example, WH status can play an important role in promoting such action, although it must be recognised that the coverage of potential WH sites – with their fundamental requirement of Outstanding Universal Value (OUV) – will not comprehensively meet conservation needs and priorities in Oceania¹³⁰. Long-term commitment to focussed economic aid and to the associated provision of expertise will be essential¹³¹.
- There is potential for better coordination between WH and other Conventions, particularly with the CBD and the Convention on Wetlands. For example, through the development of joint management and communication programmes and also through highlighting WH as models for biodiversity conservation for the CBD. Experience has shown that WH sites generally have higher profile and visibility than other sites under the other Conventions and that there is potential to use WH sites as “models of excellence” to demonstrate models of outstanding management and best practice for other Conventions. It is also noted that there are a number of sites which have multiple designations, such as sites recognized jointly under the WH Convention and the Convention on Wetlands.

127 More information at: <https://www.unccd.int/>.

128 More information at: <https://www.sprep.org/convention-secretariat/noumea-convention>.

129 More information at: <https://www.undrr.org/implementing-sendai-framework/what-sendai-framework>.

130 Chape, 2012.

131 One reviewer noted: “If we want to save the planet, someone’s got to pay. The locals in Oceania can’t begin to do it by themselves. Well-meaning people in Paris and Geneva don’t have a clue what it’s like to live and work in the field. We need a model where locals see economic value in conservation. Self-interest is the best motivator when you’re poor. Protect the birds of paradise because I can make more steady money showing them to tourists than to selling them on the black market”.

2.6.2 Responses at regional and national levels

Actions and responses to environmental threats at regional and national levels are documented in Section 3.4 of this report¹³². Key elements are outlined below:

Regional level

There have been a number of significant regional initiatives relevant to environmental management in the Pacific region including the Pacific Oceanscape Framework and the Blue Ocean initiative¹³³ which provide a common, high-level policy response to the issue of conservation and sustainable use of the Pacific Ocean. The Pacific Regional Invasive Species Management Support Service (PRISMSS)¹³⁴ is another practical on-the-ground regional programme covering biosecurity as well as addressing the threat of invasive species throughout most of the region.

There are also significant sub-regional initiatives for environmental management and biodiversity conservation, such as the Micronesia Challenge, with the original commitment by five Micronesian countries and US territories to conserve 30% of nearshore coastal waters and 20% of forest land by 2020¹³⁵. Similarly, the ambitious Coral Triangle Initiative on Coral Reefs, Fisheries, and Food Security is a multilateral partnership of six countries working together to conserve 53% of the world's coral reefs from the Philippines through Indonesia to the Solomon Islands.

Regional and national initiatives are also planned and implemented through a number of regional intergovernmental agencies in the Pacific region, collectively known as the Council of Regional Organisations of the Pacific (CROP¹³⁶) agencies. SPREP is the lead regional agency for environmental management, however all of the nine CROP agencies¹³⁷ are involved to a greater or lesser extent in programmes relating to the Pacific environment. Coordination between SPREP and other agencies is facilitated through a range of mechanisms including CROP Working Groups on topics such as marine resources, and in relation to conservation, through the Pacific Islands Roundtable for Nature Conservation (PIRT).

NGOs play an important role in environmental management and biodiversity conservation in the Pacific. They have played an important direct role in supporting Governments and local communities in environmental management in the Pacific region. The role of NGOs has generally been welcomed by Pacific Island governments and NGO support has resulted in significant conservation achievements and “wins” in many PICTs.

National level

At the national level, Pacific Island government agencies play a key role in environmental management, with programmes usually implemented through Ministries of Environment or equivalent. These agencies are usually small, and considerably underfunded relative to spatial, policy, regulatory and technical responsibilities. There has been a trend in recent years to amalgamate agencies addressing environment issues with agencies dealing with related issues, such as climate change and meteorological services. This has aimed to provide economies of scale and also to ensure more effective integration and delivery of services to Pacific Island peoples.

Pacific environmental agencies manage formal protected areas¹³⁸ in virtually all countries in the region and these play an important role in the protection of biodiversity. However, the above constraints of funding and capacity constrain the development and management of effective protected area systems in the region.

Local communities

The role of local communities and customary owners in the Pacific is pivotal as the majority of land and in-shore resources are owned by local communities. Local communities have the most knowledge of their natural resources and have developed many approaches to ensure the conservation and sustainable management of natural resources. There are a number of examples of community management of natural resources in the Pacific such as Locally Managed Marine Areas (LMMAs)¹³⁹ which are based on traditional conservation methods and management of natural resources and customary systems such as *ra'ui* in the Cook Islands. Further detail is provided in Section 4.1.4 of this report.

¹³² Refer to Section 3.4 - Institutional and governance frameworks for WH in the Pacific region.

¹³³ As outlined in Section 2.1 of this report.

¹³⁴ More information at: <https://www.sprep.org/invasive-species-management-in-the-pacific/prismss>

¹³⁵ This commitment has recently been changed, with the revised aim to effectively manage at least 50% of marine resources and 30% of terrestrial resources by 2030. More information at: <http://themicronesiachallenge.blogspot.com/>.

¹³⁶ Information on all CROP agencies is outlined at: <https://www.forumsec.org/council-of-regional-organisations-of-the-Pacific/>.

¹³⁷ The Secretariat of the Pacific Community (SPC), formerly the South Pacific Commission, the Forum Fisheries Agency (FFA), the South Pacific Regional Environment Program (SPREP), the Pacific Islands Development Program (PIDP), the South Pacific Travel Organisation (SPTO), the University of the South Pacific (USP), the Pacific Aviation Safety Organisation, and the Pacific Power Association. The Pacific Islands Forum Secretariat acts as CROP's permanent chair and provides secretariat support.

¹³⁸ More information at: <https://www.iucn.org/theme/protected-areas/about>.

¹³⁹ More information at: <https://ipbes.net/policy-support/tools-instruments/locally-managed-marine-area#:~:text=A%20Locally%20Managed%20Marine%20Area,or%20are%20based%20in%20the>.

Taking stock: Overview of natural World Heritage sites and their conservation status

3



Island of Fatu Hiva, Marquesas Islands, French Polynesia © IUCN / Elena Osipova

3.1 Overview of WH in the region

3.1.1 Introduction

Table 3 below¹⁴⁰ outlines relevant details for natural, cultural and mixed WH sites, as well as the status of State Party ratification of the WH Convention, for the 23 Pacific Island Countries and Territories covered under this project¹⁴¹.

Table 3. Status of Natural, Cultural and Mixed WH sites in the countries and territories of the region¹⁴²

State Parties to the Convention	Convention status	Date listed	Inscribed WH sites	Site type	Area (ha)	Marine areas	Year of Inscription
American Samoa (United States)	R (USA)	7/12/1973	No WH site				
Cook Islands	R	16/1/2009	No WH site				
Federated States of Micronesia	Ac	22/7/2002	Nan Madol: Ceremonial Centre of Eastern Micronesia	C	77	No	2016
Fiji	R	21/11/1990	Levuka Historical Port Town	C	70	No	2013
French Polynesia (France)	R (France)	27/6/1975	Taputapuātea	C	2124	Yes	2017
			Te Henua Enata – The Marquesas Islands	CN	345,749	Yes	2024
Guam (United States)	R (USA)	7/12/1973	No WH site				
Kiribati	Ac	12/5/2000	Phoenix Islands Protected Area	N	40825000	Yes	2010
Marshall Islands	Ac	24/4/2002	Bikini Atoll Nuclear Test Site	C	73500	Yes	2010
Nauru	R	22/07/2024	No WH site				
New Caledonia (France)	R (France)	27/6/1975	Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems	N	1574300	Yes	2008
Niue	Ac	23/1/2001	No WH site				
Northern Mariana Islands (United States)	R (USA)	7/12/1973	No WH site				
Palau	Ac	11/6/2002	Rock Islands Southern Lagoon	CN	100200	Yes	2012
Papua New Guinea	Ac	28/7/1997	Kuk Early Agricultural Site	C	116	No	2008

¹⁴⁰ Table adapted from the draft Pacific Regional Action Plan for WH 2021-2025.

¹⁴¹ For the purposes of the WH Convention, the following territories are considered under the WH “umbrella” of the following countries:

New Caledonia; French Polynesia; and Wallis and Futuna (France)

American Samoa; Guam; Northern Mariana Islands (United States)

Pitcairn Island (UK)

Tokelau (NZ)

¹⁴² The information in this table is derived from the UNESCO WH Web Site at: <http://whc.unesco.org/en/list>.

State Parties to the Convention	Convention status	Date listed	Inscribed WH sites	Site type	Area (ha)	Marine areas	Year of Inscription
Pitcairn Islands (United Kingdom)	R (UK)	29/5/1984	Henderson Island	N	3700	No	1988
Samoa	Ac	28/8/2001	No WH site				
Solomon Islands	A	10/6/1992	East Rennell	N	37000 + marine area extending 3 nautical miles to sea	Yes	1998
Timor-Leste	R	31/10/ 2017	No WH site				
Tokelau (New Zealand)	R (NZ)	23/11/1984	No WH site				
Tonga	Ac	30/4/2004	No WH site				
Tuvalu	R	18/05/2023	No WH site				
Vanuatu	R	13/6/2002	Chief Roi Mata's Domain	C	888	No	2008
Wallis and Futuna (France)	R (France)	27/6/1975	No WH site				

Notes:

1. As of October 2024

2. R – Ratified; Ac – Accepted; A – Acceded; N – Not a signatory

3. C – Cultural site; N – Natural site; CN – Mixed site

3.1.2 Overview of WH sites in the wider Pacific region

The overview of WH sites in the wider Pacific region (limited to those most relevant in the Pacific Island context of this study), including those outside the focus area covered by this project, are shown in Figure 3. There are eight natural, four mixed and seven cultural WH sites in this broader region.

The numbered WH sites shown in Figure 3 in the broader Pacific region are outlined below. WH sites within the 23 PICTs covered by this report are indicated with an asterix (*).

Natural sites¹⁴³

- (1) Lord Howe Island Group (Australia)
- (2) (*) Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems (France/New Caledonia)
- (3) Lorentz National Park (Indonesia)
- (4) Ogasawara Islands (Japan)
- (5) (*) Phoenix Islands Protected Area (Kiribati)
- (6) (*) East Rennell (Solomon Islands)
- (7) Henderson Island (UK)
- (8) Hawaii Volcanoes National Park National Park (USA)

¹⁴³ Two other sites are in the broader region but are not shown in this figure nor considered in this report: Te Wahipounamu and Subantarctic Islands (NZ).

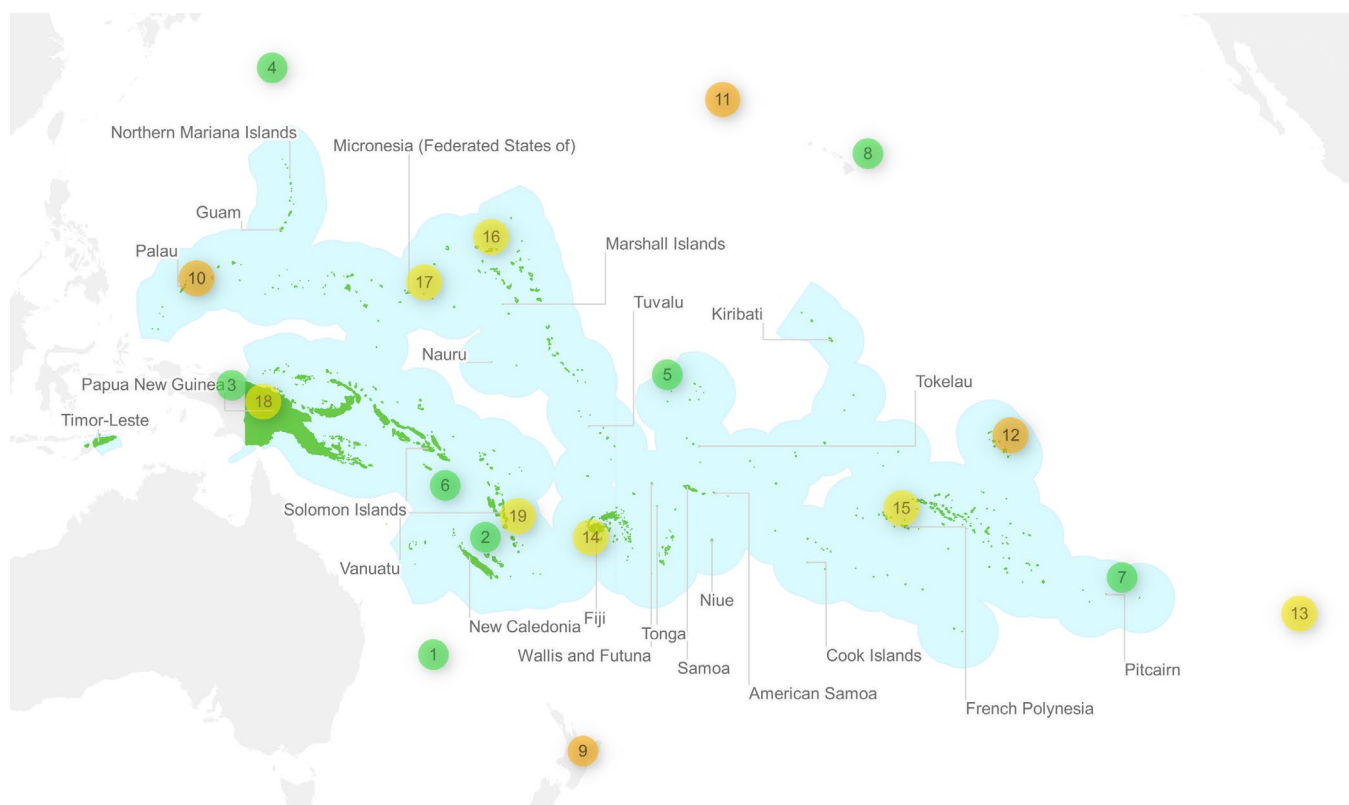


Figure 3. Overview of WH sites in the wider Pacific Island region (limited to those most relevant in the Pacific Island context of this study). This figure shows natural (green), mixed (orange) and cultural (yellow) WH sites in the Pacific region (as of October 2024). The land and sea areas of the 23 countries and territories covered by this report are indicated in green and blue respectively. Produced by Luca Battistella

Mixed WH sites and cultural landscapes

- (9) Tongariro National Park¹⁴⁴ (New Zealand)
- (10) (*) Rock Islands Southern Lagoon (Palau)
- (11) Papahānaumokuākea (USA)
- (12) (*) Te Henua Enata – The Marquesas Islands (France/French Polynesia)

Cultural WH sites

- (13) Rapa Nui National Park (Chile)
- (14) (*) Levuka Historical Port Town (Fiji)
- (15) (*) Taputapuātea (France/French Polynesia)
- (16) (*) Bikini Atoll Nuclear Test Site (Marshall Islands)
- (17) (*) Nan Madol: Ceremonial Centre of Eastern Micronesia (Federated States of Micronesia)
- (18) (*) Kuk Early Agricultural Site (Papua New Guinea)
- (19) (*) Chief Roi Mata's Domain (Vanuatu)

This report will focus on the following natural and mixed WH sites, which are described and reviewed in detail in Section 3.2¹⁴⁵ (Te Henua Enata – The Marquesas Islands was inscribed in 2024, and therefore not described in detail in this section):

Within the 23 focus PICTs of this report

- East Rennell
- Phoenix Islands Protected Area
- Rock Islands Southern Lagoon
- Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems

¹⁴⁴ In 1993, Tongariro became the first property to be inscribed on the World Heritage List under the revised criteria describing cultural landscapes.

¹⁴⁵ A number of these WH sites are outside the geographic scope of this report, as defined in Section 1.3, but they are included in Section 3.2, because of the similar issues faced by many of these sites and the potential lessons that can be derived from their experience. These include: Henderson Island; Papahānaumokuākea; Hawaii Volcanoes National Park; and Lord Howe Island Group.

Island WH sites in the Pacific which are relevant to this report, but are outside the 23 focus PICTs

- Henderson Island
- Papahānaumokuākea
- Hawaii Volcanoes National Park
- Lord Howe Island Group

3.1.3 Analysis of existing WH sites and implications for the future

The following observations can be made regarding WH in the 23 countries and territories covered under this project, based on a review of information in the above table, and responses to interviews for this project:

- Compared to other regions of the world, the Pacific region is very poorly represented on the WH List. It is a region where much greater attention to WH is warranted, at global, regional and national levels.
- Despite this current poor representation on the WH List, there are areas within the region which potentially could meet the criteria of “Outstanding Universal Value” under the WH Convention.
- Of the 14 independent Pacific countries that are State Parties to the WH Convention, 11 have joined the Convention since 2000.
- There are currently 11 WH sites in the 23 PICTs which are the focus of this report, comprising 6 cultural sites, 3 Natural sites and 2 Mixed sites (inscribed for both natural and cultural values) The 11th WH site (a mixed site inscribed in 2024 in French Polynesia is not focussed on within this report).
- There are several countries and territories in the 23 PICTs which do not have any WH sites.
- Two of the five natural and mixed sites are large and protect important marine values (PIPA and Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems). They were amongst the largest WH sites in the world at the time of inscription on the WH List. The majority of cultural WH sites are small and protected sites of significant cultural value for Pacific peoples and communities.
- The three natural WH sites¹⁴⁶ in the focus area are: (1) East Rennell, Solomon Islands¹⁴⁷; (2) Phoenix Islands Protected Area, Kiribati¹⁴⁸; and (3) Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems, France¹⁴⁹. The two mixed WH sites are the Rock Islands Southern Lagoon, Palau¹⁵⁰ and Te Henua Enata – The Marquesas Islands, France¹⁵¹. The description and analysis of key conservation issues for each site is outlined below in Section 3.2.
- The protection of the marine environment is the main focus for the Phoenix Islands Protected Area, the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems and the Rock Islands Southern Lagoon.
- Several existing cultural WH sites have been noted¹⁵² as having important natural values, such as Bikini Atoll which also protects marine ecosystems, as well as providing a powerful legacy regarding the environmental and human impact of nuclear testing in the Pacific. Whether these natural values within existing cultural sites may possibly meet the threshold of “Outstanding Universal Value” for natural WH sites under the WH Convention has not been ascertained but is unlikely.
- Several existing natural WH sites have also been noted¹⁵³ as having important cultural values, such as PIPA. Whether these cultural values may possibly meet the threshold of “Outstanding Universal Value” has not been ascertained.
- Tentative Lists for WH sites have been prepared for the majority of the States and Territories of the Pacific region and these are outlined and described in Section 5.1.2 of this report.

3.2 Description and strategic issues for natural WH sites in the Pacific region¹⁵⁴

This section describes strategic issues for each natural and mixed WH site in the region (with the exception of Te Henua Enata – The Marquesas Islands, which was inscribed in 2024). This section concludes with an analysis of issues at these sites and suggests implications for natural WH in the Pacific region. The following natural WH sites are described and assessed below, under the following headings: (a) Background and values; (b) Conservation challenges; and (c) Implications for natural and mixed WH in the Pacific region.

¹⁴⁶ Noting the focus of this project on natural WH.

¹⁴⁷ <https://whc.unesco.org/en/list/854>.

¹⁴⁸ <https://whc.unesco.org/en/list/1325>.

¹⁴⁹ <https://whc.unesco.org/en/list/1115>.

¹⁵⁰ <https://whc.unesco.org/en/list/1386>.

¹⁵¹ <https://whc.unesco.org/en/list/1707/>.

¹⁵² By expert reviewers consulted for this project.

¹⁵³ By expert reviewers consulted for this project.

¹⁵⁴ A number of these WH sites are outside the geographic scope of this report, as defined in Section 1.3, but they are included in this Section 3.2, because of the similar issues faced by many of these sites and the potential lessons that can be derived from their experience. These include Henderson Island; Papahānaumokuākea; Hawaii Volcanoes National Park; and Lord Howe Island.

WH sites within the 23 focus PICTs of this report

- East Rennell WH Site – Solomon Islands (Section 3.2.1).
- Phoenix Islands Protected Area (PIPA) – Kiribati (Section 3.2.2)
- Rock Islands Southern Lagoon – Palau (Section 3.2.3)
- Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems – France (Section 3.2.4)
- Te Henua Enata – The Marquesas Islands (not described in Section 3.2)

Island WH sites in the Pacific which are relevant to this report, but are outside the 23 focus PICTs

- Henderson Island – United Kingdom (Pitcairn Islands) (Section 3.2.5)
- Papahānaumokuākea – United States (Hawaii) (Section 3.2.6)
- Hawaii Volcanoes National Park – United States (Hawaii) (Section 3.2.7)
- Lord Howe Island Group – Australia (Section 3.2.8)

WH sites within the 23 focus PICTs of this report

3.2.1 East Rennell WH site – Solomon Islands



East Rennell World Heritage site on Rennell Island, Solomon Islands © IUCN / Paul Dingwall

Background and values

East Rennell (ER) makes up the southern third of Rennell Island, the southernmost island in the Solomon Island group in the western Pacific. The site includes approximately 37,000 ha and a marine area extending 3 nautical miles to sea. ER was inscribed on the WH List in 1998 under criterion (ix). The property has particular significance as the first natural property inscribed on the WH List under customary ownership and management.

The **UNESCO site description**¹⁵⁵ notes: “East Rennell makes up the southern third of Rennell Island, the southernmost island in the Solomon Island group in the western Pacific. Rennell, 86 km long x 15 km wide, is the largest raised coral atoll in the world. The site includes approximately 37,000 ha and a marine area extending 3 nautical miles to sea. A major feature of the island is Lake Tegano, which was the former lagoon on the atoll. The lake, the largest in the insular Pacific (15,500 ha), is brackish and contains many rugged limestone islands and endemic species. Rennell is mostly covered with dense forest, with a canopy averaging 20 m in height. Combined with the strong climatic effects of frequent cyclones, the site is a true natural laboratory for scientific study. The site is under customary land ownership and management”.

¹⁵⁵ More detail on this site, including the nomination and evaluation documents, and its statement of Outstanding Universal Value, is outlined at: <http://whc.unesco.org/en/list/854>.

Conservation challenges

There have been many challenges associated with East Rennell which have been discussed at numerous WH Committee meetings, including in 2013 when the WH Committee decided to inscribe East Rennell on the List of WH in Danger¹⁵⁶. The main conservation threats to the site which led to the Danger List decision included widespread large scale commercial logging and bauxite mining in West Rennell, adjoining the WH site, and unsustainable resource extraction within the property, including coconut crabs and other marine species, as well as threats from invasive species. It has been speculated that climate change also poses challenges to the site, in particular to Lake Tegano which is threatened by sea level rise and increased salinity, impacting on the livelihoods of local communities. Another key conservation challenge is the lack of a legal instrument to protect the property.

Unrealized expectations are a key issue at this site. At the time of inscription there was an expectation that there would be financial benefits to local communities through tourism associated with the natural WH site. This has yet to eventuate, and this has reinforced the problems and challenges at this site, leading to a loss of support and confidence in WH from the people in East Rennell living in and adjacent to the WH site. However, it is also noted that the benefits from tourism may come in the future with appropriate planning and support to the local communities. The WH site manager noted in discussions relating to this project: *"If I could go back to 1998¹⁵⁷ I would have ensured that all stakeholders were much more involved and that expectations had been more clearly established about what WH inscription actually means. At that time, they should have looked more carefully at how the site should be managed to meet WH requirements. At present there is a lot of confusion and finger pointing on all sides and in part this comes from unrealistic expectations"*.

Communities in neighbouring West Rennell, who did not participate in the WH process and inscription, commenced commercial logging of their forests, creating an income disparity with the eastern communities who opted to conserve their forest, lake and marine resources through the WH Convention. This disparity has exacerbated the concerns of local communities in the WH site.

The conservation outlook for this site has been assessed as "critical" in the latest assessment cycle¹⁵⁸ and further notes: *"Though the traditional owners have consistently confirmed their commitment to manage the East Rennell WH Site for its Outstanding Universal Value, since inscription there have been concerns about a) the practical modalities of sustaining customary land tenure and cooperative decision-making; b) lack of adequate legal protection; and c) the necessity for livelihood development in order to maintain local support for conservation. The wish of the local population of Lake Tegano is to improve their living conditions through sustainable activities. Additional support for sustainable livelihoods should urgently be provided to communities to ensure protection and management of the site"*.

There are a number of challenges for the management and protection of the site. There are extremely limited resources for site management and the site lacks official protection status. However, it is noted that a new Protected Areas Act is under development and it is anticipated that a PA Trust Fund will be established in 2022¹⁵⁹. The East Rennell WH site is not yet incorporated into the national protected area system and thus lacks formal government recognition. These challenges are compounded by a lack of on-ground enforcement. A 2016 Cabinet decision outlined the Government of the Solomon Islands' commitment to the site, but few practical actions resulted. A Desired State of Conservation (DSOCR) for this site was prepared in 2017, however few major milestones had been achieved by 2020¹⁶⁰.

The interview with the State Party representative regarding East Rennell highlighted several key issues, including:

- Customary ownership makes natural resource management decision-making challenging. The development of aspirations and needs of local communities must be considered while national and international conservation objectives should be met.
- Resources for site management are very limited: since inscription the support from the national government has been limited and there is no technical officer on site for on-ground activities. There has been no significant support for site management from the global and regional level although the small scale initiatives mentioned below have been welcome. A significant increase in external support is essential for the future viability of this WH site.
- The local politics in East Rennell is challenging, especially when dealing with pressures from the WH Committee on one side and issues and expectations from the ER Council of Chiefs on the other. There is often a disconnect between the Council of Chiefs and Honiara-based institutions and committees.
- There have been recent positive developments, including the UNDP Small Grants Programme supporting local livelihood community programmes and BirdLife International support for rat eradication, a pressing conservation issue for native species. However, the level of support is far less than required to ensure effective management of the site.

156 The full decision to inscribe this site on the List of WH in Danger is outlined at: <https://whc.unesco.org/en/decisions/4957/>.

157 The year of the inscription of East Rennell on the WH List.

158 From the 2020 IUCN WH Outlook for East Rennell more information at: <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/168242>.

159 More information at <https://solomons.gov.sb/protected-areas-trust-fund-set-to-be-ready-by-july-2022/>

160 <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/168242>.

- The 2019 IUCN/UNESCO Reactive Monitoring mission report was positive, the recommendations were useful. The Cabinet Paper was passed in 2017, which included the proposal to ban logging, this still stands: some of the other recommendations in the Mission Reports are being discussed. But with the COVID-19 pandemic, it is a lower priority than before, and priorities have been adjusted to address the impact of the virus.
- Even though there has been negligible funding for activities in the WHS, the local people in East Rennell still uphold and support the WH and want work to proceed on the ground. They face many challenges from their own people and also limited support from the government, but they want to maintain the programme and they want to have legislation for the site so it can be fully protected from development. Proposed activities in the GEF EREPA project¹⁶¹ includes a focus on the formal designation of the area as a PA and on communities accessing the national trust fund¹⁶², this may benefit the ER WH site.

Key issues raised by the WH Site Manager at East Rennell WHs include:

- There are very limited resources for site management, the management committee does not have an office nor basic equipment such as computers, printers and furniture. The committee has limited access to the internet. There is negligible funding for travel or meetings. Managing the site with very limited funding is an exceptionally difficult, if not impossible, task.
- A key challenge is that the site was inscribed in 1998, without any legal mechanism to protect the site at national and provincial levels, thus customary practices provide the only protection for the property. The Protected Areas Act is an important initiative to improve protection, but it must be backed up with resources. The level of resourcing from national and provincial Governments has been negligible.
- They are trying to work with the communities to address the issues that led to Danger Listing for the site, specifically logging and mining activities in Western Rennell. The negative conservation impacts of these activities are apparent. However, communities within the WH site can also see that mining and logging companies in Western Rennell elevate the standard of living through providing tangible support for local communities, such as improved homes, school fees for children and upgraded roads.
- Many local communities in East Rennell have not seen any positive changes as a result of WH listing and this has reduced the credibility of the WH site and the level of community support. There have been local discussions within some local communities regarding withdrawing land from WH designation.
- WH Missions and Partner Roundtables, such as in 2017, have been useful at the time for enabling dialogue for key stakeholders. However, they are of limited value unless followed with tangible support and action. In fact, these could have longer term negative effects if expectations established at the time of the mission/roundtable, and recommendations arising, are not followed up.

Climate change has negatively impacted food security on East Rennell, social services and the people's way of life. The negative impacts have resulted in poor local crop yields due to high sea levels and saltwater intrusion into people's gardening areas along the shoreline of Lake Tegano. These are essential issues that must be addressed.

Implications for natural and mixed WH in the Pacific region

The East Rennell issue highlights a number of key issues of relevance for natural and mixed WH¹⁶³ in the Pacific:

- The major long-term threat to the "Outstanding Universal Value" of the site is the lack of alternative income to commercial logging and mining coupled with ineffective enforcement of current legislation to protect the environment. There remains an urgent need to support local communities and mobilize resources to support management of the site.
- Local communities living in and adjacent to WH sites in the Pacific region, and in SIDS in general, need to benefit from WH listing, including through support for programmes supporting sustainable livelihoods, linked to protection and management of the site. As noted by the site manager: *"communities need to see tangible and timely benefits from the site, otherwise there is a risk that existing support, already greatly diminished will evaporate completely. Additional support for sustainable livelihoods should urgently be provided to communities to ensure protection and management of the site"*. As a result of not seeing tangible benefits, customary owners do not want to "give up their lands" (e.g. by making it a national park), while authorities/donors sometimes first wish to see such a commitment before providing support. It can be a "chicken or the egg" question, leading to deadlock.
- At a broad level, this highlights the need for a clear and realistic approach to natural WH in the Pacific which balances the protection of areas with high conservation value while at the same time addressing the essential sustainable development needs of local communities.

¹⁶¹ More information at: <https://www.thegef.org/projects-operations/projects/9846>.

¹⁶² More information at: <https://solomons.gov.sb/protected-areas-trust-fund-set-to-be-ready-by-july-2022/>.

¹⁶³ Although East Rennell is a natural WH sites, the issues also have implications for natural and mixed WH sites in the region.

- The economic benefits of WH need greater attention for the East Rennell WH site, and also for other natural WH sites in the region. Important elements include the need to: (a) support programmes which ensure that benefits flow directly to the communities – rather than flowing to other relatively expensive delivery mechanisms (such as through regional organisations and/or international NGOs); and (b) ensure simple mechanisms are available for the communities to access the funding. For example, current mechanisms such as the Kiwa Initiative¹⁶⁴ and BIOPAMA are too complicated for most (if not all) community committees or similar. The Live and Learn¹⁶⁵ led Nakau Payment for Ecosystem Services (PES) Project¹⁶⁶ is a good example of a project supporting local livelihoods while protecting rainforest and mangrove ecosystems.
- Clear and realistic expectations should be clarified during the consultation, consent and planning stages of the WH process (i.e. before the site is inscribed).
- The need for support for WH at national and provincial levels of Government and all stages of the process, and, most importantly, for local communities. It is also important to develop a workable way to combine both customary and common law.
- The need for a significant increase in financial support from the international community and UNESCO to address challenges faced at East Rennell.

3.2.2 Phoenix Islands Protected Area (PIPA) – Kiribati



Green sea turtle swimming around Kanton Island, Phoenix Islands Protected Area, Kiribati © Jim Stringer

Background and values¹⁶⁷

This site was inscribed on the WH List in 2010 under criteria (vii) and (ix). PIPA covers 408,250 sq.km of marine and terrestrial habitats in the Southern Pacific Ocean, accounting for 12% of the Kiribati Exclusive Economic Zone (EEZ). PIPA was fully closed to commercial fishing on January 1, 2015, with the exception of a designated subsistence fishing zone for the Kanton community. At the time of its inscription, PIPA was one of the largest marine WH sites in the world and Kiribati was considered a global leader in large scale marine conservation due to this initiative.

The UNESCO site description notes: “The Phoenix Island Protected Area (PIPA) is a 408,250 sq.km expanse of marine and terrestrial habitats in the Southern Pacific Ocean. The property encompasses the Phoenix Island Group, one of three island groups in Kiribati, and is the largest designated Marine Protected Area in the world¹⁶⁸. PIPA conserves one of the world’s largest intact oceanic coral archipelago ecosystems, together with 14 known underwater sea mounts (presumed to be extinct volcanoes) and other deep-

¹⁶⁴ More information at: <https://kiwainitiative.org/en/about-kiwa-initiative>.

¹⁶⁵ More information at: <https://livelearn.org/where>.

¹⁶⁶ More information at: <https://livelearn.org/projects/climate-resilient-by-nature/>.

¹⁶⁷ More detail on this site, including the nomination and evaluation documents, and the statement of Outstanding Universal Value for this WH site, is outlined at: <https://whc.unesco.org/en/list/1325>.

¹⁶⁸ This was the case at the time of inscription on the WH List. PIPA is currently listed as the 9th largest MPA, more information at: <https://mpatlas.org/>.

sea habitats. The area contains approximately 800 known species of fauna, including about 200 coral species, 500 fish species, 18 marine mammals and 44 bird species. The structure and functioning of PIPA's ecosystems illustrates its pristine nature and importance as a migration route and reservoir. This is the first site in Kiribati to be inscribed on the WH List".

The recent decision by the Government of Kiribati to consider opening up PIPA for commercial fishing (refer below) has significant implications for the future of this WH site, and for other marine WH sites (and MPAs) in the region and globally.

Conservation challenges

The 2020 IUCN WH Outlook Report for PIPA¹⁶⁹ noted the state of conservation "good with some concerns" while noting challenges from the increasing use of drifting fish aggregating devices. The report noted protection and management appeared adequate, with some important successes, such as the eradication of invasive species from some islands within PIPA as well as improvements in surveillance, monitoring and enforcement activities¹⁷⁰.

Sustainable financing has been a critical issue for PIPA, as is the case for all natural WH sites in the Pacific, and WH sites globally. The Government of Kiribati, with important support from NGOs and other partners¹⁷¹ established the PIPA Trust Fund as a financing mechanism to support the management of PIPA.

The important contributions of NGOs to the WH site, including Conservation International, New England Aquarium, Oceans 5 and the Waitt Foundation, have been a significant factor in the establishment and management of this WH site. However, it is noted that concerns have been expressed by some persons consulted through this project regarding the extent of "outside involvement" in the establishment and management of this WH site.

Funding is provided through the PIPA Trust to the relevant Government agency¹⁷² which is responsible for the management of PIPA. The PIPA Fund has so far raised approximately US\$7 million, which has been important in supporting the operations and management of PIPA. The model of the PIPA Trust Fund in generating finance to support the management of this large WH marine site is of considerable relevance for other marine WH sites in the Pacific and globally.

However, the Trust Fund has not been able to compensate Kiribati for the loss of fishing revenue which accounted for more than 70% of the total annual revenue of Kiribati, prior to the inscription of the WH site. There was an expectation when PIPA was inscribed that such compensation would be provided through a "reversed fishing license"¹⁷³ regime, using funding generated through the PIPA Trust Fund. It is understood the amount of lost revenue from reduced fishing licenses caused by PIPA was documented in a study prepared by SPC and others¹⁷⁴. One person interviewed for this project noted that *"one of the concerns that have been raised within Kiribati about the PIPA is the Trust Board is dominated by overseas organisations. This means that the decision-making power on funded activities are for all intents and purposes made outside the country (which could be perceived as conservation colonialism)"*. This is a perception however there has always been representation of the Government of Kiribati on the PIPA Board. Management decisions and actions are made by the PIPA operations/management unit which reports to the relevant Government Agency, the Ministry of Environment, Lands and Agricultural Development (MELAD)¹⁷⁵. These factors underline the importance of WH funding mechanisms having decision-making power resting in-country.

On 15 November 2021, the Government of Kiribati announced its decision¹⁷⁶ to *"uplift the closure of the PIPA for Sustainable Commercial Fisheries"*. Extracts from the official Government statement include *"The Government of Kiribati had decided to lift the closure and apply a Marine Spatial Planning (MSP) to sustainably use marine resources in the Phoenix Islands Protected Area (PIPA). The decision to proceed to close off PIPA as a "no take zone" was made on the assurances that a 'reversed fishing license' regime through the PIPA Trust will compensate revenue forgone... The closure of PIPA to commercial fishing activities or as a no take zone was finally realized in 2015.... It has been more than 10 years since its establishment and it is abundantly clear that the development policy logic at its inception.... will not be sufficient to meet the present need of the people of Kiribati now and the development needs of the country for the future. Congruent with blue economy principles, the Government of Kiribati has made an informed and*

169 More information at: <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/555512002>. This IUCN WH Outlook assessment was undertaken before the decision to open up PIPA for commercial fishing.

170 Personal communication with Tony O'Keeffe who noted comments made by Tukabu Teroroko, PIPA site manager, that surveillance, monitoring and enforcement has been a major component of PIPA management and that this work was reasonably well supported financially (internet-based fishing vessel tracking capacity, patrol boat to "give chase" if needed, fuel supplies, etc.).

171 Including Conservation International, the New England Aquarium, Oceans 5 and the Waitt Foundation.

172 Kiribati Ministry of Environment, Lands and Agriculture Developments (MELAD). <https://www.melad.gov.ki/>.

173 Reference to the reversed fishing license is outlined in: <https://www.seafoodsource.com/news/environment-sustainability/kiribati-government-says-mpa-implementation-cost-country-millions-in-revenue>.

174 This project was unable to obtain or review this report.

175 More information at: <https://www.melad.gov.ki/>.

176 The full Government statement is outlined at: <https://www.facebook.com/mfa.gov.ki/posts/1822815164582323>.

collective decision to sustainably develop our marine resources within the PIPA area that will favor both economic and conservation objectives....From its inception, the PIPA endowment fund, has so far raised approximately US\$7 million, and its interest have only been sufficient to support the operations and management of PIPA. It has not been able to deliver on the assurances of a “reverse fishing license” as it was originally intended to also deliver....”.

The implications of this decision for the WH status of PIPA will be a matter for the WH Committee, based on the advice of the IUCN, the Advisory Body for natural WH sites. It is anticipated that the advice of IUCN will be guided by the WH Operational Guidelines and also the 2020 IUCN World Conservation Congress resolution 66 on industrial fishing in MPAs¹⁷⁷, which calls on “*the Director General and the Commissions to provide guidance to countries to ensure that ‘industrial fishing’ is not being allowed in MPAs and OECMs (Other Effective Area-Based Conservation Measures) to the extent that it is not compatible with the conservation objectives and the management goals of these areas*”. This IUCN resolution on industrial fishing (Motion 66) provides further guidance on the issue of industrial fishing in relation to MPAs¹⁷⁸.

The implications of the decision for the future involvement of, and level of financial and other support from, NGO partners that have been closely involved with PIPA since its inception, is also unknown at this stage.

Implications for natural and mixed WH in the Pacific region

- The recent decision by the Government of Kiribati has significant implications for WH in the region and globally, particularly for marine WH sites. This represents an important case study for the future of the WH Convention, particularly in relation to Marine WH sites in SIDS.
- PIPA reinforces the importance of establishing clear expectations regarding WH in the Pacific, at all stages of the WH process, including nomination, inscription and management. As noted in the government statement, at the time of inscription there was an expectation in some quarters that funding generated through the PIPA Trust Fund would be able to compensate the Government for revenue foregone from commercial fishing through the establishment of the no-take zone. This expectation was unrealistic and should have been clearly articulated at the earliest stage of the nomination process.
- Notwithstanding this issue, the establishment of the PIPA Trust Fund and the fact that it was able to cover the operating expenses of the PIPA Trust and some of the management of the WH site, is a significant achievement with clear implications for the future sustainable financing of marine WH sites in the Pacific and globally. Innovative models for sustainable financing for WH, such as the PIPA Trust, are very important and need to be documented, communicated and, where possible, applied at other marine WH sites in the Pacific and globally. In moving forward from the current situation, it is important not to “throw the baby out with the bathwater” and, where possible, retain and continue to apply the positive elements associated with the PIPA Trust, including sustainable financing.
- PIPA has shown the important role that many NGOs can and do play in supporting conservation efforts and WH in the Pacific region. The initial development of the PIPA provided an outstanding example of best practice and collaboration between the Government of Kiribati, NGOs¹⁷⁹ and intergovernmental organisations¹⁸⁰.

¹⁷⁷ <https://www.iucncongress2020.org/motion/066>.

¹⁷⁸ In particular, the motion classifies all commercial trawlers, purse seine vessels, and large longlining as industrial vessels, as well as any large, profit-oriented vessels over 12 meters long and 6 meters wide. It exempts sustainable resource use by indigenous people, low-impact scientific research fishing, and sustainable commercial fishing that does not otherwise classify as industrial.

¹⁷⁹ Particularly the New England Aquarium and Conservation International.

¹⁸⁰ Particularly UNEP.

3.2.3 Rock Islands Southern Lagoon – Palau



Rock Islands Southern Lagoon, Palau © Stuart Chape

Background and values

This 100,200 ha. site was inscribed on the WH List in 2012 under criteria (iii), (v), (vii), (ix) and (x). The property has particular significance as the only mixed (natural and cultural) WH site inscribed within 23 focus PICTS of this report.

The UNESCO site description¹⁸¹ notes: *“The Rock Islands Southern Lagoon covers 100,200 ha and includes 445 uninhabited limestone islands of volcanic origin. Many of them display unique mushroom-like shapes in turquoise lagoons surrounded by coral reefs. The aesthetic beauty of the site is heightened by a complex reef system featuring over 385 coral species and different types of habitats. They sustain a large diversity of plants, birds and marine life including dugong and at least thirteen shark species. The site harbours the highest concentration of marine lakes anywhere, isolated bodies of seawater separated from the ocean by land barriers. They are among the islands’ distinctive features and sustain high endemism of populations which continue to yield new species discoveries. The remains of stonework villages, as well as burial sites and rock art, bear testimony to the organization of small island communities over some three millennia. The abandonment of the villages in the 17th and 18th centuries illustrates the consequences of climate change, population growth and subsistence behaviour on a society living in a marginal marine environment”.*

Conservation challenges

The 2020 IUCN WH Outlook for the Rock Islands¹⁸² notes the conservation outlook for this site has been assessed as “good with some concerns” in the latest assessment cycle and notes impacts from large numbers of visitors to certain areas within the property. Climate change is also a significant issue affecting the site, particularly coral bleaching events.

The protection and management status of the WH site is mostly effective. The IUCN World Heritage Outlook conservation outlook assessment for the site notes: “the legislative framework regulating use and management of the environment and its resources is comprehensive and clear but would benefit from improved implementation. There is also some room for improvement in education, enforcement, and involvement of local residents”.

The protection and management status of the WH site is mostly effective. The IUCN World Heritage Outlook conservation outlook assessment for the site notes: *“The legislative framework regulating use and management of the environment and its resources is comprehensive and clear but would benefit from improved implementation. There is also some room for improvement in education, enforcement, and involvement of local residents”.*

181 More detail on this site, including the nomination and evaluation documents, and its statement of Outstanding Universal Value, is outlined at: <http://whc.unesco.org/en/list/1386>.

182 More information at: <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/555547992>.

The Rock Islands Southern Lagoon (RISL) WH site provides an example of “best practice” in relation to natural and mixed WH sites, including in relation to sustainable financing. These include mechanisms for financing through the “Green Fee”¹⁸³ and the establishment of the Protected Areas Network (PAN)¹⁸⁴. The Palau “Green Fee” supports operating costs of designated PAN sites, both marine and terrestrial. For the whole Rock Islands WH site, there are two specific sites within this area that are designated PAN sites: (i) Ngerumekaol Spawning Area - a grouper spawning habitat; and (ii) Ngerukewid Wildlife Preserve – Palau’s oldest formally (as opposed to traditionally) established Marine Protected Area. These two PAN sites are eligible to receive support from the “Green Fee”. However, they make up a small percentage of the entire Rock Island Southern Lagoon (RISL) area. In short, the “Green Fee” does not directly benefit the whole RISL, but only the designated PAN sites within this area. The Koror State Government has been managing a large part of the RISL with their own money sourced from permit fees (e.g. US\$100 permit fee for Jelly Fish Lake). This Lake permit fee is paid in addition to the Palau PPEF¹⁸⁵. Key factors of success for the establishment and management of the Palau “Green Fee” and Palau PAN include: (i) strong and on-going donor support; (ii) a guaranteed, long term income stream, including through the “Green Fee”; (iii) effective governance based on a clear legislative and policy framework and the highest standards of financial transparency and accountability; and (iv) strong government support and commitment.

The interview with State Party representatives regarding the Rock Islands Southern Lagoon WH site highlighted a number of key issues, including:

- The good co-operation between different levels of government (State of Koror and National), with Koror State responsible for site management and the Palau national government responsible for WH nomination and inscription aspects as well as representing Palau at WH Committee meetings. The Bureau of Cultural and Historic Preservation is the national focal point for WH and plays an important role in supporting linkages between the national and state governments and in supporting fund raising initiatives.
- There is still limited awareness and appreciation within the general community of the significance of having a WH site in Palau. More can and should be done to promote the benefits and values of WH and the Rock Islands Southern Lagoon WH site.
- There are two different funding sources for the WH site – the visitor fee which goes straight to Koror State and the “Green Fee” which is paid by visitors to Palau which supports protected areas in Palau, including the Rock Islands Southern Lagoon WH site. Of the two funding sources, the first one which goes directly to Koror State is the Jellyfish Lake permit fee for US\$100/person. The second one is the “Green Fee” which supports only PAN sites, which includes one site (i.e. Ngerumekaol Spawning Area) in the Rock Islands.
- There has been a significant reduction in the number of visitors to the site since the COVID-19 pandemic and this has reduced funding for the site. There are limited alternative funding mechanisms. Conversely, having less visitors has meant reduced environmental impacts on key sites within the WH site.
- There is a clear and effective management plan for the WH site and the third edition of the management plan for the property has been developed with support from The Nature Conservancy (TNC) and is near approval.

Implications for natural and mixed WH in the Pacific region

The Rock Islands Southern Lagoon WH site is a success story in the Pacific and lessons learnt should be distilled and widely communicated within the region. In particular, the approaches for linking different levels of government and also linking nature and culture have “worked” and this is of relevance for other PICTs and Timor-Leste considering the establishment of WH sites. The example of the “Green Fee” and the Palau Protected Areas Network Fund are also highly relevant examples of sustainable financing for WH, which support both the Rocks Islands WH site and conservation generally in Palau. Strong political leadership, including from former President Thomas (Tommy) Remengesau Jr has also been particularly important for the success of the RI WH site in Palau. The experience of Palau with natural World Heritage, and with conservation generally, should be communicated within the Pacific region and more widely.

183 More information at: <https://www.abc.net.au/radio-australia/programs/pacificbeat/industry-pushback-on-palaus-fee-for-environmental-protection/11743290>.

184 More information at: <https://pacificdata.org/data/dataset/protected-areas-network-pan5381eb10-d781-43a4-8176-f6b9490ba84e>.

185 Palau Pristine Paradise Environmental Fee.

3.2.4 Lagoons of New Caledonia: reef diversity and associated ecosystems – France



Upi Bay, Iles des Pins, New Caledonia © Stuart Chape

Background and values¹⁸⁶

This 1,574,300 ha site was inscribed on the WH List in 2008 under criteria (vii), (ix) and (x).

The UNESCO site description notes: *“This serial site comprises six marine clusters that represent the main diversity of coral reefs and associated ecosystems in the French Pacific Ocean archipelago of New Caledonia and one of the three most extensive reef systems in the world. These Lagoons are of exceptional natural beauty. They feature an exceptional diversity of coral and fish species and a continuum of habitats from mangroves to seagrasses with the world’s most diverse concentration of reef structures. The Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems display intact ecosystems, with healthy populations of large predators, and a great number and diversity of big fish. They provide habitat to a number of emblematic or threatened marine species such as turtles, whales or dugongs whose population is one of the largest in the world”*¹⁸⁷.

The New Caledonia “Conservatory of Natural Areas” serves as a focal point for all matters related to WH and ensures coordination between the relevant levels of government: national and provincial (North and South Province), as well as coordination with and through local management committees. These independent committees are set up across New Caledonia to ensure effective input from local communities to the WH site. These provide day-to-day information to the provinces responsible for decision making. The property is currently protected by fisheries legislation, which is being further improved, and co-management arrangements with all local communities have been developed and management plans prepared with full involvement of stakeholders.

Conservation challenges

Issues noted at this property through the 2011 IUCN Reactive Monitoring mission¹⁸⁸ and 2014 Periodic Report from the State Party¹⁸⁹ include:

- The importance of addressing impacts on the property from activities outside the property, including from fishing, mining, and agriculture, through effective management, surveillance and monitoring.
- The need to ensure co-management committees¹⁹⁰ are working effectively in line with established management plans. Each co-management committee has a management plan, there are currently under review.

¹⁸⁶ More detail on this site, including the nomination and evaluation documents, and its statement of Outstanding Universal Value, is outlined at: <https://whc.unesco.org/en/list/1115>.

¹⁸⁷ <https://whc.unesco.org/en/list/1115/>.

¹⁸⁸ <http://whc.unesco.org/en/soc/326>.

¹⁸⁹ <http://whc.unesco.org/en/list/1115/documents/>.

¹⁹⁰ Established for most components or their subzones within the WH site.

- The need to address climate change impacts throughout the site including through developing and implementing strategies to build coral reef resilience.
- The need to proactively manage tourism at the WH site to ensure it is well planned and managed to ensure sustainable benefits while ensuring WH values are protected.
- The need to develop sustainable financing strategies to ensure the necessary equipment, human and financial resources for the long-term management of the property.

The interview for this project with State Party representatives regarding the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems highlighted a number of key issues, including:

- The WH site is a serial natural WH site, and different components are managed by different provinces in New Caledonia. Management is complex but is based on a coordinated and well understood approach. There are management plans for each component of the WH site. Other supplementary plans, such as for invasive species and waste management, have been developed to address these issues throughout the WH site.
- The WH site has a focus on participatory management to ensure effective involvement of local communities, however implementation can be challenging. One of the interviewees noted: *“The cultural approaches of local communities are different than government approaches. It makes local community involvement and managing the site very challenging. Local communities are involved in management, but there are issues and conflicts”*.
- Inscription in July 2010 was a catalyst for improved management of the WH site. It stimulated the establishment of management committees and the development of action plans for each area, which has strengthened management and capacity. It has also supported and accelerated the development of a range of other positive initiatives, such as the formation of a scientific committee and implementation of rapid biodiversity assessments to identify and clarify priority species and ecosystems, to guide conservation action within the WH site.
- Lack of capacity is an issue and is being addressed, within the constraints of available resources. However, there is a need for much more training and support to WH site managers in New Caledonia.
- More financial resources are required and support from the UNESCO WH Centre and Committee, which has been non-existent to date, would be appreciated.
- Communication and awareness of WH needs to be improved, particularly among local communities, many of which have limited awareness of the WH site.
- Linkages need to be developed with other French Territories in the Pacific in relation to WH.

Implications for natural and mixed WH in the Pacific region

Some of the implications of the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems for natural and mixed WH in the Pacific region include:

- The WH site is recognized as being a well-managed WH site which could provide lessons for the establishment and management of other existing and potential natural WH sites in the region.
- Inscription of this site was a catalyst for improved management of the WH site. As noted by representatives interviewed, inscription strengthened management and capacity, and accelerated the development of a range of other positive initiatives. This site demonstrates how WH designation can be a catalyst and stimulus for lifting the standard of conservation management *“across the board”*.
- This WH site is a serial site¹⁹¹ which may provide lessons for other areas which may be proposed as serial WH in the Pacific region in the future.
- Several expert reviewers noted the potential for a transboundary coral reef WH site between the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems WH site and other coral reef sites in the Coral Sea region, including in Solomon Islands and Papua New Guinea.

¹⁹¹ A serial site is defined under Sections 137-139 of the WH Operational Guidelines, which note, inter alia, (137) “Nominated serial property includes two or more component parts related by clearly defined links: (a) Component parts should reflect cultural, social or functional links over time that provide, where relevant, landscape, ecological, evolutionary or habitat connectivity. (b) Each component part should contribute to the Outstanding Universal Value of the nominated property as a whole... (139) A serial nominated property may occur: (a) on the territory of a single State Party (nominated serial national property); or (b) within the territory of different States Parties, which need not be contiguous...”. More details are outlined in Sections 137-139 of the Operation Guidelines at: <https://whc.unesco.org/en/guidelines/>.

Island WH sites in the Pacific which are relevant to this report, but are outside the 23 focus PICTs

3.2.5 Henderson Island – United Kingdom (Pitcairn Islands)



Henderson Island © Jack Whitelegg

Background and values¹⁹²

This 3,700 ha site was inscribed on the WH List in 1988 under criteria (vii) and (x). The Pitcairn Islands group is a British Overseas Territory. The WH site comprises the islands of Pitcairn, Henderson, Ducie and Oeno.

The UNESCO site description notes, *inter alia*: “Henderson Island is one of the world’s best remaining examples of an elevated coral atoll ecosystem. It exhibits remarkable biological diversity given the island’s size, with four endemic species of land birds, ten taxa of endemic vascular plants and large breeding seabird colonies. It is of Outstanding Universal Value due to the comparatively low level of disturbance which provides a key for baseline information on similar atolls, and its isolation makes it ideal for studying the dynamics of island evolution and natural selection”.

Conservation challenges

Henderson island is remote and inaccessible, which has contributed to its generally high environmental condition. Key issues affecting the integrity of the site¹⁹³ are the need for strengthening the site’s legal status and to ensure effective implementation of the management plan. Invasive alien species pose the greatest threat to the property, including the impact of Polynesian Rats on native bird populations. The challenge of preventing new introductions is one of the greatest ongoing threats to the property. Unfortunately, the island also receives large amounts of marine debris and waste that accumulates on its shorelines.

Implications for natural and mixed WH in the Pacific region

The isolation of this site has contributed to a high level of integrity. The relatively low level of disturbance provides a key for baseline information on similar atolls, and its isolation makes it ideal for studying the dynamics of island evolution and natural selection. This site also highlights the severe impacts of plastic pollution.

¹⁹² More detail on this site, including the nomination and evaluation documents, and its statement of Outstanding Universal Value, is outlined at: <https://whc.unesco.org/en/list/487>.

¹⁹³ From UNESCO WHC report for Henderson Island. <http://whc.unesco.org/en/list/487>.

3.2.6 Papahānaumokuākea – United States of America



Reef Fish in Papahānaumokuākea Marine National Monument © USFWS-Pacific Region

Background and values

This 36,207,499 ha site was inscribed on the WH List in 2010 under criteria (iii), (vi), (viii), (ix) and (x). The property has particular significance as one of the few mixed (natural and cultural) WH sites inscribed in the Pacific region.

The UNESCO site description¹⁹⁴ notes: “Papahānaumokuākea is a vast and isolated linear cluster of small, low-lying islands and atolls, with their surrounding ocean, roughly 250 km to the northwest of the main Hawaiian Archipelago and extending over some 1931 km. The area has deep cosmological and traditional significance for living Native Hawaiian culture, as an ancestral environment, as an embodiment of the Hawaiian concept of kinship between people and the natural world, and as the place where it is believed that life originates and to where the spirits return after death. On two of the islands, Nihoa and Makumanamana, there are archaeological remains relating to pre-European settlement and use. Much of the monument is made up of pelagic and deep-water habitats, with notable features such as seamounts and submerged banks, extensive coral reefs and lagoons. It is one of the largest marine protected areas (MPAs) in the world”.

Conservation challenges

The 2020 IUCN WH Outlook conservation outlook assessment for Papahānaumokuākea¹⁹⁵ notes the “WH values and other biodiversity values have remained stable overall since inscription and Papahānaumokuākea staff are engaging in effective management to reduce those local threats which it can mitigate and to preserve those conservation values which make the site internationally unique”. The site is remote and direct threats to the site are generally minor. The highest potential threats to the site come from external impacts, such as climate change, invasive species and marine debris, issues which are common to all the Pacific Island WH sites.

Papahānaumokuākea is a highly protected area established through Presidential Proclamation in 2006, which added to preexisting state, federal and international legal mandates¹⁹⁶. The multiple layers of Federal and State legislation and regulation protect the site’s natural heritage and also its cultural heritage. In 2017, the Office of Hawaiian Affairs (OHA) became the 4th Co-Trustee thus the site is managed by two federal agencies, a State of Hawaii Department and OHA, the entity that represents the views of the Native Hawaiians. The multiple jurisdictions have created a complex institutional environment for management of the property, but management planning and intervention practices appear to be working. The three management Agencies for the property are the US Fish and Wildlife Service, National Oceanic and Atmospheric Administration and the State of Hawaii Department of Land and Natural Resources.

194 More detail on this site, including the nomination and evaluation documents, and its statement of Outstanding Universal Value, is outlined at: <http://whc.unesco.org/en/list/1326>.

195 <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/555512001>.

196 More information at: <https://whc.unesco.org/en/list/1326/>

Key issues raised by the site manager at the Papahānaumokuākea WH site, in consultations for this project, include:

- The islands and atolls of the WH site are remote from the main Hawaiian Islands. Travel to these remote islands is challenging and expensive and this is an important issue for WH site management.
- Climate change and building resilience for key habitats for several species that breed, rest and nest in these low-lying islands is a key challenge. This will require a more holistic approach across the system and prioritizing habitats that are most critical. A climate resilience plan is under development to address these issues. In addition, species have been translocated between islands throughout the Hawaiian archipelago to enhance their likelihood of long-term survival¹⁹⁷.
- Marine debris is a major issue and poses significant threat to wildlife, efforts are underway to address this problem with support from an NGO¹⁹⁸.
- Invasive species (both terrestrial and marine) have been and continue to be a management challenge.
- UNESCO WH sites are not well understood as a designation across most of the US. They are not celebrated and in fact often there is confusion as to what this designation means.
- The value and importance of the UNESCO WH Marine Managers network to build capacity and encourage networking across WH sites. The site manager noted the willingness of Papahānaumokuākea to partner with and support other Pacific WH sites in Oceania. The manager also notes a willingness and past experience in assisting with WH site nominations.

Implications for natural and mixed WH in the Pacific region

Some of the implications of Papahānaumokuākea for natural and mixed WH in the Pacific region include:

- Papahānaumokuākea is much better resourced and managed than other natural WH sites in PICTs. However many issues are common, including climate change, invasive species management and eradication, marine debris and limited awareness of WH.
- The challenge of remoteness for Papahānaumokuākea is an issue for many Pacific natural WH sites, particularly marine WH sites.
- The willingness of Papahānaumokuākea to partner with other Pacific WH sites in Oceania is also significant, noting that there has been existing collaboration with PIPA.
- The issue of “marine debris” is mainly a plastic waste problem and is part of a much wider international problem that affects all coastal WH properties in the Pacific and elsewhere.

¹⁹⁷ Personal communication with Athline Clark.

¹⁹⁸ Papahānaumokuākea Marine Debris Project. <https://www.pmdphawaii.org/>.

3.2.7 Hawaii Volcanoes National Park – United States of America



Hawaii Volcanoes National Park, United States of America. © IUCN Elena Osipova

Background and values

This 87,940 ha site was inscribed on the WH List in 1987 under criteria (viii). The property has particular significance as the only WH site inscribed solely under geological criteria in the Pacific region. Re-nomination of this WH site to add biodiversity criteria has been mentioned as an option in the past to better reflect the full set of values represented by this WH site¹⁹⁹. The Hawaii Volcanoes WH site also has very important cultural values and may have potential WH for both biodiversity and cultural values²⁰⁰.

The UNESCO site description for the *Hawaii Volcanoes National Park*²⁰¹ notes: “*This site contains two of the most active volcanoes in the world, Mauna Loa (4,170 m high) and Kilauea (1,250 m high), both of which tower over the Pacific Ocean. Volcanic eruptions have created a constantly changing landscape, and the lava flows reveal surprising geological formations. Rare birds and endemic species can be found there, as well as forests of giant ferns*”.

Conservation challenges

The 2020 IUCN WH Outlook conservation outlook assessment for Hawaii Volcanoes National Park²⁰² notes a positive conservation status for this site, reflecting comprehensive protection and management programmes, and an established and credible applied research and education program. The Outlook also notes the Park enjoys a reputation for several major successes in invasive species control, species recovery, and ecosystem restoration.

Key issues raised by the site manager at the Hawaii Volcanoes National Park WH site include:

- Managing visitation to a highly dynamic landscape is a major challenge.
- The need for increased capacity to ensure more effective long-term planning and better involvement with the community and tourism sector.

Implications for natural and mixed WH in the Pacific region

Some of the implications of the Hawaii Volcanoes National Park for natural and mixed WH in the Pacific region include:

- The Hawaii Volcanoes WH site is much better resourced and managed than natural WH sites in Pacific SIDS. However, many issues are common, including climate change, and limited awareness of WH.
- The experience of visitor management in the Hawaii Volcanoes National Park may be useful for other natural WH sites in the Pacific region, particularly in the development of post-COVID development strategies linking natural WH and tourism.

¹⁹⁹ Bertzky et al., 2013.

²⁰⁰ Personal communication with Athline Clark.

²⁰¹ More detail on this site, including the nomination and evaluation documents, and the statement of “Outstanding Universal Value” for this WH site, is outlined at: <http://whc.unesco.org/en/list/409>.

²⁰² <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/18337>.

3.2.8 Lord Howe Island Group – Australia



Lord Howe Island Group, Australia © Franz Venhaus

Background and values

This 146,300 ha site was inscribed on the WH List in 1982 under criterion (vii) and (x).

The UNESCO site description²⁰³ notes: “The Lord Howe Island Group is an outstanding example of oceanic islands of volcanic origin containing a unique biota of plants and animals, as well as the world’s most southerly true coral reef. It is an area of spectacular and scenic landscapes encapsulated within a small land area, and provides important breeding grounds for colonies of seabirds as well as significant natural habitat for the conservation of threatened species. Iconic species include endemics such as the flightless Lord Howe Woodhen (*Gallirallus sylvestris*), once regarded as one of the rarest birds in the world, and the Lord Howe Island Phasmid (*Dryococelus australis*), the world’s largest stick insect that was feared extinct until its rediscovery on Balls Pyramid”.

Conservation challenges

The 2020 IUCN WH Outlook conservation outlook assessment for the Lord Howe Island Group²⁰⁴ notes the conservation outlook for this site has been assessed as “good” in the latest assessment cycle. Further that good management is in place, providing resourcing and commitment to address the key threats to World Heritage values. If this is sustained, the values should be preserved. The outstanding scenic values are likely to remain in good condition and, as a result of funding and ongoing implementation of the 2019 Rodent Eradication Project, significant natural habitat, rare plants and threatened wildlife are likely to persist in their current, or an improved, condition. It is crucial that invasive species eradication and incursion prevention projects continue to be implemented, in order to protect the successful investment to date. Threats from climate change and rising oceanic temperatures, as well as increasing impacts from marine debris, require national and international action in order to reduce impacts to some values and in particular to the marine environment.

Implications for natural and mixed WH in the Pacific region

Some of the implications of the Lord Howe Island Group for natural and mixed WH in the Pacific region include:

- The Lord Howe Island Group is much better resourced and managed than natural WH sites in Pacific SIDs. However, many issues are common, including climate change, and the management of invasive species.
- The experience of invasive species management, including the 2019 Rodent Eradication Project, may be useful for other natural WH sites in the Pacific region, and has great potential to link with the SPREP Invasive Species Programme.
- Tourism is effectively managed on the Lord Howe island Group, in a manner that ensures WH values are protected while providing quality visitor experiences. There may be useful lessons from the Lord Howe Island Group that could be distilled and communicated for other Pacific Island WH sites in relation to tourism and WH management.

203 More detail on this site, including the nomination and evaluation documents, and its statement of Outstanding Universal Value, is outlined at: <https://whc.unesco.org/en/list/186>.

204 More information at: <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/5001#:~:text=The%20conservation%20outlook%20for%20this,in%20the%20latest%20assessment%20cycle>.

3.3 Bigger picture for natural and mixed WH in the wider Pacific region

This section provides a brief overview of a selection²⁰⁵ of natural WH sites in the wider Pacific (limited to those most relevant in the Pacific Island context of this study), beyond the 23 PICTs and the other island WH sites covered above. These additional WH properties are shown in Table 4.

Table 4. The additional WH sites in the wider Pacific beyond the 23 PICTs

State Party	Site	Type	Criteria	Area (ha)	Marine areas	Year of inscription (extension)
Indonesia	Lorentz National Park	Natural	(viii)(ix)(x)	2,350,000	No	1999
Japan	Ogasawara Islands	Natural	(ix)	7,939	Yes	2011
New Zealand	Tongariro National Park	Mixed	(vi)(vii)(viii) (and a Cultural Landscape)	79,596	No	1990 (1993)

It is noted that the two natural WH sites in Hawaii (Hawaii Volcanoes National Park National Park and Papahānaumokuākea) were covered in Section 3.2.

The main values and conservation issues for natural WH sites in the wider Pacific region are shown in Table 5. This information draws from the IUCN World Heritage Outlook, the UNESCO WH website and other available material, as referenced:

Table 5. Main values and conservation issues for natural WH sites in the broader Pacific region

WH site	Key values	Conservation issues
Lorentz National Park (Papua Province, Indonesia)	Lorentz National Park (2.35 million ha) ²⁰⁶ is the largest protected area in South-East Asia and stretches for over 150 km from Papua's central cordillera mountains in the north to the Arafura Sea in the south. It is the only protected area in the world to incorporate a continuous, intact transect from snowcap to tropical marine environment, including extensive lowland wetlands. Located at the meeting-point of two colliding continental plates, the area has a complex geology with ongoing mountain formation as well as major sculpting by glaciation. The area also contains fossil sites which provide evidence of the evolution of life on New Guinea, a high level of endemism and the highest level of biodiversity in the region.	The IUCN WH Outlook conservation outlook assessment for this property ²⁰⁷ notes the remoteness and extreme topography of much of the WH site provides a level of natural protection. However, the tract of alpine/sub-alpine and montane landscape stretching along the central cordillera is vulnerable and under immediate threat, including from road construction, illegal logging and hunting of certain species. The Report notes that management is ill-prepared to deal with these threats, including ineffective engagement with the customary owners of the park and lack of field presence.
Ogasawara Islands (Japan)	The property ²⁰⁸ numbers more than 30 islands clustered in three groups and covers surface area of 7,939 hectares. The islands offer a variety of landscapes and are home to a wealth of fauna, including the Bonin Flying Fox, a critically endangered bat, and 195 endangered bird species. Four-hundred and forty-one native plant taxa have been documented on the islands whose waters support numerous species of fish, cetaceans and corals. Ogasawara Islands' ecosystems reflect a range of evolutionary processes illustrated through its assemblage of plant species from both southeast and northwest Asia, alongside many endemic species.	The IUCN WH Outlook conservation outlook assessment for this property ²⁰⁹ notes the Outstanding Universal Values of the site – high plant and land snail diversity with high levels of endemism and ongoing evolutionary processes – have been relatively well preserved to date. However, invasive alien species pose a threat and exiting control efforts need to continue and be expanded. Increased visitation, establishment of air services to the islands, and impacts from climate change are the other main potential threats. The IUCN Report also notes funding is currently not sufficient to sustain effective long-term invasive species control programmes

²⁰⁵ It is not feasible to include all natural and mixed WH sites in the wider region. However, the sites selected were considered important by the Project Team for this project in view of the potential for identifying lessons of value for WH sites in the PICTs covered directly by this report.

²⁰⁶ <http://whc.unesco.org/en/list/955>.

²⁰⁷ <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/198298>.

²⁰⁸ More detail on this site, including the nomination and evaluation documents, and its statement of Outstanding Universal Value, is outlined at: <http://whc.unesco.org/en/list/1362>.

²⁰⁹ <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/555542336>.

WH site	Key values	Conservation issues
Tongariro National Park (New Zealand)	In 1993 Tongariro became the first property to be inscribed on the WH List under the revised criteria describing cultural landscapes ²¹⁰ . The mountains at the heart of the park have cultural and religious significance for the Maori people and symbolize the spiritual links between this community and its environment. The park has active and extinct volcanoes, a diverse range of ecosystems and some spectacular landscapes	The IUCN WH Outlook conservation outlook assessment for this property ²¹¹ notes the conservation outlook for the site is good. The outstanding universal value of this site benefits from strong and effective legal, institutional and management regimes. Management is guided by a comprehensive management plan, is resourced in terms of finance and staffing, and has the support of key stakeholders. There is close collaboration with local indigenous communities but increasing concern is being expressed by them and interest groups that the management plan and its policies do not adequately protect their assessment of environmental and cultural values. Considering that Tongariro National Park is listed for criterion viii, highlighting “active volcanic processes”, eruptions and the natural processes are seen as adding to the geological value and associated scientific interest in the site.

The focus of this report is on natural and mixed sites in the Pacific region, however it is important to note there are a number of important cultural WH sites in the Pacific region, including:

- Rapa Nui National Park (Chile)
- Levuka Historical Port Town (Fiji)
- Taputapuātea (France/French Polynesia)
- Bikini Atoll Nuclear Test Site (Marshall Islands)
- Nan Madol: Ceremonial Centre of Eastern Micronesia (FSM)
- Kuk Early Agricultural Site (PNG)
- Chief Roi Mata's Domain (Vanuatu)

A number of these WH cultural sites have important natural values, including some islands within the Bikini Atoll Nuclear Test Site and in Taputapuātea. However, as previously noted, it is likely that these values are not at the level necessary to demonstrate OUV for natural sites under the WH Convention. All parties interviewed noted the importance of cultural heritage in the Pacific and the need for nature and culture to be considered together and better linked in the region. Linkages between nature and culture in the Pacific region, including in relation to WH Cultural Landscapes, is further elaborated in Section 4.1.6 of this report.

Implications for natural and mixed WH in the Pacific region

There are a number of observations and implications from the above review of WH sites outside the region, as well as from cultural WH sites in the region, including:

- The majority of these sites outside the region face similar issues to those within the Pacific region, such as the impacts of climate change and invasive species.
- However, the major difference is that WH sites in the broader region, largely within developed countries, are significantly better resourced than Pacific Island WH sites within the project area. This underlines the need for increased investment in Pacific Island WH sites if they are to be viable and to succeed. In many cases the level of investment is relatively small compared with the conservation and socio-economic benefits.
- There is potential for sharing experience and expertise on natural and mixed WH between countries in the broader region and Pacific Island WH sites and opportunities should be identified and explored. There are also examples where this has happened in the past with successful results, such as between Papahānaumokuākea and the Phoenix Island Protected Area. Papahānaumokuākea also has a partnership agreement with Rapa Nui (Chile).
- Those interviewed for this project noted the importance of better linkage between natural and cultural WH and also the potential for wider application of the WH Cultural Landscape (CL) approach. The experience of Tongariro, as the first designated CL in the world, is particularly relevant and opportunities for sharing experience and lessons with Pacific Island WH sites should be explored. A text Box on Cultural Landscapes is included in Section 4.1.6 of this report.

²¹⁰ More detail on this site, including the nomination and evaluation documents, and its statement of Outstanding Universal Value, is outlined at: <http://whc.unesco.org/en/list/421>.

²¹¹ <https://worldheritageoutlook.iucn.org/explore-sites/wdpaid/26649>.

3.4 Institutional and governance frameworks for WH in the Pacific region

The institutional framework for WH and heritage conservation at regional, national and local levels will be outlined in this section: current institutional capacities, key gaps and capacity development needs are outlined.

Global level governance of natural and mixed WH in the Pacific region

3.4.1 UNESCO WH Convention

The global framework for WH is provided through the WH Convention²¹². The Convention is guided by five Strategic Objectives referred to as the “5Cs”, as outlined in Box 8, below. These Strategic Objectives are relevant for natural and mixed WH in the Pacific, particularly the strategic objective relating to the fifth C — Communities, given that land and water resources in PICTs are traditionally owned and any development of conservation initiatives, such as WH, must be undertaken with and through local communities.

Box 8. The “5Cs” of the UNESCO WH Convention

Credibility

Strengthen the Credibility of the WH List, as a representative and geographically balanced testimony of cultural and natural properties of outstanding universal value.

Conservation

Ensure the effective Conservation of WH properties.

Capacity-building

Promote the development of effective Capacity-building measures, including assistance for preparing the nomination of properties to the WH List, understanding and implementing the WH Convention and related instruments.

Communication

Increase public awareness, involvement and support for WH through communication.

Communities

Enhance the role of communities in the implementation of the WH Convention.

Source : <https://whc.unesco.org/en/convention/>

The WH Committee has identified WH in Small Island Developing States (SIDS)²¹³ as a priority. PICs addressed in this project are all classified as SIDS. The 29th session of the WH Committee in 2005 adopted the World Heritage Programme for SIDS²¹⁴ (Decision 29 COM 5B), and the SIDS have since become a point of focus for WH identification and protection. The UNESCO SIDS Programme develops WH activities in these areas, providing support for new nominations to the WH List, training and sustainable conservation and management practices for sites already inscribed. While this has been greatly valued, the level of support is not sufficient for the identification, nomination or management of natural WH sites in the Pacific region. Some consulted for this project noted there is a lack of understanding and awareness about the needs (and their urgency) of the Pacific on the part of UNESCO and that the Pacific has a low political priority within the organisation. It was also noted that, despite dedicated SIDS programmes, UNESCO has provided no real large-scale support or set up long term conservation mechanisms for existing WH sites in the Pacific region.

A number of PICs are signatories to the WH Convention; however, their direct involvement in the key policy making body for the Convention, the WH Committee, has been limited. New Zealand was the Chair of the WH Committee in 2007, under the leadership of Maori High Chief Sir Tumu Te Heuheu Tukino VIII, and the leadership and mana²¹⁵ of the High Chief played a major role in developing the 2007 “Pacific Appeal” (arising from a meeting in Tongariro) which set the framework for greater engagement of PICTs with the WH Convention. The Appeal was useful at the time for raising awareness of WH but was not followed up nor backed up by resources and implementation lagged accordingly. There has been no effective representation from the Pacific region on the WH Committee since 2007 after the New Zealand mandate as WH Chair ended, although it is noted that Australia has been a Pacific representative on the WH Committee on and off since 2007. The benefits for Pacific Island governments to use valuable resources to support and participate in the WH Committee are unclear and delegations are costly to mobilize.

²¹² <https://whc.unesco.org/en/convention/>.

²¹³ SIDS were recognized as a distinct group of developing countries in June 1992, at the UN Conference on Environment and Development.

More information at: <https://www.un.org/ohrls/content/about-small-island-developing-states>.

²¹⁴ More information on the WHC SIDS Programme at: <https://whc.unesco.org/en/sids/>.

²¹⁵ To have mana is to have great authority, presence or prestige. More information at: <https://www.nzgeo.com/stories/the-meaning-of-mana/>

Regional level governance of natural and mixed WH in the Pacific region

3.4.2 UNESCO Regional Office

The UNESCO Pacific States Office²¹⁶, based in Apia, Samoa, is responsible for coordination of activities relating to the mandate of UNESCO in the Pacific region. The WH Centre, as the Secretariat of the WH Convention, is responsible for coordinating activities relating to WH, working where possible with the UNESCO Pacific States Office. The Pacific office has a considerable geographic responsibility with its coverage of 16 independent countries and one territory in the Pacific. Those interviewed for this project noted their appreciation for the support provided from the Regional Office on WH, particularly the provision of advice and information, but noted that the office covers many areas of responsibility, including the important topics of education, and that staff resources are very limited relative to the scale of the UNESCO mandate in the region.

State Parties interviewed from the northern Pacific noted the WH Convention could be more effectively advanced by the presence of a UNESCO office in the northern hemisphere, preferably in the FSM. The PNG State Party also suggested that WH implementation in PNG would be greatly facilitated by UNESCO PNG having a WH Focal Point whose aim would be to support WH implementation in the country.

3.4.3 Pacific regional CROP agencies

There are several regional inter-governmental agencies in the Pacific region, collectively known as CROP²¹⁷ agencies. These nine agencies²¹⁸ serve the nations and peoples of the Pacific Island States to achieve their sustainable development objectives. A number of these agencies have direct and indirect involvement with WH in the region. Those with the most direct involvement are SPREP²¹⁹, SPC²²⁰ and USP²²¹. The key roles of these agencies regarding WH are outlined in Table 5.

CROP agencies play a very important role in supporting sustainable development in PICTS. While the work of most CROP agencies has some relevance to natural and cultural WH, the mandate and work of SPREP, SPC and USP has the most relevance to WH, although work in this area is a small component of the mandates of these agencies. The work of SPREP has more relevance to natural WH and the work of USP and SPC has more direct relevance to cultural WH. The Pacific Heritage Hub has perhaps the most direct relevance to WH in the region. A number of persons interviewed for this project suggested the Pacific Islands Roundtable for Nature Conservation (PIRT) could play an enhanced role in coordination of natural and mixed WH in the Pacific region.

3.4.4 Pacific Heritage Hub (PHH)

The Pacific Heritage Hub²²² was established in 2012 as a UNESCO WH facility by and for Pacific States Parties. The idea for the establishment of PHH came from the UNESCO WH Workshop of the Pacific States Parties (2011) which identified information sharing and capacity building as critical needs in the implementation of the 1972 WH Convention in the region. PHH was officially launched in February 2013, hosted by the University of the South Pacific and housed at the Oceania Centre for Arts, Culture and Pacific Studies, at the School of Pacific Arts, Communication and Education (SPACE). PHH serves the 16 UNESCO member states in the Pacific and six additional states and territories including French Polynesia, New Caledonia and Wallis & Futuna. As part of UNESCO WH Network, membership also includes the United Kingdom, Chile and Ecuador. The Professional Certificate in Heritage Management offered for the first time in 2019 is a cohort-based programme developed in response to the regional call for improved and increased capacity building for Heritage Management.

A number of persons interviewed for this project noted the Pacific Heritage Hub is an important and excellent initiative for heritage conservation in the region and that its services have been valued, including the Professional Certificate in Heritage Management and networking and communications support, such as that provided through the PHH Facebook Page²²³. However, a common view was that the Pacific Heritage Hub has been of limited effectiveness and that inadequate resources have been a major constraint to its functioning, and that resourcing should be addressed as a priority. Some reviewers noted that, given the ineffectiveness of the Pacific

216 For more information on the UNESCO Pacific States Office is at: <https://www.unesco.org/en/fieldoffice/pacific>

217 Information on all CROP agencies is outlined at: <https://www.forumsec.org/council-of-regional-organisations-of-the-Pacific/>.

218 The Secretariat of the Pacific Community (SPC), formerly the South Pacific Commission, the Forum Fisheries Agency (FFA), the South Pacific Regional Environment Program (SPREP), the Pacific Islands Development Program (PIDP), the South Pacific Travel Organisation (SPTO), the University of the South Pacific (USP), the Pacific Aviation Safety Organisation, and the Pacific Power Association. The Pacific Islands Forum Secretariat acts as CROP's permanent chair and provides secretariat support.

219 SPREP – Secretariat of the Pacific Regional Environment Programme, more information at: <https://www.sprep.org/>.

220 SPC – Secretariat of the Pacific Community, more information at: <https://www.spc.int/>.

221 USP – University of the South Pacific, more information at: <https://www.usp.ac.fj/>.

222 More information on the PHH is at: <https://www.usp.ac.fj/oceania-centre-for-arts-culture-and-pacific-studies/home/sections/Pacific-heritage-hub/>.

223 More information at the PHH Facebook Page at: <https://www.facebook.com/Pacificheritagehub/>.

Heritage Hub, it should perhaps be dis-established and its role assumed by others. One State Party mentioned that “the PHH was more of a network which facilitated information on heritage work in the region, they could have done more but they were limited in their resources. It was a valuable space to find out what was happening in the region. IUCN’s CEESP²²⁴ could play a role potentially”.

Table 6. Roles of Pacific Regional CROP Agencies in relation to WH

CROP Agency	Role in relation to WH
Secretariat of the Pacific Regional Environment Programme (SPREP)	<p>SPREP’s mandate is “to promote cooperation in the Pacific region and provide assistance in order to protect and improve its environment and to ensure sustainable development for present and future generations”.</p> <p>Natural WH is addressed at a general level through the protected areas work of the SPREP Island and Ocean Ecosystems Programme, one of four SPREP technical programmes, noting that natural WH sites in the region are all protected areas. SPREP provides advice and information on protected areas and natural and mixed WH areas to PICTs including through the Pacific Islands Protected Area Portal (PIPAP)²²⁵, funded under the BIOPAMA Programme. The Pacific Islands Conference on Nature Conservation and Protected Areas²²⁶ is convened by SPREP, PIRT and the host country, and provides a forum where issues relating to natural WH sites in the region are discussed. SPREP also supports the Pacific Islands Roundtable for Nature Conservation (PIRT)²²⁷, currently chaired by BirdLife International, which enables organisations working on nature conservation in the Pacific to improve their collaboration and coordination towards effective conservation action at the national, regional and international level. PIRT is a coalition of nature conservation and development organisations, governments, inter-governmental agencies, donor agencies, and community groups created to increase effective conservation action in the Pacific Islands Region. Some interviewed for this project have noted that the PIRT could provide a useful framework for the more effective work on natural WH in the Pacific region. PIRT has recently established a nature-culture working group. This group could play a role in supporting the cultural side of natural WH sites and supporting better links between natural and cultural WH in the region. Links between the PIRT and programmes engaged in practical on the groundwork protecting natural areas such as the PRISMSS should also be encouraged and enhanced.</p>
The Pacific Community (SPC)	<p>SPC’s mission is to “work for the well-being of Pacific people through the effective and innovative application of science and knowledge, guided by a deep understanding of Pacific Island contexts and cultures”.</p> <p>SPC’s work has always been inextricably linked to Pacific culture, and in the future, this connection will become even stronger²²⁸. The work of the SPC is thus very relevant to all aspects of cultural WH, particularly through their work on culture within the SPC Human Rights and Social Development Division²²⁹, one of 9 Divisions within SPC. There is also considerable technical expertise within SPC on a range of issues relevant to climate change, environmental management and natural resource management.</p>
University of the South Pacific (USP)	<p>USP is a key institution of higher learning for the Pacific islands region, serving the region’s need for high quality tertiary education, research and policy. Apart from being a tertiary institution, it also serves as an organisation of regional cooperation and integration. The USP is jointly owned and governed by twelve Pacific Island Countries and has campuses in all Member Countries, with Fiji having three campuses. It is a renowned international centre for teaching and research on Pacific culture and environment. USP has direct expertise and involvement in aspects relating to natural and cultural WH. In recognition of this USP was selected as the host for the Pacific Heritage Hub (refer below) established to ensure effective support and coordination for heritage conservation in the Pacific region.</p>
The Pacific Tourism Organisation (SPTO)²³⁰	<p>The SPTO, formerly known as the South Pacific Tourism Organisation, is an intergovernmental organisation for the tourism sector in the South Pacific. The SPTO markets, promotes, and develops tourism in the Pacific in the region and in overseas markets. Tourism plays a vital role in the sustainable development of Pacific countries and their peoples and is of particular relevance for natural WH sites as such sites can be primary tourist destinations, such as is the case with the Rock Islands WH site in Palau. SPTO has developed a Sustainable Tourism Framework²³¹ – Goals 3 and 4 of this Framework are directly relevant to WH.</p>

224 CEESP – Commission on Environmental, Economic and Social Policy. More information at: <https://www.iucn.org/commissions/commission-environmental-economic-and-social-policy>.

225 More information on PIPAP, including information provided to Pacific Island members is at <https://pipap.sprep.org/>.

226 The 10th PI Conference on Nature Conservation and Protected Areas was convened in November 2020, more information at: <https://www.sprep.org/Pacificnatureconference>.

227 More information at: <https://www.pacificislandsroundtable.com>

228 More information at: <https://www.spc.int/updates/blog/2018/07/promotion-and-protection-of-Pacific-culture-remains-a-priority-for-spc>.

229 More information on SPC’s work on culture is at: <https://hrsd.spc.int/objective-3-culture>.

230 More information at: <https://southpacificislands.travel/>.

231 More information at: <https://southpacificislands.travel/wp-content/uploads/2021/07/Pacific-Sustainable-Tourism-Policy-Framework.pdf>.

3.4.5 The role of IUCN in WH

The International Union for Conservation of Nature (IUCN) has a key role in relation to natural WH. IUCN's governance comprises both NGO and Government Members. IUCN's Oceania Programme works through three thematic areas:

- (a) valuing and conserving nature;
- (b) promoting and supporting effective and equitable governance of natural resources; and
- (c) deploying nature-based solutions to address societal challenges.

IUCN actively supports work on heritage conservation throughout the region, including on capacity building. IUCN is also the global Advisory Body for natural WH sites under the WH Convention and the work of IUCN in the region supports the implementation of the WH Convention while not compromising the independent evaluation role of IUCN in the assessment of nominations for new WH sites.

The IUCN Oceania Regional Office²³² is involved in a range of activities including monitoring missions and providing advice to the global programme on the Pacific WH properties. The office is also implementing projects directly in WH sites (PIPA and East Rennell) and providing funding (e.g. BIOPAMA grants). Those consulted for this project noted the IUCN Oceania Regional Office is well regarded as an effective agency in the Pacific region. It can and should continue to play a major role in natural and mixed WH in the region, particularly for supporting the effective management of already inscribed WH sites.

3.4.6 Non-governmental organisations (NGOs)

NGOs play an important role in environmental management and biodiversity conservation in the Pacific. There are a large number of NGOs active in the Pacific at regional, national and local levels. They have played an important direct role in supporting Governments and local communities in heritage conservation and have been involved in planning and implementation of activities in natural WH sites in the region. International NGOs with direct involvement in heritage conservation in the Pacific include, but are not limited to:

- Conservation International²³³ (CI) – CI has been involved in numerous initiatives across the Pacific region, helping communities and governments define and establish marine protected areas and create sustainable development activities. It has specifically been involved in the creation, establishment and management of the Phoenix Island Protected Areas in Kiribati as well as regional-wide initiatives such as the Pacific Oceanscape.
- World Wide Fund for Nature (WWF)²³⁴ – The WWF South Pacific Programme Office serves the eastern Melanesian Island countries as part of WWF's endeavour to work effectively and locally in the region. The programme is managed from a regional base in Suva, Fiji and organizes a strategic series of conservation field projects, policy reviews and campaigns. WWF works closely with the Western Melanesian office located in Papua New Guinea. WWF has supported a range of heritage conservation projects throughout the Pacific region, including conservation programmes in the Kikori River Basin in PNG, one of the sites on the PNG Tentative List (discussed in more detail in Section 5.1).
- BirdLife International (BI)²³⁵ – BI is a major international NGO with a mission to conserve birds, their habitats and global biodiversity, working with people toward sustainability in the use of natural resources. BI is actively involved in field implementation activities in the Pacific region, including in natural and mixed WH sites, such as in supporting rat eradication programmes on the East Rennell WH site, a pressing problem for this WH site. BI is also responsible for IBA and KBA analysis at global and regional levels that are a key part of WH analysis and evaluation processes.
- Wildlife Conservation Society (WCS) – WCS aims to conserve the world's largest wild places in 14 priority regions, using science to discover and understand the natural world. This knowledge *"helps WCS engage and inspire decision-makers, communities and supporters to protect wildlife and wild places"*²³⁶. WCS has programmes on heritage conservation in Melanesia²³⁷, such as within the Bismarck Solomon Seas Ecoregion, in the Coral Triangle, the Vatu-i-Ra Seascape in Fiji, and the Bismarck Forest Corridor²³⁸ as well as supporting conservation programmes in the Milne Bay Seascape, one of the sites on the PNG Tentative List.

232 Based in Suva, Fiji.

233 More information on the CI Asia-Pacific Programme is at: <https://www.conservation.org/places/asia-Pacific>.

234 More information on the WWF Pacific programme is at: https://wwf.panda.org/wwf_offices/fiji_islands/.

235 More information is at: <https://www.birdlife.org/>.

236 From the WCS website. <https://www.wcs.org/our-work>.

237 More information at: <https://www.wcs.org/our-work/regions/melanesia>.

238 Including cloud forests (Kolombangara Island, Solomon Islands) and rainforests (Great Central Manus Forest, PNG, and Kilaka Forest Conservation Area, Fiji)

- The Nature Conservancy (TNC) – TNC’s mission is to conserve the “lands and waters on which all life depends, including through addressing key biodiversity and climate crises”²³⁹. TNC has been active in the Asia-Pacific²⁴⁰ region in a number of natural WH sites such as the Rock Islands Southern Lagoon (RISL) in Palau where they have been supporting preparation of the latest RISL Management Plan for Koror State. This work also includes a sustainability mechanism, which can help plan for crisis situations such as Covid or typhoons.

In addition, there are many other NGOs working at regional, national and local levels, in support of heritage conservation, including on actual and potential natural WH sites. Examples include the Tenkile Conservation Alliance²⁴¹ which supports conservation efforts of local communities in the Torricelli Range in PNG. The Pew Charitable Trust is also involved in supporting conservation work in a number of Pacific Island countries including French Polynesia and New Caledonia. Island Conservation²⁴² is a science driven organization working on preventing extinctions by removing invasive species from islands. They work closely with SPREP, and other partners, on invasive species removal from certain Pacific islands. There are a number of national level/grass roots NGOs, such as the National Trust of Fiji Islands²⁴³, that make significant contributions to World Heritage, including protection of, and support for, existing WH sites and tentatively listed WH sites, as well as for sites with some potential to be heading toward WH tentative listing.

The support role of NGOs has generally been welcomed by Pacific Island governments and has resulted in significant conservation achievements and “wins” in many PICTs. However, some interviewed for this project noted that there are perceptions in some quarters that, in some cases, international NGOs have been “running their own conservation agendas”, which may or may not align with national priorities and that this can create mistrust. In general, NGOs which work with and through national governments and support national and local priorities are regarded more favourably by State Parties. The Pacific Islands Framework for Nature Conservation and Protected Areas 2021-2025²⁴⁴ is an important process and outcomes that guides engagement of NGOs in the region. In this regard, the following key principles of this Framework are particularly relevant: (a) community rights; (b) conservation from Pacific perspectives; (c) ownership of conservation programmes; (d) resourcing for longevity; (e) good governance and accountability; (f) coordination and collaboration; (g) growing Pacific capacity; and (h) reinforcing resilience.

Overall, NGOs have an important role in heritage conservation in the Pacific region and have provided significant support in many relevant areas including resource mobilisation and capacity development. While many have not had a direct focus on natural WH sites, apart from CI with PIPA in Kiribati and TNC and others with Rock Islands in Palau, their work tends to concentrate on areas of the highest conservation significance, including areas which may have future potential as natural WH sites in the region (refer to Chapter 5 of this report). NGOs can and must play a critical future role in the establishment and management of natural WH sites in the Pacific region.

National-level governance of natural and mixed WH in the Pacific region

3.4.7 Pacific Island national government agencies involved in Natural and Mixed WH

At the national level, Pacific Island government agencies play a key role in the governance and management of natural resources and in heritage conservation, including natural WH. PICT Government agencies with responsibility for natural heritage, or equivalent, and their key roles, are outlined in Table 7. The responsibility for, and management of, natural and cultural WH is through different government agencies with cultural heritage generally under the mandate of Ministries of Culture, or equivalent, and natural heritage generally under the mandate of Ministries of Environment or equivalent. Sometimes the Ministry for “culture” or sometimes “nature”, has the singular national role for WH matters, covering focal point roles, advocacy, promotion, reporting, etc., and sometimes, for example, a Ministry for the environment may be the official WH focal point but a “culture” Ministry may lead the day-to-day work, and sometimes these roles may swap back and forth. Interviews with WH State Parties for this project indicated that there is often limited contact between culture and environment ministries regarding WH and that enhanced and closer contact in the future would be very useful.

²³⁹ From the TNC website at: <https://www.nature.org/en-us/>.

²⁴⁰ More information at: https://www.nature.org/content/dam/tnc/nature/en/documents/TNC_AsiaPacificFactsheet_2021.pdf.

²⁴¹ More information at: <https://tenkile.com/>

²⁴² More information at: <https://www.islandconservation.org>.

²⁴³ More information at: <https://nationaltrust.org.fj/>.

²⁴⁴ More information at: <https://pacific-data.sprep.org/dataset/pacific-islands-framework-nature-conservation-and-protected-areas-2021-2025-draft>.

Table 7. Roles of Pacific national government agencies in relation to WH

PICTs with a natural WH site, as of October 2024	National agency responsible for natural WH/Heritage management	Comment
French Polynesia (FP) - Te Henua Enata - The Marquesas Islands'	FP Direction de l'Environnement (DIREN) ²⁴⁵	
Kiribati WH site - PIPA²⁴⁶	Ministry of Environment, Lands & Agricultural Development (MELAD) ²⁴⁷	(a) WH (PIPA) is the responsibility of the Environment & Conservation Division (ECD) within MELAD. There is a PIPA Project Management Unit which reports to MELAD while working in a semi-autonomous manner. (b) The PIPA Trust ²⁴⁸ supports the management of PIPA and reports to ECD.
New Caledonia WH site - LNC²⁴⁹	The New Caledonia "Conservatory of Natural Areas" serves as a focal point for all matters related to WH and ensures coordination between the relevant levels of government: national and provincial (North Province, South Province and Loyalty Island Province), as well as coordination with and through local management committees.	Management committees are set up across New Caledonia to ensure effective input from local communities to the WH site. These provide day-to-day information to the provinces that are responsible for the decision making.
Palau WH site - RISL²⁵⁰	Ministry of Agriculture, Fisheries and the Environment (MAFE) ²⁵¹	(a) Responsibility for the RISL WH site is shared between the State Government of Koror and the National Government (MAFE) with Koror State responsible for WH site management and MAFE responsible for WH nomination and inscription aspects, as well as international liaison. (b) The Bureau of Cultural and Historic Preservation is the national focal point for WH and plays an important role in supporting linkages between nature and culture.
Pitcairn Islands WH site – HI²⁵²	Henderson Island is Crown Land within the Pitcairn Islands group, an Overseas Territory of the United Kingdom. It is subject to the Lands Court Ordinance 2001	The British High Commissioner to New Zealand ²⁵³ holds the office of Governor of Pitcairn. Day-to-day administration of the islands' affairs is devolved to a Commissioner based at the Pitcairn Islands Administration office in Auckland.
Solomon Islands WH site – ER²⁵⁴	Ministry of Environment, Climate Change, Disaster Management and Meteorology (MECDM) ²⁵⁵	Responsibility for WH rests with the Environment and Conservation Division within MECDM)

245 More information at: <https://www.service-public.pf/diren/>.

246 Phoenix Island Protected Area.

247 More information at: <https://www.devex.com/organizations/ministry-of-environment-lands-and-agriculture-development-melad-134229>.

248 More information at: <https://www.facebook.com/pipatrust/>.

249 Lagoons of New Caledonia.

250 Rock Islands Southern lagoon.

251 More information at: <https://www.palau.gov.pw/executive-branch/ministries/agriculture-fisheries-and-environment/>.

252 Henderson Islands.

253 Based in Wellington, New Zealand.

254 East Rennell.

255 More information at: <https://solomons.gov.sb/ministry-of-environment-climate-change-disaster-management-and-meteorology/#:~:text=The%20Ministry%20of%20Environment%2C%20Climate,services%20for%20the%20Solomon%20Islands>.

PICTs with no natural WH site as of October 2024	Primary responsibility for natural heritage conservation	Comment
American Samoa	American Samoa Environmental Protection Agency (AS-EPA) ²⁵⁶	
Cook Islands	Cook Islands National Environment Services (NES) ²⁵⁷	The Cook Islands Natural Heritage Trust (NHT) ²⁵⁸ also plays an important role in natural heritage conservation.
FSM	FSM Department of Environment, Climate Change and Emergency Management ²⁵⁹	
Fiji	Ministry of Waterways and Environment (MoWE) ²⁶⁰	Responsibility for natural heritage conservation rests with the Department of Environment within the MoWE.
Guam	Guam Environment Protection Agency (EPA) ²⁶¹	EPA plays a coordination role, other agencies are also involved in heritage conservation in Guam, including the US Fish and Wildlife Service, and the Guam Preservation Trust
Marshall Islands	The primary responsibility for natural heritage conservation in the RMI is the Environmental Protection Authority (RMI EPA) ²⁶²	The primary responsibility for natural heritage conservation in the RMI is the RMI EPA.
Nauru	Department of Commerce, Industry & Environment (Agriculture, Renewable Energy and Climate Change) ²⁶³	
Niue	Ministry of Natural Resources (MNR) ²⁶⁴	Responsibility for natural heritage conservation rests with the Director for Environment within MNR
Northern Marianas	Division of Coastal Resources Management, CNMI Bureau of Environmental and Coastal Quality ²⁶⁵	
PNG	PNG Conservation & Environment Protection Agency (CEPA) ²⁶⁶	CEPA is the implementing agency in PNG for WH, covering both natural and cultural WH, e.g. the Kuk cultural WH site is also a responsibility of CEPA. However, CEPA works closely with the PNG National Museum and Art Gallery on WH matters.
Samoa	Ministry of Natural Resources and Environment (MNRE) ²⁶⁷	Responsibility for natural heritage conservation rests with the MNRE Division of Environment and Conservation. Cultural heritage is covered by the Ministry for Education.
Tokelau	Office of the Council for the Ongoing Government of Tokelau ²⁶⁸	As Tokelau is a non-self-governing territory, New Zealand is the signatory to the WH Convention.

²⁵⁶ More information at: <https://www.ecos.org/members/american-samoa/>.

²⁵⁷ More information at: <https://environment.gov.ck/>.

²⁵⁸ The Cook Islands Natural Heritage Trust Act 1999 establishes NHT “with the necessary resources and powers to investigate, identify, research, study, classify, record, issue, preserve and arrange publications, exhibitions, displays and generally educate the public on the science of, and traditional practices and knowledge relating to, the flora and fauna of the Cook Islands”.

²⁵⁹ More information at: <https://iclim.decem.gov.fm/>.

²⁶⁰ More information at: <https://www.mowe.gov.fj/>.

²⁶¹ More information at: <https://epa.guam.gov/about/>.

²⁶² More information at <https://rmi-data.sprep.org/group/1>

²⁶³ More information at <http://naurugov.nr/government.aspx>.

²⁶⁴ More information at: <https://www.facebook.com/NiueMNR/>.

²⁶⁵ More information at: <https://dcrm.gov.mp/>.

²⁶⁶ More information at: <https://png-data.sprep.org/group/1>.

²⁶⁷ More information at: <https://www.mnre.gov.ws/>.

²⁶⁸ More information at: <https://www.tokelau.org.nz/Tokelau+Government/Government+Departments/Office+of+the+Council+for+the+Ongoing+Government+OCOG.html>.

PICTs with no natural WH site as of October 2024	National agency responsible for natural WH/Heritage management	Comment
Tonga	Ministry of Meteorology, Energy, Information, Disaster Management, Environment, Climate Change & Communication (MEIDECC) ²⁶⁹	(a) Responsibility for natural heritage conservation rests with the Division of Environment within MEIDECC (b) The Tourism Agency has broad responsible for “heritage”, including coordination and links with UNESCO
Tuvalu	Tuvalu Ministry of the Environment ²⁷⁰	“Heritage” is a responsibility of the Ministry of Culture. There is also a mandate from the National Sustainable Development Plan to preserve and manage heritage.
Vanuatu	Vanuatu Ministry of Climate Change (MoC) ²⁷¹	(a) Responsibility for natural heritage conservation rests with the Department of Environment Protection & Conservation within MoC. (b) The Focal Point for WH in Vanuatu is with the Vanuatu Culture Centre ²⁷² .
Wallis and Futuna	Service de la Coordination des Politiques Publiques et du Developpement Administration Superieure des iles Wallis et Futuna ²⁷³	

3.4.8 Analysis of national government management of natural and mixed WH in the Pacific region

The following observations and analysis can be made regarding national government management of natural WH heritage in the 23 focus PICTs of this report:

- At the national level, Pacific Island government agencies play a key role in the governance and management of natural resources and in heritage conservation, including natural WH. Any country that is a State Party to the WH convention will have general obligations they are required to deliver on.
- As there are only five natural or mixed WH sites, there are very few countries and territories with responsibility for natural WH in the focus PICTs, namely: Solomon Islands, Kiribati, Palau, New Caledonia (France) and French Polynesia (France). Management of natural WH within these countries is one part of much larger agency responsibilities and is usually covered within environment/conservation divisions within that Government agency.
- Management of natural heritage within Pacific Islands without natural WH sites is also generally a responsibility of environment/conservation divisions within those broader Government agencies responsible for environment and climate change.
- Approaches to heritage conservation, including protected areas and natural WH are addressed under NBSAPs prepared by each Pacific Island country as part of their commitments under the CBD.
- Pacific Island government agencies involved with environmental management and heritage conservation are small, and considerably underfunded relative to responsibilities.
- The level of finance and staffing available for heritage conservation, including natural WH, is often very limited, and this is a constraining factor, particularly for effective WH site management.
- Environmental management and heritage conservation in Pacific Island territories linked to France, USA, NZ and the UK are generally better resourced, reflecting support from the respective metropolitan country.
- All Pacific Island environment/heritage conservation agencies have a focus of working with and through local communities as well as linking environment and conservation programmes to sustainable development of PICTs.
- There has been a trend in recent years to combine agencies addressing environment/conservation issues with agencies dealing with related issues, such as climate change and meteorological services. This has aimed to provide economies of scale and also to ensure more effective integration and delivery of services. This trend can be seen, for example, with Solomon Islands, Kiribati and Samoa, amongst other PICTs.

269 More information at: <https://www.ctc-n.org/about-ctcn/national-designated-entities/ministry-meteorology-energy-information-disaster-management>.

270 More information at: <https://www.adaptation-undp.org/partners/ministry-environment-government-tuvalu>.

271 More information at: <https://docc.gov.vu/>.

272 More information at: <https://vanuatuculturalcentre.gov.vu/>.

273 More information at: <https://www.wallis-et-futuna.gouv.fr/Services-de-l-Etat-et-du-Territoire/Prefecture-Administration-Superieure/Service-de-Coordination-des-Politiques-Publiques-et-du-Developpement>.

- The responsibility for, and management of, natural and cultural WH is through different government agencies with cultural heritage generally under the mandate of Ministries of Culture, or equivalent, and natural heritage generally under the mandate of Ministries of Environment or equivalent. There is often limited contact between culture and environment ministries regarding WH.
- In the Pacific, as in other regions of the world, there can be limited coordination or even conflict between environmental and other ministries, such as fisheries, in relation to issues such as the establishment of marine protected areas.

3.4.9 Local communities and Indigenous peoples governance of natural WH

The role of local communities and customary owners in the Pacific is pivotal as they own the majority of land and water resources. Local communities have knowledge of their natural resources and have developed many approaches to ensure the conservation and sustainable management of natural resources. Their involvement in natural WH, and natural heritage conservation in general, is thus critically important. Involvement of local communities in natural WH in the Pacific has varied. The East Rennell WH site in Solomon Islands was the first WH site under customary management inscribed in the world. However, there have been a number of challenges including differing expectations regarding natural WH and the lack of resources and funds available to ensure effective management of natural WH by local communities. Other PICT natural WH sites have developed mechanisms for ensuring the involvement of local communities in decision making. For example, local management committees are set up across New Caledonia to ensure effective input from local communities into planning and management of the Lagoons of New Caledonia. These provide day-to-day advice to the provinces that are responsible for decision making.

The following lessons can be drawn from the involvement of local communities in governance of natural WH in the Pacific region:

- Open and effective communication with local communities is essential at all stages of the natural WH nomination and management process. In particular, realistic expectations need to be established prior to nomination regarding the implications of WH inscription as well as clarity regarding attendant responsibilities.
- Resources need to be available to local communities to support their planning and management of natural WH.
- Programmes relating to WH in the Pacific should, where possible, include programmes which can support the sustainable development of local communities.
- Programmes which builds sustainable capacity of local communities on natural and mixed WH is essential.

3.5 Conclusion

The following conclusions and lessons can be drawn from this Chapter regarding natural and mixed WH and its conservation status in the region.

Status of natural WH sites in the Pacific region

WH sites have been inscribed throughout the Pacific region. There are more cultural WH than natural WH sites and there are many countries and territories in the region which do not have any WH sites. The majority of natural and mixed sites are large and protect important terrestrial and marine values. Better linkages need to be developed between natural and cultural WH in the Pacific region, through mechanisms such as national level committees which bring together representatives of natural and cultural agencies. Although this report focuses on natural and mixed WH the broader issues of natural and cultural WH are covered extensively in the “Review of World Heritage Priorities in the Pacific Region 2021-2025”²⁷⁴. In relation to the number of WH sites, the Oceania region is poorly represented on the WH List, by comparison to other regions of the world. Despite this poor representation on the WH List there are natural areas within the region that potentially could meet the criteria of Outstanding Universal Value under the WH Convention (refer to Chapter 5 for elaboration of potential natural and mixed WH sites).

The conservation status of natural WH sites is outlined in Section 3.2. Key issues at these sites include:

Within the 23 focus PICTs of this report

- **East Rennell** – experience at this WH site underlines that WH sites must be supported by national governments as well as local communities. It is also important that local communities living in and adjacent to WH sites in SIDS need to benefit from WH listing, and that clear and realistic expectations regarding WH must be established at the time of site inscription, particularly livelihoods and socio-economic benefits for local communities.

²⁷⁴ As previously mentioned, the report “Weaving Nature with Culture: Review of World Heritage Priorities in the Pacific Region - to inform and guide the Pacific Regional World Heritage Action Plan 2021-2025” was carried out prior to this report on natural and mixed WH.

- **Phoenix Islands Protected Area** – experience at this site also reinforces the importance of establishing clear expectations, at all stages of the WH process. The recent decision by the Government of Kiribati to “open up” the WH site for commercial fishing has significant implications for WH in the region and globally. Notwithstanding the outcome of this decision there are a number of examples of innovative “best practice” from PIPA including the establishment of the PIPA Trust Fund which makes an important contribution to the operating and management expenses of this WH site.
- **Rock Islands Southern Lagoon** – the Rock Islands Southern Lagoon WH site is a “success story” in the Pacific and lessons learnt, such as in relation to linking nature and culture, as well as the “Green Fee”, should be communicated within the Pacific region and more widely.
- **Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems** – is recognized as a well-managed WH site which could provide lessons for the establishment and management of other existing and potential WH sites in the region. The potential for a transboundary coral reef WH site between the Lagoons of New Caledonia and other coral reef sites in the Coral Triangle region was noted by many reviewers.

Island WH sites in the Pacific which are relevant to this report, but are outside the 23 focus PICTs

- **Henderson Island** – the isolation of this site has contributed to a high level of integrity, making it ideal for studying the dynamics of island evolution and natural selection. While isolated, it ironically also provides an unfortunate and infamous example of how massive amounts of marine debris can blight the most remote places²⁷⁵.
- **Papahānaumokuākea** – is much better resourced and managed than natural WH sites in PICTs²⁷⁶. However, many issues are common, including climate change, invasive species, marine debris and limited awareness of WH. The willingness of Papahānaumokuākea to partner with other Pacific WH sites in Oceania is also significant, noting that there has been existing collaboration with PIPA.
- **Hawaii Volcanoes National Park** – is much better resourced and managed than natural WH sites in Pacific SIDS²⁷⁷. However, many issues are common, and the experience of visitor management in the Hawaii Volcanoes National Park may be useful for other natural WH sites in the Pacific region.
- **Natural WH sites in the wider Pacific region**²⁷⁸ – the majority of these sites outside the region face similar issues to those within the Pacific region, such as the impacts of climate change and invasive species. However, they are significantly better resourced than Pacific Island WH sites within the project area and there is potential for sharing of experience and expertise on natural and mixed WH between countries in the broader region and Pacific Island natural WH sites

Institutional and governance frameworks for Natural WH in the Pacific region

At the global level, the World Heritage Programme for SIDS is positive and welcomed by PICTs however the effectiveness of this programme has been greatly hindered by limited resources available for implementation.

At the regional level, there are a number of agencies with direct and indirect involvement in natural WH. Constraints of available funding and competing priorities preclude these agencies playing a greater role in natural WH in the Pacific region. The Pacific Heritage Hub is an important initiative for heritage conservation in the region, however, inadequate resources have been a major constraint to its effective functioning. NGOs have played an important direct role in supporting governments and local communities in heritage conservation and have been involved in the planning, nomination and implementation of some specific natural WH sites in the region. The role of NGOs has generally been welcomed by Pacific Island governments and NGO support has resulted in significant conservation achievements and “wins” in many PICTs.

At the national level, Pacific Island government agencies play a key role in the governance and management of natural resources and in heritage conservation, including natural WH. The level of finance and staffing available within Government agencies for natural heritage conservation is very limited and this is a constraining factor, particularly for effective site management. There is often limited contact between culture and environment ministries regarding WH and greater cooperation has been noted as a future priority. Logically the UNESCO Regional Office, the WH Advisory Bodies, IUCN, ICOMOS and ICCROM, and the PHH, could play a key role in encouraging greater cooperation between culture and environment ministries.

The role of local communities and customary owners in the Pacific is pivotal as the majority of land and water resources are owned by local communities. Their involvement in natural WH, and natural heritage conservation in general, is thus critically important. Involvement of local communities in natural and mixed WH in the Pacific has varied and there are a number of positive, and less positive lessons to be drawn. Effective involvement of local communities in natural and mixed WH requires open and effective communication, targeted capacity building and adequate resources.

²⁷⁵ [Lavers](#) & Bond, 2017.

²⁷⁶ Reflecting direct budgetary support from the US Government.

²⁷⁷ Reflecting direct budgetary support from the US Government.

²⁷⁸ As outlined in Section 3.3.

Challenges and opportunities for natural World Heritage in the Pacific

4



Sigatoka Sand Dunes National Park, Fiji © Stuart Chape

This section outlines challenges and opportunities for natural and mixed WH in the Pacific region and links closely with recommendations in Chapter 6. It is based on interviews with, and written input from, States Parties, natural and mixed WH site managers and natural and mixed WH experts, as well as information from the IUCN WH Outlook and other relevant sources. The three groups consulted all identified similar issues, as outlined below, although there were some differing areas of emphasis: (a) State Parties emphasized the need for effective governance structures and resources for WH; (b) managers of WH sites prioritized practical site management issues such as problems of access to remote areas and how to effectively engage with local communities; and (c) WH experts placed emphasis on rigorous science in helping to define the best areas as natural and mixed WH sites.

This section is structured in two parts: (a) outline and analysis of key challenges and opportunities for natural and mixed WH in the Pacific region; and (b) a Strength, Weakness, Opportunities, Threats (SWOT) analysis regarding natural and mixed WH in the Pacific region, drawing on issues raised in this and preceding sections.

4.1 Key challenges and opportunities for natural and mixed WH in the Pacific region

Key challenges and opportunities for natural and mixed WH in the Pacific region are outlined below and include the following:

- Awareness and understanding (Section 4.1.1)
- Gaps in coverage (Section 4.1.2)
- Inadequate funding (Section 4.1.3)
- Engagement of local communities and national governments (Section 4.1.4)
- Capacity (Section 4.1.5)
- Nature and culture linkages (Section 4.1.6)
- Coordination and partnership (Section 4.1.7)
- Leadership (Section 4.1.8)
- Broader context (Section 4.1.9)

4.1.1 Awareness and understanding

Consultation undertaken for this project indicated a low level of awareness of the WH Convention in the Pacific region, at all levels. This lack of awareness applies within PICTs with no natural WH sites and even within PICTs with existing natural and mixed WH sites. The WH Convention has a very low profile in PICTs. In fact, in cases such as in Solomon Islands, regarding the East Rennell WH site, WH has a negative profile, associated with the site being placed on the WH in Danger List.

Most State Parties have limited understanding of the implications, benefits, costs and responsibilities associated with natural WH. There is also limited understanding about the concept of OUV and how the evaluation of possible nominations is undertaken. As one State Party mentioned: *"We have no experience in the nomination process, they want more information as to what is involved and what support may be available"*. Another State Party noted: *"There is limited knowledge and understanding about natural WH sites within the country and even within the relevant agency responsible. There is a need for greater awareness of WH within the Government and respective agencies if WH is ever going to be successful"*. One reviewer noted the challenges of limited understanding also extend to local communities noting: *"It's very difficult for local people to get a perspective on the value of their natural environment, because it is every-day and normal for them. They often don't see it as special, because they haven't had the opportunity to acquire an international perspective"*.

State Parties and WH site managers noted there is inadequate information of how to access funding for aspects of the WH process, including the preparation of nominations, and, most importantly, support to ensure the effective management of natural and mixed WH sites. The lack of financial and human resources is a major constraint to natural and mixed WH in the region and this must be addressed: a key element is advice on how to better access and mobilize resources. As mentioned by one State Party: *"We need to know what support is available and what financial and technical resources are available through WH, at the moment we know there is funding but we're not sure where, or how to access it"*. There is a logical role for the IUCN "upstream" process to address this issue.

There is greater awareness of other international conventions within the Pacific, such as the Convention on Biological Diversity (CBD) and the Framework Convention on Climate Change (UNFCCC). This reflects a number of factors, including the linkage of these Conventions with tangible support and funding through financial instruments, such as the Global Environment Facility (GEF) for the CBD and the Green Climate Fund (GCF) for the Climate Convention. There are also greater efforts to promote these Conventions by their respective Secretariats and by relevant regional agencies, such as SPREP. As one State Party noted: *"The CBD and UNFCCC are much better known and understood at all levels, including at the community level. WH is not well known or understood, UNESCO needs to address this aspect and create more national programmes to enable SPs to participate and raise awareness about the WHC and how it can help countries and communities"*.

The benefits of natural and mixed WH listing are often neither clear nor apparent to Pacific Island Governments and local communities, and there is a need to make a clearer case regarding these benefits and any potential negative outcomes. However, it is important to ensure that expectations are not raised in an unrealistic way. For example, when the East Rennell natural and mixed WH site was inscribed, there was a clear expectation on the part of local communities that WH would result in additional funding to support conservation as well as increasing revenue from tourism resulting from inscription. As the WH site manager for East Rennell noted: *“If he could go back to 1998²⁷⁹ he would have ensured that all stakeholders were much more involved and that expectations had been more clearly established about what WH inscription actually means. At that time, they should also have looked more carefully at how the site should be managed to meet WH requirements. At present there is a lot of confusion and finger pointing on all sides and in part this comes from unrealistic expectations”*. Unrealistic expectations were also a key factor in the decision of the Government of Kiribati to open up the marine area of the WH site, the Phoenix Island Protected Areas (PIPA) to commercial fishing. In this case there was an expectation at the time of inscription of PIPA that funds would be raised to compensate for revenue foregone from lost fishing rights. This proved unrealistic and expectations should have more clearly clarified and expressed at the time of inscription.

There are positive examples of natural and mixed WH in the Pacific region, such as the Rock Islands Southern Lagoon Natural and mixed WH Site in Palau, and the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems, where WH has resulted in positive benefits for nature and for the people, particularly through supporting nature-based tourism. It is important that these examples are documented and communicated as part of overall efforts to raise awareness of natural and mixed WH in the Pacific region. Other Pacific countries expressed great interest in hearing about, and learning of, such relevant experience in the context of application of natural and mixed WH within their own countries.

There are also less positive examples of natural and mixed WH in the Pacific region, such as the Danger Listing of East Rennell in the Solomon Islands and the decisions regarding PIPA to open up the marine area of the WH site to commercial fishing. Lessons from these examples also need to be distilled and communicated.

Low awareness of natural and mixed WH constrains the further development and implementation of the WH Convention in the Pacific region. Without greater awareness of natural and mixed WH the current low level of support for, and interest, in the WH Convention will continue. This should be addressed through the development of a Pacific WH communication strategy which clearly sets out:

- The background and rationale for WH in the Pacific region, including the definition and meaning of OUV²⁸⁰.
- The implications of WH for State Parties and local communities.
- The processes of WH including nomination, inscription, management and monitoring.
- Case studies of positive natural and mixed WH examples in the Pacific region.
- Means of accessing funding for all aspects of natural WH, from nomination to management and monitoring.

This communication strategy should be aimed at both national and regional levels and should be clear and easily understood, at all levels. WH should logically also be an element of other related communication and campaigns such as National Environment Week, which is celebrated in most Pacific countries, such as Samoa²⁸¹ where celebrations highlight the importance of the environment and heritage conservation within the country. The need for increased awareness was reinforced by the State Party of Palau in their comment: *“We need to think of areas to help bring everyone together – we need a campaign on WH as heritage is everyone’s responsibility. Need awareness for children²⁸². Cultural Awareness week is an opportunity to make this happen and focus on WH”*.

The communication strategy should be coordinated and implemented through UNESCO and other relevant agencies at regional and national levels. Logically the Pacific Heritage Hub should play an important role in the implementation of this plan. There is also a potential role for the Pacific Islands Protected Area Portal (PIPAP) to assist with raising WH awareness in the region by making available relevant WH communication materials. It is also important that this communication strategy is accompanied by tangible support to PICT State Parties, particularly in relation to supporting access to resources to implement the WH Convention.

279 The year of inscription of the East Rennell WH site.

280 One reviewer noted the importance of taking small steps towards WH: *“...there’s something to be said for taking smaller conservation steps too as stepping stones to WH. For example nominating UNESCO Geosites because they have a distinct conservation-education-economic benefit angle. WH tends to be all or nothing. At this very moment, Indonesia is proposing a geopark at Raja Ampat, which is on the Bird’s Head of western New Guinea. It’s in the Coral Triangle and reconfigured could be a candidate for serial WH. There are also National Parks. If they were established, staffed and well managed, then some could become candidates for WH status”*.

281 More information on Samoa’s national Environment Week at: <https://www.samoaoobserver.ws/category/samoa/93951>.

282 It is noted that UNESCO has some good communications materials on WH specifically for children, such as “WH in Young Hands” (<https://whc.unesco.org/en/educationkit/>). However, this is a low awareness of this material in the Pacific region and materials such as these should be promoted and included within the Regional WH Communications Strategy.

4.1.2 Gaps in coverage

There are a number of important ecosystems and natural areas within the Pacific region which may have potential as natural and mixed WH but are not represented within the existing natural and mixed WH network. Chapter 5 of this report provides some suggestions on potential natural WH sites in the Pacific region, although it is noted that these need further consolidation, research and review in line with the “Upstream Processes” of WH²⁸³, which provide a proactive approach to support State Parties with the implementation of the WH Convention, including through identification of potential new natural WH sites and ways to improve management of these sites.

However, there are a number of important issues that will need to be addressed before any new natural WH sites can be considered in the Pacific region, including the lack of adequate funding and inadequate capacity for ensuring the effective management of natural and mixed WH sites, as detailed below. Additional support is an essential requirement for natural and mixed WH to progress in the Pacific region.

A number of State Parties which have natural and mixed WH sites, including Solomon Islands and Palau, noted they would prefer to “consolidate” and ensure that their existing natural and mixed WH site are better managed, rather than considering the nomination and inscription of any new WH sites. It is considered that a staged approach to natural and mixed WH in the region is required, wherever possible building on the base of successful practice, such as from the Rock Islands Southern Lagoon WH Site. Such examples of best practice need to be more widely communicated in the region.

4.1.3 Inadequate funding

Lack of funding for all aspects of WH is a key constraint to the effective implementation of natural WH sites in the Pacific region. This is relevant for all stages of natural WH: nomination, inscription, management and monitoring. As noted in Chapter 3, existing natural WH sites in the Pacific region are generally managed by poorly resourced environment agencies, which do not have the funding to effectively manage natural and mixed WH sites. This is further complicated by the remote and isolated nature of many Pacific Island WH sites. For example, one State Party noted: *“For most islands there is a 2-3 day voyage to reach most islands, funding to allow consultation with local communities is essential for management and protection of WH sites but is lacking”*.

The processes associated with natural and mixed WH are expensive and this constrains the implementation of the WH Convention in the Pacific. For example, the preparation of a nomination document is particularly expensive and requires considerable resources, well beyond the resources of most PICTs. Costs involve the preparation of a high quality, scientifically credible nomination document as well the need for many consultations (as often required by customary practices) including with communities which can be very remote from national capitals. For example, the Samoa State Party echoed the views of many PICTs when they noted: *“Samoa can’t push forward on a WH program, including nomination of WH sites, without significant external support”*. Linking WH aspirations with GEF biodiversity project development offers one approach to supporting the process of nomination, inscription and management of natural WH sites. Palau and to an extent FSM are examples where inclusive programme design involving WH and GEF objectives has been employed to capture multiple objectives.

It is important to note that a number of innovative models of financing for natural and mixed WH have been developed in the region, particularly for the Rock Islands Southern Lagoon WH site in Palau and for PIPA in Kiribati. These have been developed by PICTs, often in cooperation with NGOs. Box 9, below, outlines the experience of Palau, particularly with the Green Fund, and its implications for natural and mixed WH management. It is important to also explore additional financial and technical support for natural and mixed WH from Metropolitan countries involved in the region (Australia, France, NZ, UK, US and Japan).

283 More information at: <https://whc.unesco.org/en/upstreamprocess/>.

Box 9. Experience from Palau in sustainable financing, including through the Palau Green Fund**Experience from Palau in sustainable financing****Financing of Protected Areas**

The PAN Act incorporates a Protected Area Network Fund (PANF) funded from visitor and other contributions. The PANF is an independent non-for-profit financial trustee established to manage funds directed towards the protected sites of Palau. The PANF is mandated to:

- (a) seek external funding sources for Palau's conservation and sustainable development efforts;
- (b) leverage sources of outside funding through mechanisms such as the Micronesian Conservation Trust; and
- (c) ensure that outside funding is used for the purposes established and required by donors.

The PANF receives funding from: (a) the Palau Green Fund; (b) the Micronesia Challenge Endowment Fund; (c) State contributions; and (d) grants from various donors.

The Palau Green Fund provides direct support for the Palau National Marine Sanctuary. It consists of US\$100 fee per visitor (charged upon entry into Palau) to provide the primary financing mechanism for the Sanctuary. This fee directly supports the operations of the PAN and comprised the majority of revenue in the PAN Budget in FY2018.

All 16 states of Palau have PAN sites. The Rock Islands WH site is in Koror State in Palau and 2 sites within the Rock Islands WH site are PAN sites. Koror State receives a small portion of PAN funds for site management. Koror State also has its own Rock Island Fee that is in addition to the "Green Fee" collected from visitors. Experience from Palau underlines that tourism can potentially provide an important source of support for natural and mixed WH sites in the Pacific region, although tourism can be highly impacted by external factors such as COVID-19. It is important to note that tourism related developments should be sympathetic to the goals for which WH sites were established in the first place.

Source: <https://www.palaupanfund.org/>.

The Phoenix Islands Protected Area (PIPA) Trust Fund in Kiribati was also developed to provide a sustainable source of financing for the PIPA WH site and this also provides a practical example of sustainable financing relevant for natural WH sites in the Pacific region. In particular, PIPA established the PIPA Conservation Trust to support the management of PIPA, including support for sustainable financing. A PIPA Trust Fund was developed with support and financial input from donors, NGOs and the Government of Kiribati to support the management of PIPA through the relevant Government agency. The PIPA Fund has so far raised approximately US\$7 million, which has been important in supporting the operations and management of PIPA. There was an expectation when PIPA was inscribed compensation would be provided through a "reversed fishing license" regime, using funding generated through the PIPA Trust Fund. There are a number of implications of the PIPA Trust Fund for other existing and potential natural WH sites in the Pacific, including:

- The PIPA Trust Fund has generated funding to support the management of this large WH marine site. It has provided a model of financing, based on donor and NGOs contributions, which is of considerable relevance for other marine WH sites in the Pacific and globally.
- While being a useful model, this example highlights the issue of unrealistic expectations. Significant revenue has been generated through the PIPA Trust. However, this was never realistically going to be able to off-set fishing revenue and this should have been clearly articulated at the earliest stage of the nomination process.
- PIPA has illustrated the important role that many NGOs can and do play in supporting conservation efforts and WH in the Pacific region.

Models such as the Palau "Green Fee" and the PIPA Trust Fund have been very useful and have wider applicability for natural and mixed WH sites, and for other protected areas, in the Pacific region. Key lessons from these approaches to sustainable financing should be documented and lessons learnt widely communicated.

However, inadequate resources to effectively manage natural WH sites in the Pacific region is a major constraint to the further development of WH in the region. Funding needs to be increased at all levels: international, regional and national. A range of approaches and models should be considered, such as a potential Regional (or Sub-Regional – Micronesia, Melanesia, Polynesia) Trust Fund to cover WH management costs, in addition to tapping into new financing schemes set up by larger donors, foundations and philanthropists. Interesting financing models, such as the new Legacy Landscapes Fund set up by the German Government and partners²⁸⁴, should be considered for potential application in the Pacific region. Other sustainable financing mechanisms have been explored and evaluated for Marae Moana (Cook Islands Marine Park) and may have application for existing and potential Pacific WH sites, particularly those with a strong tourism industry.

²⁸⁴ More information at: <https://legacylandscapes.org/>



Montipora spp. corals around Enderbury Island, Phoenix Islands Protected Areas, Kiribati © Randi Rotjan

International

The Global Environment Facility (GEF) has provided significant support for conservation and environment projects in the Pacific region. The GEF has a particular focus on the conservation and sustainable management of high biodiversity areas and has supported natural and mixed WH projects in the region to date, including in PIPA, the Rock Islands Southern Lagoon and the Henderson Island WH sites. A greater alignment between GEF and natural and mixed WH priorities in the region should be an area of future focus and would attract greater interest and support from PICs for engagement in natural and mixed WH in the region. For example, the PNG State Party interviewed noted: *“PNG uses GEF projects to raise support and profile, they can and should be linked to natural WH. The GEF supports protected areas in PNG as a key tool for protecting biodiversity. They have WH as one of the PA types, they are aiming now to get legal clearance for new Bill on PAs, and this will help political support. A specific GEF project should be developed to support natural and mixed WH including for nomination of sites and management of WH sites, once inscribed”*. A challenge regarding GEF funding for WH is that this fund is seen as a financial mechanism for Conventions other than WH which is seen as “UNESCO business”. This can make it challenging to obtain GEF support especially for WH issues at regional scales. The GEF Secretariat, UNESCO and WH Centre colleagues need to collaborate to formulate policies to redress this problem.

The Green Climate Fund (GCF) is also a potential source of support for natural and mixed WH given the role of these WH sites as a primary adaptation strategy to mitigate the effects of climate change, including sea level rise, on PICTs. The GCF can also provide, and support, critically important mitigation strategies, such as where large intact forests store and sequester carbon, in countries such as PNG and the Solomon Islands. However, this linkage between GCF and natural WH, and biodiversity conservation in general, is not clearly developed at the moment in the region, as reflected in the lack of GCF project proposals which link natural heritage conservation to climate change adaptation and mitigation.

Logically, UNESCO is seen as a key source of financial and technical support for natural and mixed WH in the region, particularly given the expressed priority of the WH Convention on SIDS and the fact that natural WH sites are poorly represented in the Pacific region. However, the level of support has been very limited in the region and some consulted for this project suggest that, to date, the UNESCO Secretariat has clearly let the Pacific down. The existing limited support has largely been for PICT staff attendance at workshops, support for nomination processes, and some limited funding for management activities, for example the WH Centre provided an emergency grant for an invasive species project to remove feral cats from parts of the Rock Islands Southern Lagoon WH site. The widespread view of those interviewed is that UNESCO should provide much greater and more tangible support for natural and mixed WH in the Pacific region. The UNESCO Pacific Regional Office in Samoa, with its discrete WH function, has limited capacity and financial resources, it is hoped this report, and the allied WH Regional Action Plan report, may enable this office to focus on a few WH actions of priority for PICTS State Parties.

The Rapid Response Facility (RRF)²⁸⁵, operated by the UNESCO WH Centre, the United Nations Foundation²⁸⁶ (UNF) and Fauna and Flora International²⁸⁷ (FFI), has been established to provide timely resources to address threats and emergencies affecting WH properties and sites with high biodiversity values. This fund is directly relevant to the Pacific, particularly for the WH in Danger Listed East Rennell WH Site in the Solomon Islands, and greater application of this Fund should be made in future.

Regional and National

Partner countries involved in the Pacific region, such as Australia, have provided specific capacity building and support²⁸⁸ for natural and mixed WH in PICTs. For example, Australia provided strategic support to PNG through the Department of Environment and Energy, for the Kokoda Initiative²⁸⁹, a partnership between Australia and PNG to protect the Kokoda Track, Brown River Catchment and Owen Stanley Ranges while improving the lives of people living along the track. The PNG State Party noted the secondment of a technical officer, highly skilled in natural WH, played a very important role in the development of WH in PNG, including through review of the PNG WH Tentative List.

The USA and France have provided support for natural and mixed WH activities in territories and associated states. For example, USAID²⁹⁰ and the US National Parks Service (NPS)²⁹¹ have provided support for the Rock Islands Southern Lagoon and Nam Madol WH sites as well as in other sites in Micronesia. The Government of France has also provided support for the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems WH site as well as other World Heritage programmes in French Polynesia and New Caledonia.

Metropolitan State Parties involved in WH in the Pacific consulted for this project noted willingness to continue, and potentially increase, their support for PICTs in relation to the development and management of natural and mixed WH sites. This should however be based on clearly expressed national priorities and tailored requests.

At a national level, it is important that PICTs allocate resources from their own national budgets to support natural and mixed WH as a clear indication of their own commitment and buy-in to natural and mixed WH. This support should come from a range of Ministries likely to be involved in the nomination and management of natural and mixed WH sites, including Ministries of the Environment, Culture and Tourism. This is important to show national level commitment as well as providing important in-kind support, which is often a requisite of receiving funds from international donors and partners such as the GEF. However, national commitments to natural and mixed WH require a much better understanding of the demonstrated value and benefits of WH designation within Pacific countries.

4.1.4 Engagement and support of local communities and national governments

Land and water resources are traditionally owned in the Pacific. As mentioned by one State Party: *“Land rights are fundamental to everything in our country, people have the right to determine what happens on their land, including in any area that may be nominated under WH or any other designation”*.

There are a few state-owned protected areas in some PICTs, however, most are owned and managed by the local community, in some cases with support from local and international NGOs. Any planning and management of natural and mixed WH must thus be with and through local communities. Many issues associated with natural and mixed WH in PICTs have stemmed from poor communication and unrealistic expectations regarding what WH is and is not. Engagement with local communities must be open, transparent and based on the clear identification of the implications of natural WH. As one WH expert interviewed for this project noted: *“While we can argue of the benefit of WH on a global scale, if the landowners and local communities are not on board, it is irrelevant how much westerners/outside value the area as having OUV”*. Approaches to natural and mixed WH in the Pacific region also need to apply a rights-based approach to conservation²⁹². In addition, there are countries such as Solomon Islands which are struggling to find a workable balance between customary law and common law. The reality is that some customary practices have started to erode although they are still legal. It is a real challenge for Pacific society as a whole, but which also impacts nature conservation²⁹³.

285 More information at: <https://whc.unesco.org/en/activities/578/>.

286 More information at: <https://unfoundation.org/>.

287 More information at: <https://www.fauna-flora.org/>.

288 Through the Australian Department of the Environment (DoE) and James Cook University.

289 More information at: www.environment.gov.au/heritage/international-projects/papua-new-guinea.

290 More information at: <https://www.usaid.gov/>.

291 More information at: <https://www.nps.gov/index.htm>.

292 More information at: <https://portals.iucn.org/library/node/44765>.

293 Personal communication with Robbert Casier.

At the community level, there is a strong awareness and support for the protection of important sites, particularly cultural sites. It is important that the nomination and management of natural WH sites build on traditional systems of conservation, which have often involved protection of important natural and cultural resources to ensure their sustainable management. Systems have been developed over millennia to protect natural resources in PICTSs, such as *ra'ui* in the Cook Islands²⁹⁴ which is a traditional management and conservation system imposing restrictions on the use of resources of a particular area to allow for resource recovery to ensure sustainable harvesting. These typically are based on community management and traditional authority to ensure compliance. A number of approaches have been developed in the Pacific, such as Locally Managed Marine Areas (LMMAs)²⁹⁵ which are based on traditional conservation methods and management of natural resources.

It is also important to involve local communities in aspects of natural and mixed WH site management, such as the preparation of management plans, to ensure their considerable local knowledge of the local environment and natural resources is appropriately applied to effective management of these sites.

It is also important to develop programmes in and around natural WH sites which can provide tangible benefits to local communities, while protecting WH values. The presence, or absence, of such programmes will have a significant influence on the level of local community support and engagement with natural and mixed WH sites. As one State Party interviewee noted: *"Awareness of local people of WH is very limited, at the moment they are on survival mode with Covid and loss of income through the loss of tourism. Having land for the family, particularly for food, is the top priority. WH doesn't register as a priority"*.

The identification and nomination of any new natural WH sites must be accompanied by development of tangible and practical programmes that provide benefits, while protecting critical conservation values. The PNG State Party noted that they have been looking at benefit sharing with communities in conjunction with the consideration of potential natural and mixed WH sites, such as in relation to the promotion of tourism associated with the potential Kokoda Track natural and mixed WH site.

4.1.5 Capacity

There is limited capacity in the Pacific for the management of natural and mixed WH sites, at regional, national and local levels. The situation noted by Chape²⁹⁶ in 2012 is still applicable:

"Most PICTs lack trained personnel and the resources to effectively manage conservation areas. In many countries trained staff in national level environment agencies number less than 10, with resource management agencies dealing with forests and fisheries also limited in capacity. In comparison to Australia, New Zealand, the USA and other developed countries where millions of dollars and cadres of trained personnel are allocated for management of WH sites, this is a fundamental challenge for PICTs and Timor-Leste if they are to maintain WH sites in addition to other protected areas. While many aspects of management can be devolved to land and resource owning communities the example of East Rennell shows that this will only work if there is strong commitment by government in the face of external pressures driven by competing development factors".

Regarding capacity for WH, one reviewer²⁹⁷ noted: *"Capacity not only is the lack of skills or inadequate staff. For some much smaller island states (in comparison to the larger Melanesian and Polynesian countries) such as Palau, Cook Islands, Niue, etc, capacity is also the lack of manpower, i.e. the number of people needed to implement a program such as WH. Palau for example is a population of about 18,000 people. Perhaps an assessment of what number of people are needed to ensure adequate management and planning of WH sites should also be critically examined. Small island populations such as Palau have a high turnover of staff due to the diaspora of local residents going to developed countries for better living, new government administration transitions, and perhaps other factors not yet considered"*.

This project notes a number of gaps and deficiencies relating to capacity for natural and mixed WH management in the Pacific, including:

- Weak government agencies with inadequate staff to ensure effective management of WH natural sites. The need to build more effective and sustainable organisations for heritage conservation in the Pacific was noted by many consulted by this project. As noted, political interest and motivation in WH is also lacking, underlining the need to better articulate, communicate and mainstream the benefits of natural and mixed WH sites.
- The lack of awareness on elements of the WH Convention and, in particular, ways to access assistance to support nomination and management of natural and mixed WH sites.

294 More information at: <https://cookislands-data.sprep.org/dataset/marine-managed-areas-raui-rarotonga-and-pa-enua-documents>

295 More information at: <https://ipbes.net/policy-support/tools-instruments/locally-managed-marine-area#:~:text=A%20Locally%20Managed%20Marine%20Area,or%20are%20based%20in%20the>

296 Chape, 2012.

297 Kiblas Soaladaob, Bureau of Cultural and Historical Preservation, Palau.

- The lack of staff skills for managing natural and mixed WH sites, particularly in the areas of: (a) sustainable financing; (b) communication and engagement strategies for working more effectively with local communities; and (c) management planning, including tourism planning for appropriate, low impact, sustainable tourism.
- Gaps and deficiencies also extend to research and monitoring; there is a lack of trained personnel and resources for monitoring the status and trends in the natural values of the sites. This is critical for feeding into an adaptive management framework and informing decisions on management actions²⁹⁸.
- There is also a lack of skills relating to WH within SPREP. It is noted that a well-resourced WH officer based in the region could go a long way in progressing WH promotion and work. This position at SPREP should aim to assist the region in strengthening WH awareness, capacity and application of the WH Convention. Such a position would follow on from the success of the Ramsar Oceania Programme Officer based at SPREP from 2004-2015, initially funded by the Government of Australia and later by the Convention on Wetlands regional initiatives funding²⁹⁹. A possible model would be two/three officers responsible for a coordinated approach to RAMSAR and UNESCO/WHA (jointly funded) based in SPREP to allow networking with allied programmes such as BIOPAMA, PRISMSS, etc.

Capacity within national government agencies

Environmental management and biodiversity conservation is usually within much larger agencies, often recently amalgamated, to cover a range of functions such as climate change, disaster risk management, meteorological services, along with environment and biodiversity. Natural and mixed WH responsibilities are usually one of many functions of staff within biodiversity sections, it is rare to have a staff member within Pacific PICTs with sole responsibility for natural and mixed WH.

Efforts to highlight and strengthen natural and cultural WH management should be encouraged at all levels, particularly at the level of national legislation and policies within PICTs. Efforts to build effective agencies should be encouraged in all PICTs and Timor-Leste, drawing on relevant experience where possible. Activities currently underway in Fiji to develop a Heritage Bill (see Box 10), are particularly relevant for PICTs in applying the WH Convention within their own national planning and legislative frameworks.

Box 10. Experience from Fiji in developing a Heritage Bill

Experience from Fiji in developing a Heritage Bill

Fiji has been developing a Heritage Bill to ensure effective management of sites of natural and cultural importance, including WH sites such as the Levuka Historical Port Town, inscribed on the WH list under cultural criteria in 2013. The Bill was initially prepared in 2013 as a decree, then amended in 2016 into the Heritage Bill and then considered by the relevant Parliament Standing Committee (Justice, Law and Human Rights). It has yet to go formally before parliament. The bill provides for establishment of a WH Heritage Council which will:

- (a) oversee the identification of potential WH sites for Fiji;
- (b) oversee a WH register for Fiji; and
- (c) decide on the process for nominations for sites to the WH Committee.

It is anticipated the Council will play a key coordinating role rather than being a regulatory body. There are a number of issues still to be resolved, including financing mechanisms, such as Trust Funds, and the application of conditions for activities in WH sites and buffer zones. Public consultations are on-going.

Relevance for Pacific natural WH sites

- The approach of development of a Fiji Heritage Bill, while still on-going, has great relevance for WH in other PICTs and Timor-Leste. This could potentially provide a useful model for other PICTs on how to translate the WH Convention to national levels.
- Approaches such as the Fiji heritage Bill could serve to raise the profile and awareness of WH at national levels in the Pacific region.

More information at: <http://www.parliament.gov.fj/heritage-and-investment-fiji-bills-to-be-discussed-in-the-central-and-western-divisions/>.

Lack of awareness of elements of the WH Convention

The lack of awareness on elements of the WH Convention and, in particular, ways to access assistance to support nomination and management of natural and mixed WH sites, is a major constraint noted by all State Parties consulted for this project. This should be linked to the WH Communication Strategy outlined in Section 4.1.1 as well as through targeted training of key staff and stakeholders involved in natural and mixed WH management in PICTs. This should logically be a key responsibility of UNESCO WH Centre, along with the WH Advisory Bodies, and should be addressed as a priority.

²⁹⁸ Personal communication with Daniela Ceccarelli, AIMS.

²⁹⁹ Personal communication with Vainuupo Jungblut, SPREP.

Lack of skills of staff managing natural and mixed WH sites

Staff managing natural WH sites require skills in a number of areas including: (a) sustainable financing; (b) communication and engagement strategies for working more effectively with local communities; (c) management planning, including tourism planning for appropriate, low impact, sustainable tourism.

A tailored programme of capacity building for natural and mixed WH should be developed in the Pacific region, drawing on successful WH capacity building programmes such as the Enhancing our Heritage (EoH) Toolkit 2.0³⁰⁰ and drawing on the skills and expertise available within the region, wherever possible. There are many agencies in the Pacific with considerable experience in natural heritage conservation, which have the potential to assist with capacity building, including regional agencies such as USP³⁰¹, SPREP, IUCN and relevant NGOs such as CI, WWF and WCS. A partnership approach to addressing capacity needs for natural and mixed WH needs to be developed drawing on the experience of these agencies and drawing on tools developed for natural heritage conservation such as the Enhancing our Heritage Tool Kit³⁰², which aimed to improve monitoring and evaluation in natural and mixed WH sites, through developing assessment methods for heritage management systems and processes as well as social and ecological impacts. Capacity building should also consider peer to peer learning and sharing experiences among WH sites that have gone through the WH inscription process. There are many useful lessons to be learnt from this approach.

The IUCN Green List of protected and conserved areas³⁰³ (Box 11) is also a potentially important tool to support the management of natural WH sites and its application in the region should be considered in conjunction with the EoH Toolkit 2.0, as well as other relevant capacity building approaches.

There are tools and services available through IUCN and the BIOPAMA Programme (refer to Section 1.2.2) to support protected areas and heritage conservation. However, greater effort needs to be made to better link the services and tools available through BIOPAMA in the Pacific with the challenges facing natural WH sites in the Pacific, in particular East Rennell WH site and the PIPA in Kiribati.

Box 11. The IUCN Green List of Protected and Conserved Areas

The IUCN Green List of Protected Areas

The IUCN Green List of Protected and Conserved Areas is the first global standard of best practice for area-based conservation. It is a programme of certification for protected and conserved areas – national parks, natural WH sites, community conserved areas, nature reserves, etc. – that are effectively managed and fairly governed. By giving recognition to well-managed and well-governed protected and conserved areas, the IUCN Green List of Protected and Conserved Areas aims to increase the number of natural areas delivering long-lasting conservation results for people and nature. As noted by the IUCN Director General: “*The sites admitted to the IUCN Green List have distinguished themselves through exemplary management, fair governance and a long-term commitment to successful conservation. Effective protected and conserved areas are critical if we are to halt the dramatic loss of life on Earth we are seeing. As IUCN and the global community call for the protection of 30% of our planet’s surface by 2030, IUCN Green List sites provide the best examples of effectiveness and inclusiveness, which are essential for our efforts to succeed.*”

Relevance for Pacific natural WH sites

- The IUCN Green List provides an important tool for improving the capacity and management of natural WH sites in the Pacific. It is suggested the aim should be to have all natural WH sites in the Pacific certified under the Green List.
- Its application in the region should be considered in conjunction with the EoH 2.0 Toolkit, as well as other relevant capacity building approaches, to enhance and strengthen the capacity of natural WH managers in the Pacific.

Source: <https://www.iucn.org/theme/protected-areas/our-work/iucn-green-list-protected-and-conserved-areas>

300 For more information, see <https://www.iucn.org/resources/jointly-published/enhancing-our-heritage-toolkit-20>.

301 One reviewer noted: “USP would be a good centre for this. It could have a Conservation & Parks Management programme as a professional postgraduate course”.

302 The toolkit is a comprehensive set of evaluation methods to help natural and mixed WH site managers design and implement detailed management effectiveness assessments suitable for natural and mixed WH sites. The Enhancing our Heritage toolkit has had some application within the Pacific, including through a 2020 exercise led by ICCROM in Koror State regarding capacity in the Rock Islands. However, it can and should be more widely applied to support and enhance the skills of managers of natural and mixed WH sites in the Pacific.

303 More information: <https://www.iucn.org/theme/protected-areas/our-work/iucn-green-list-protected-and-conserved-areas>.

WH Site managers consulted for this project noted the importance of networks through which they can communicate and share experience with other WH managers, both in the Pacific region and around the world. An example provided was the WH Marine Managers Network³⁰⁴ (refer to Box 12), which has provided important linkages between managers of the Rock Islands Southern Lagoon, PIPA and Papahānaumokuākea WH sites with other managers of marine WH sites around the world.

Box 12. The UNESCO WH Marine Managers Network

The UNESCO WH Marine Managers Network

The UNESCO WH Marine Managers Network is a flagship network empowered to transform how we protect WH marine sites. The WH List includes 50 marine sites across 37 nations. Local managers at these sites have confronted every imaginable problem facing our temperate and tropical oceans, and many have created leading edge solutions. Tapping the vast expertise contained within the network helps accelerate achieving sustainable marine protected areas in the framework of the 2030 United Nations Sustainable Development Goals. Expertise is shared from across the network through site-to-site field visits, e-communication and tri-annual global managers conferences, facilitated by the WH Marine Programme. The WH Marine Managers Network has been one important outcome from the Global marine manager conferences and is seen as particularly relevant and valued. This network has enabled contact between participants on technical issues and has put participants in touch with other experts, to assist in addressing issues at their own marine WH sites. Survey results (below) indicated that the majority of survey participants are still in contact with other participants from the conference/training course they attended; additional comments from the survey indicate that the WH marine managers network provides an important means for enabling this contact.

Relevance for Pacific natural WH sites

- The WH Marine Managers Network provides an important mechanism for supporting information exchange and networking between Pacific marine WH sites with other sites around the world. This provides invaluable experience, knowledge and capacity building for Pacific WH managers.
- Mechanisms for networking and experience sharing between natural WH managers in the Pacific, based on the marine WH model should be considered, where possible in conjunction with other similar or related networks such as the Australian Government WH Forums, mentioned below.

Source: <https://whc.unesco.org/en/marine-managers/>.

The willingness of Metropolitan States involved in the Pacific to support capacity efforts for natural and mixed WH site managers was noted through consultations for this project. For example, the manager for the Papahānaumokuākea WH site noted they had communication and outreach between this site and the PIPA WH site, particularly in relation to the preparation of the PIPA Management Plan. In the development of the WH nomination process, Papahānaumokuākea learned from the process undertaken by Tongariro, Palau used a similar strategy and approach as Papahānaumokuākea in the development of their application. Each built from the lessons learned by previous sites and were in contact with each other during the WH nomination process. Sites such as Papahānaumokuākea, and WH sites in Australia and NZ, are much better resourced and managed than most natural WH sites in Pacific SIDS and opportunities for developing partnerships and cooperation should be explored.

Linkages between the WH Marine Managers Network and other related networks in the Pacific could also be explored to strengthen the capacity of natural and mixed WH managers in the Pacific. For example, the WH Branch within the previous Australian Department of the Environment and Energy has organised a number of WH Forums to serve as an information-sharing and relationship-building event over recent years. This has focused on those involved in Australian natural and mixed WH including State Parties, site managers, traditional owners, academics, researchers and other stakeholders. There is potential for involving PICTS natural and mixed WH managers in future Forums and this should be further explored.

4.1.6 Nature and culture linkages

Culture is integral to, and embedded in, the Pacific way of life. A number of cultural WH sites have been established and the application on the Convention on Intangible Cultural Heritage³⁰⁵ is also underway in the Pacific region³⁰⁶. There is great potential for strengthening linkages between natural and cultural WH sites in the Pacific. The Rock Islands Southern Lagoon, Papahānaumokuākea and Te Henua Enata- The Marquesas Islands WH sites are inscribed as Mixed WH sites, meeting the OUV standard on the basis of natural and cultural criteria. The Tongariro National Park (NZ) is a Cultural Landscape.

304 More information at: <https://whc.unesco.org/en/marine-managers/>.

305 Intangible cultural heritage refers to “traditions or living expressions inherited from our ancestors and passed on to our descendants, such as oral traditions, performing arts, social practices, rituals, festive events, knowledge and practices concerning nature and the universe or the knowledge and skills to produce traditional crafts”. More information at: <https://ich.unesco.org/en/convention>.

306 More information at: <https://ich.unesco.org/en/2003-convention-and-research-00945?page=6>.



Village elder describing traditional plant use on the island of Yap, Federated States of Micronesia © Stuart Chape.

Some cultural WH sites in the region have important natural values, such as Bikini Atoll which protects marine ecosystems. Whether natural values within existing cultural sites meet the threshold of “Outstanding Universal Value” for existing natural WH sites under the WH Convention has not been ascertained but is unlikely. A number of the existing natural WH sites have also been noted as having important cultural values, such as PIPA. Whether these cultural values meet the threshold of “Outstanding Universal Value” has also not been ascertained. It is also important to consider integrating cultural attributes, practices and beliefs within the management of natural WH sites regardless of whether they, in themselves, meet the OUV threshold, as an important principle for the management for any protected and conserved area.

WH also provides an important mechanism for bringing together agencies responsible for natural and cultural heritage in PICTS. The preparation of the UNESCO WH Regional Action Plan in 2021-2³⁰⁷ has also provided an excellent opportunity for increased cooperation between natural and cultural agencies within PICTs. Other cooperation has occurred on a number of occasions, often linked with activities such as the preparation of national WH Tentative Lists and WH Periodic reporting. For example, in Samoa the government established a Heritage Committee in 2004 to identify possible natural and cultural sites for nomination as WH. The Committee visited many areas and identified sites currently on the Tentative List. The Committee existed for a few years and then stalled, largely through lack of follow up activity. This was seen as a good initiative and a useful approach relevant to other PICTs to better link nature and culture.

Opportunities for enhanced nature-culture cooperation on WH should be explored in the future, including:

- giving greater emphasis to Mixed WH nominations.
- giving greater emphasis to application of the WH Cultural Landscape approach, drawing on relevant experience such as from the Tongariro WH site, the first cultural landscape in the world. The notion of cultural seascapes or cultural landscapes is coming into national conversations where communities are considering ways to define the meaning and importance of their land and sea areas and through agreed sustainable management arrangements³⁰⁸.
- undertaking more joint activities on aspects such as capacity building on heritage conservation.
- supporting national level processes which encourage greater cooperation between nature and culture regarding WH.

A number of persons interviewed for this project noted the importance of better linkage between natural and cultural WH in the Pacific and also the potential for wider application of the WH Cultural Landscape approach. In the Pacific, ocean connections and a cultural seascape approach need to be considered³⁰⁹. The experience of Tongariro, as the first designated CL in the world, is particularly relevant and opportunities for sharing experience and lessons with Pacific Island WH sites should be explored. Further information on WH cultural landscapes is outlined in Box 13, below.

307 This Regional Framework Action Plan for Asia and the Pacific was adopted at the extended 45th session of the World Heritage Committee in Riyadh, 2023

308 Personal communication with Tony O’Keeffe.

309 Personal communication with Athline Clark.

Box 13. WH cultural landscapes

WH cultural landscapes

There are 119 WH properties, with 6 transboundary properties, which have been included as cultural landscapes on the WH List. There are landscapes which are representative of the different regions of the world and represent a long and intimate relationship between peoples and their natural environment. Some Cultural Landscape sites reflect specific techniques of land use that guarantee and sustain biological diversity. Others, associated in the minds of the communities with powerful beliefs and artistic and traditional customs, embody an exceptional spiritual relationship of people with nature. These sites reveal and sustain the diversity of the interactions between humans and their environment, protect living traditional cultures and preserve the traces of those which have disappeared. Cultural landscapes - cultivated terraces on lofty mountains, gardens, sacred places - testify to the creative genius, social development and the imaginative and spiritual vitality of humanity. They are part of our collective identity.

Relevance for Pacific natural WH sites

- The Pacific has many outstanding examples which demonstrate the relationship between people and nature and which protect living traditional cultures.
- There are currently no WH Cultural Landscapes in the Pacific region covered by this report, although Tongariro NP (NZ) in the broader region, is a Cultural Landscape.
- Cultural Landscapes thus represent an under-represented designation under the WH Convention in the region

Source: <https://whc.unesco.org/en/culturallandscape/>

4.1.7 Coordination and partnership

Better partnerships are essential for natural and mixed WH to succeed in the region, at regional, national and local levels. In particular, better partnerships are required between:

- Relevant international agencies working on WH, particularly UNESCO and IUCN, and national agencies responsible for natural WH. Partnerships between NGOs and PICTs are particularly important in the Pacific given the important role many NGOs play in heritage conservation and biodiversity programmes in many existing and potential natural and mixed WH sites. These partnerships should deliver advice and support to PICTS and relevant agencies regarding all aspects of natural WH, including how to prepare WH nominations, how to ensure effective management of existing WH sites, and most importantly how to access support and resources to implement the WH Convention.
- Different levels of Government (national, provincial and island). The diverse governance models and institutional arrangements for natural and mixed WH in the Pacific require a tailored approach which encourages cooperation and builds on models which engage local communities, such as LMMAs and other traditional governance models. The challenge is illustrated in the comments from the site manager of the East Rennell WH site: *“Managing the different levels of government and associated politics is challenging, especially when dealing with, and balancing, issues from national and international levels (such as pressures from the WH Committee regarding the management of ER) on the one side and issues and expectations from the ER Council of Chiefs on the other. Local politics are major issues and there are differing levels of support from the Provincial and National Government levels. There is a disconnect between the Council of Chiefs and Honiara-based committees. In short, there are many challenges facing the site dealing with different levels of government”*.
- Different government agencies involved with natural WH. Better coordination and cooperation is essential between key government agencies. This is particularly important for marine WH sites in the Pacific, such as PIPA, the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems, and Papahānaumokuākea, where both Fisheries and Environment Ministries are usually involved. This also applies for potential transboundary marine WH sites, such as those proposed in the Coral Sea. Cooperation between natural and cultural agencies involved in WH is also important, particularly for mixed WH sites, such as the Rock Islands Southern Lagoon WH site, and cultural landscapes, and also in relation to cooperation on shared tasks and activities, such as the preparation of WH Tentative Lists.
- Between Government agencies and local communities. As noted, ownership of land and inshore marine resources is customary. The full engagement of traditional owners is critical at all stages of the process for natural and mixed WH sites, including identification, assessment and nomination process. This involvement must continue beyond inscription to ensure the WH site is managed in a way that protects WH values. Effective management and protection require the involvement of and partnership between local communities and government at national and provincial levels, as well as with relevant partners.

Mechanisms which encourage and facilitate partnership need to be encouraged. Examples where cooperation and partnership is working well for natural WH sites need to be identified and communicated. An example is provided by the Rock Islands Southern Lagoon WH site in Palau, where there is effective cooperation between the Palau National Government and the Koror State Government, with the UNESCO National Commission playing an important coordination role. As the representative of Koror State noted: *“Koror State has focussed on cooperation, collaboration and partnerships and this is now bearing fruit. It is a complex task, and it must be a partnership exercise. There needs to be increased collaboration between agencies who have interlinked roles, many agencies have a role in WH site management, and they must be involved as partners”*.

Better partnerships are essential if natural and mixed WH is to succeed in the Pacific. Key elements of success for such partnership include:

- effective leadership at all levels (as elaborated in Section 4.1.8)
- shared values and interests
- shared and cooperative tasks and responsibilities around WH

4.1.8 Leadership

Leadership is important at regional, national and local levels in the region for WH to succeed. An example of dynamic and effective leadership on WH at global and regional levels was provided when New Zealand was the Chair of the WH Committee in 2007, under the leadership of Maori High Chief Tumu te Heuhehu. In this instance the leadership and mana of the High Chief played a major role in developing the 2007 “Pacific Appeal”³¹⁰ (arising from a meeting in Tongariro) which set the framework for greater engagement of PICTs with the WH Convention. This played an important role in encouraging a number of PICTs and Timor-Leste to ratify and engage with the WH Convention. The Appeal was useful at the time for raising awareness of WH but was not followed up nor backed up by resources and implementation lagged accordingly. It could well be argued that this represents a failure of leadership as good leadership would have ensured that there is follow-through and that good ideas are implemented.

At a broader level the role of Micronesian Leaders was fundamental in the development of the Micronesian Challenge³¹¹, a major sub-regional initiative which stimulated conservation action in Micronesia towards effective management of at least 50% of marine resources and 30% of terrestrial resources by 2030 across the sub-region. The role and importance of high-level leadership was also shown by Pacific Island leaders in developing the groundbreaking Pacific Oceanscape initiative³¹².

The role of UNESCO in WH in the Pacific region is very important. UNESCO needs to play a major role in leading, guiding and supporting PICTs if natural and mixed WH is to succeed in the region.

Leadership at local levels is also essential. The support of community leaders, including community elders, the Church and associated groups, and Women’s Groups is essential for initiatives on natural and mixed WH to proceed. It is important that leaders at the community level, of these and other relevant groups, are involved at all stages of the WH process.

Government agencies, senior officials and other key stakeholders also have an important role if natural and mixed WH initiatives are to succeed. For example, the Minister for the Environment for Palau noted the important role of Koror State in leadership relating to the Rock Island WH site: *“There needs to be clear leadership from Koror State, they are the leader, and they must take these types of issues up. If anyone else takes on the lead role it would result in frictions. Honouring and respecting roles and relationships is critical, as has been shown in the lessons learned from many projects”*.

4.1.9 Broader context

Not all natural areas can meet the OUV WH criteria

All sites on the WH List must meet the rigorous criteria of OUV under the Convention and the conditions of integrity. It is important to ensure that only the sites with the highest chance of successful nomination are identified and proposed by PICTs. The WH Convention places emphasis on having WH sites added to the list and countries that ratify the WH Convention usually assume they will have at least one WH site in their country. However not all sites will meet the strict OUV and integrity criteria of the Convention, particularly those relating to protection and management. It is thus important to set and manage expectations within PICTs.

310 More information at: <http://press-files.anu.edu.au/downloads/press/p223681/html/ch02-smith.xhtml?referer=&page=6>.

311 More information at: <https://www.mc2030.org/>.

312 More information at: <https://sdgs.un.org/partnerships>.

There are other ways in which significant heritage values can be recognized in addition to WH, these include Wetlands of International Importance, also called Ramsar sites³¹³, which recognize wetland and marine sites of international importance. The UNESCO Biosphere Reserve Programme³¹⁴ is also relevant in the Pacific region, given its focus on enhancing the relationship between people and their environments through the establishment of Biosphere Reserves around the world³¹⁵. Important geological sites can also be recognized under the UNESCO Global Geopark Programme, which: *“are single, unified geographical areas where sites and landscapes of international geological significance are managed with a holistic concept of protection, education and sustainable development”*³¹⁶.

The establishment of a Pacific regional network which recognizes natural regional sites rather than of international significance was recommended by some interviewed for this project. There is a similar network in the Asian Region, the ASEAN³¹⁷ Heritage Parks³¹⁸ which are: *“Protected areas of high conservation importance, preserving in total a complete spectrum of representative ecosystems of the ASEAN region”*. This network recognizes a number of sites in the region, it is working effectively and is supported by ASEAN Member States.

Natural WH sites need to be integrated into the broader planning systems at national and local levels

Natural WH sites should not be considered in isolation, they should be integrated with relevant national and state planning instruments. At national levels, WH sites should be included and integrated within National Development Plans and NBSAPs. At local levels, WH sites should be integrated within land use planning programmes and provincial and state development planning. The requirement under the WH Convention for WH sites to have a buffer zone with integrated planning for the WH site with surrounding land and water areas is also an important requirement which needs to be rigorously and effectively applied in PICTSs.

4.2 Strengths, Weaknesses, Opportunities, Threats (SWOT) analysis of natural and mixed WH in the Pacific region.

Table 8, below, outlines key strengths, weaknesses, opportunities and threats of natural and mixed WH in the Pacific region, based on consultations undertaken for this project and a review of relevant information.

Table 8. SWOT Analysis of Natural WH sites in the Pacific region

SWOT analysis of natural WH sites in the Pacific region	
Strengths	<ul style="list-style-type: none"> (a) The WH Convention mirrors the links in the Pacific region between nature, culture, people and communities. The Convention links with and reinforces the Pacific's history of customary management of natural and cultural resources which has ensured sustainability. (b) WH provides an unparalleled opportunity to showcase the unique nature and culture of the Pacific region at a global stage. (c) WH provides opportunities for sustainable development for national governments and local communities, including through sustainable tourism, although the full potential of this has not been realized. (d) WH listing has protected important natural areas and, in some cases, has stopped inappropriate development. For example, the WH listing of the Rock Islands Southern Lagoon in Palau played a key role in stopping an inappropriate hotel resort development adjacent to this WH site. (e) WH provides a framework for capacity building in heritage conservation, which is particularly important given the limited capacity for natural and mixed WH in most PICTSs. (f) WH is a recognized global label, which can support efforts to raise funding for heritage management, although the full potential of this has yet to be realized in the Pacific region. (g) WH can provide a framework for encouraging cooperation on heritage conservation between different levels of government and between PICTs and partners. NGOs have played an important role in supporting conservation efforts in several existing and potential WH sites. (h) There have been some natural and mixed WH success stories in the Pacific region, such as the Rock Islands Southern Lagoon and the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems. (i) WH has potential to be a flagship for broader heritage conservation efforts in the region, although this potential has not been realized to date.

313 More information at: <https://www.ramsar.org/>.

314 More information at: <https://en.unesco.org/mab>.

315 The World Network of Biosphere Reserves currently includes 759 sites in 136 countries around world.

316 There are currently 213 UNESCO Global Geoparks in 48 countries, more information at: <https://en.unesco.org/global-geoparks>.

317 ASEAN — Association of Southeast Asian Nations.

318 More information at: <https://www.biodiversitya-z.org/content/asean-heritage-parks>.

SWOT analysis of natural WH sites in the Pacific region	
Weaknesses	<ul style="list-style-type: none"> (a) Unrealistic expectations about WH have posed significant problems for natural WH sites in the Pacific, particularly regarding what is required after inscription as WH and what benefits WH will deliver to local communities. There is an expectation that WH listing will deliver funding and other benefits however this has not been the case in the Pacific region. (b) Limited funding and resources for all phases of WH, including nomination and management. A particular issue is the exorbitant cost of preparing WH nominations, linked with the lack of domestic PICT experts to prepare them and the consequent expense of hiring international consultants. (c) Most natural WH sites have inadequate management, reflecting inadequate resources available to WH management agencies and State Parties. (d) There is a low level of interest and awareness in WH in most PICTs and Timor-Leste. (e) WH is generally poorly integrated within and across government agencies within countries, it sits outside day-to-day work of government departments. (f) There is a poor linkage between nature and culture in relation to the WH Convention in the Pacific, approaches to natural values have not taken cultural values on board sufficiently, and vice-versa. Agency structures in PICTs reinforce this separation, with separate environment and cultural ministries with limited opportunity or incentive to cooperate. (g) WH in the Pacific region has a much lower profile and level of awareness than CBD, UNFCCC and other programmes. In part this reflects the fact that these Conventions are associated with financial instruments which deliver funding and tangible benefits to PICTs, while the WH Convention has not delivered in this way. (h) There has been no effective representation from the region on the WHC since 2007 after the New Zealand mandate as WH Chair ended — the benefits for governments to use valuable resources to support this are unclear and delegations are costly to mobilize.
Opportunities	<ul style="list-style-type: none"> (a) The “twinning” of WH sites in Pacific countries with sites in non-Pacific countries (including Australia and NZ) would provide an important opportunity to support and strengthen establishment and management of WH sites in the Pacific. (b) WH provide opportunities for raising the profile of particular sites and issues in the Pacific at global, regional and national levels. (c) WH is a globally recognized brand which could enhance and support heritage conservation throughout the region. (d) WH can be a source of considerable national and local pride in that these sites are those recognized as being of international importance and significance. (e) WH provides a vehicle for recognizing and reinforcing the close link between nature and culture in the Pacific region. (f) There are opportunities for increased funding for PICTs and WH sites, including through tourism, however this will need to be approached in a more strategic manner than previously.
Threats	<ul style="list-style-type: none"> (a) Most natural WH sites face significant direct and indirect threats, as detailed in Section 2.5, including climate change, invasive species and overuse of marine resources. (b) Resource developments such as logging and mining are a threat to existing and potential natural WH sites in the Pacific, particularly in Melanesia. (c) Lack of interest in WH and a perceived lack of tangible benefits arising from WH may contribute to limited progress for the WH Convention in the Pacific region, it could even potentially lead to the WH Convention fading away in the Pacific region, unless action is taken to address the challenges and issues that exist. (d) The significant reporting burden created when sites are inscribed on the WH list, as management plans and other reporting and M&E are required. Whilst these ultimately strengthen management of the site (if undertaken), there is also the threat that without the resources to complete these? they add to the existing pressures already faced by management authorities managing WH sites.

Looking ahead: Overview of possible priorities for new natural World Heritage sites

5



5.1 Tentative Lists

5.1.1 Introduction to Tentative Listing process

A WH Tentative List³¹⁹ is an inventory of those properties which each State Party under the WH Convention intends to consider for nomination. The purpose of Tentative Lists is for State Parties to carefully consider and bring forward a list of those natural and/or cultural sites they consider have potential to have the necessary OUV and conditions of integrity to be inscribed on the WH List. More information on Tentative Lists is outlined in Box 14. The UNESCO WH Centre, with the WH Advisory Bodies, has produced further guidance on how to refine and revise Tentative Lists³²⁰ and this provides a valuable source of advice for PICTs and Timor-Leste as they consider the nomination of possible natural and mixed WH sites.

Box 14. Tentative Lists under the WH Convention

Tentative Lists under the WH Convention

Under the WH Convention States Parties are encouraged to submit “Tentative Lists”, properties which they consider to be cultural and/or natural heritage of outstanding universal value and therefore suitable for inscription on the WH List. States Parties are encouraged to prepare their Tentative Lists with the participation of a wide variety of stakeholders, including site managers, local and regional governments, local communities, NGOs and other interested parties and partners. States Parties should submit Tentative Lists, which should not be considered exhaustive, to the WH Centre, at least one year prior to the submission of any nomination. States Parties are encouraged to re-examine and re-submit their Tentative List at least every 10 years. States Parties are requested to submit their Tentative Lists using a Tentative List Submission Format, in English or French, containing the name of the properties, their geographical location, a brief description of the properties, and justification of their outstanding universal value. Nominations to the WH List will not be considered unless the nominated property has already been included on the State Party’s Tentative List. Once inscribed on the WH List, properties are removed from the Tentative Lists of States Parties.

Relevance for Pacific natural WH sites

- WH Tentative Lists provide an opportunity for PICTs to carefully assess their potential sites which may have potential as WH.
- Tentative Lists are an important tool for assessing potential WH sites and building awareness at all levels regarding WH.
- However, the effectiveness of Tentative Lists in PICTs has been limited and further elaboration is outlined in Section 5.1.3 the Pacific.
- Guidance on revision of tentative Lists from UNESCO provides a valuable source of advice for PICs.

Source: <http://whc.unesco.org/en/tentativelists/>

The UNESCO WH Centre and the WH Advisory Bodies have developed an approach referred as Upstream Processes³²¹ to complement the process of Tentative Listing. More detail is outlined in Box 15. This process involves working proactively with State Parties to identify sites which may have potential as WH. This aims to ensure that sites of OUV are included on the WH List and also seeks to avoid countries going through the expensive and time-consuming process of nomination and then having their site not accepted by the WH Committee. The Upstream Process is also guided and informed by thematic studies prepared by the Advisory Bodies on key thematic areas. The process of preparing Tentative Lists should also be considered as an integral element of Upstream Processes. Capacity development is an integral component of the Upstream Processes. Application of these processes helps to avoid potential problems once a nomination is submitted and enters the evaluation cycle. In that respect, the upstream support is most effective through the earliest possible collaboration between the State Party and Advisory Bodies. Consultation on the development of Tentative Lists can ensure that the strongest candidates for nomination are brought forward and in the best possible configurations.

319 More information at: <http://whc.unesco.org/en/tentativelists/>.

320 More information at: <https://whc.unesco.org/en/documents/184566>.

321 More information at: <https://whc.unesco.org/en/upstreamprocess/>.

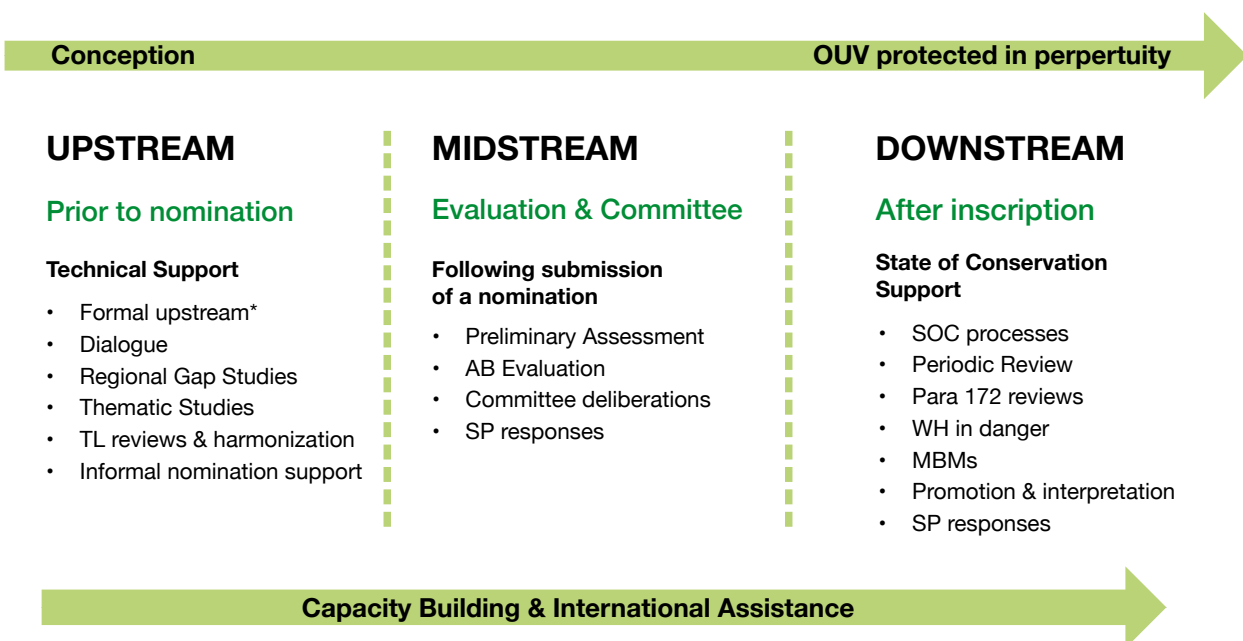
Box 15. Upstream processes for the WH Convention

Upstream processes for WH

The ability to evolve is one of the main strengths of the WH Convention. While the Convention itself is essentially set in stone, the flexibility of the Operational Guidelines, through which the provisions and principles of the Convention are implemented, reflect the evolution of notions and processes and include new ones. These enrich the Convention while remaining true to its spirit. The new concept of the Upstream Process was introduced in 2010, upon considering the difficulties experienced with some challenging nominations and to ensure the best candidate sites come forward. This process is groundbreaking in that it enables the Advisory Bodies and the Secretariat to provide advance support in the form of advice, consultation and analysis, directly to States Parties prior to the preparation or submission of a nomination. The main aim of the Upstream Process is to reduce significant problems encountered during the evaluation process for more challenging nominations. This process was first implemented through a series of pilot projects and subsequently extended, as States Parties' interest grew and the number of upstream support requests steadily increased. Recognising that the Upstream Process is now accepted as an integral part of the nomination process, the WH Committee, at its 39th session (Bonn, 2015), officially integrated it into the Operational Guidelines by including an official definition of this process and amending Paragraphs 71 and 122.

More information is provided in the attached graphic from Peter Shadie (ex-IUCN staff) to show the different levels of support relevant to natural WH processes, this gives a broad indication of how the whole "WH ecosystem" is meant to work and the context of upstream in the overall process of adding sites to the World Heritage list and ensuring their values are protected.³²²

Making sense of World Heritage processes... idea to reality



** Submitted via OG Annex 15. Reviewed by AB Panels without prejudicing independent technical evaluation of nominated sites for World Heritage Listing

Relevance for Pacific natural WH sites

- This project is one part of the Upstream Process for natural and mixed WH in the Pacific region.
- This needs to be complemented by other inputs to refine and revise tentative lists in individual PICTs.
- Further support from UNESCO and IUCN should be sought to support this process of further refinement.

Source: <https://whc.unesco.org/en/upstreamprocess/>

³²² This figure does not include the introduced Preliminary Assessment process- the first stage of the WH nominations process, which is required to occur before the submission of a full nomination dossier between upstream and midstream.

5.1.2 Status of WH Tentative Lists for PICTs and Timor-Leste

Table 9³²³ outlines natural and mixed Tentative List sites in the wider Pacific region (as of October 2021; limited to those most relevant in the Pacific Island context of this study). The development of a tentative List is a prerequisite to nomination of sites by State parties to the UNESCO WH Convention. The broad physical and biological categories were adapted from Dingwall (2012), all other information is from the UNESCO WH Tentative Lists (UNESCO, 2021b).

Table 9. Status of WH Tentative Lists for PICTs and Timor-Leste, and the broader region, covering natural and mixed WH sites

State Party	Site	Type	Criteria on Tentative List	Marine areas	Year of submission	Category (adapted from Dingwall, 2012)
Fiji	Sovi Basin	Cultural (?)	(iii)(iv)(v) (but text suggests this is intended as a natural site)	No	1999	Volcanic islands and features; Forest biota and habitats
Fiji	Sigatoka Sand Dunes	Cultural (?)	(iii)(iv)(v) (but text suggests this is intended as a natural site)	No	1999	Volcanic islands and features; Forest biota and habitats
Fiji	Yaduatuba Crested Iguana Sanctuary	Natural	(x)	No	1999	Forest biota and habitats
Indonesia ³²⁴	Raja Ampat Islands	Natural	(vii)(x)	Yes	2005	Karst landscapes; Marine biota and habitats
Marshall Islands ³²⁵	Mili Atoll Nature Conservancy (and Nadrikdik)	Natural	Missing	Yes	2005	Coral islands, atolls and reefs; Marine biota and habitats
Marshall Islands	Northern Marshall Islands Atolls	Mixed	Missing	Yes	2005	Coral islands, atolls and reefs; Marine biota and habitats
New Zealand	Kermadec Islands and Marine Reserve	Natural	(vii)(viii)(ix)(x)	Yes	2007	Volcanic islands and features; Marine biota and habitats
New Zealand	Whakaruia Moutere (North East Islands)	Natural	(vii)(viii)(ix)(x)	Yes	2007	Volcanic islands and features; Marine biota and habitats
Palau	Imeong Conservation Area	Mixed	Missing	No	2004	Lagoon systems, barrier reefs and mangrove forests
Papua New Guinea	Huon Terraces - Stairway to the Past	Mixed	(iii)(v)(vii)(viii)(ix)(x)	No	2006	Tectonic geology; Forest biota and habitats
Papua New Guinea	Kikori River Basin / Great Papuan Plateau	Mixed	(iii)(iv)(v)(vii)(viii)(ix)(x)	No	2006	Karst landscapes; Forest biota and habitats
Papua New Guinea	Kokoda Track and Owen Stanley Ranges	Mixed	(iii)(v)(vi)(vii)(x)	No	2006	Forest biota and habitats

³²³ Source: JRC, European Commission.

³²⁴ This site is not within the Pacific region but included here as sites are considered within the “wider region” and of broader relevance to this report.

³²⁵ The two RMI sites on the WH Tentative list were submitted by the Alele Museum to UNESCO. It is assumed these were discussed with and supported by OEPPC.

State Party	Site	Type	Criteria on Tentative List	Marine areas	Year of submission	Category (adapted from Dingwall, 2012)
Papua New Guinea	Milne Bay Seascape (Pacific Jewels of Marine Biodiversity)	Mixed	(iii)(v)(vii)(viii)(ix)(x)	Yes	2006	Coral islands, atolls and reefs; Marine biota and habitats
Papua New Guinea	The Sublime Karsts of Papua New Guinea	Mixed	(v)(vii)(viii)(ix)(x)	No	2006	Karst landscapes; Forest biota and habitats
Papua New Guinea	Trans-Fly Complex	Mixed	(v)(vi)(x)	No	2006	Forest biota and habitats
Papua New Guinea	Upper Sepik River Basin	Mixed	(i)(iii)(iv)(v)(vii)(viii)(ix)(x)	No	2006	Forest biota and habitats
Samoa	Fagaloa Bay - Uafato Tiavea Conservation Zone	Mixed	(v)(vii)(x)	Yes	2006	Volcanic islands and features; Forest biota and habitats
Solomon Islands	Marovo - Tetepare Complex	Mixed	(iii)(v)(vi)(vii)(viii)(ix)(x)	Yes	2008	Lagoon systems, barrier reefs and mangrove forests
Solomon Islands	Tropical Rainforest Heritage of Solomon Islands	Natural	(vii)(ix)(x)	No	2008	Forest biota and habitats
USA	Marianas Trench Marine National Monument	Natural	(viii)(ix)(x)	Yes	2017	Tectonic geology; Marine biota and habitats
USA	Marine Protected Areas of American Samoa	Natural	(vii)(ix)(x)	Yes	2017	Coral islands, atolls and reefs; Marine biota and habitats
USA	Pacific Remote Islands Marine National Monument	Natural	(vii)(viii)(x)	Yes	2017	Coral islands, atolls and reefs; Marine biota and habitats
Vanuatu	Lake Letas	Natural	(vii)(ix)(x)	No	2004	Volcanic islands and features
Vanuatu	Vatthe Conservation Area	Natural	(vii)(ix)(x)	No	2004	Forest biota and habitats

The Tentative List sites are also shown in Figure 4 which provides an overview of sites included on the Tentative Lists of States Parties in the Pacific region for potential consideration as natural or mixed nominations (as of May 2024). Sites are shown as points except in cases where a polygon for the corresponding protected area was available from the World Database on Protected Areas. The land and sea areas of the 23 countries and territories covered by this report are indicated in green and blue respectively. The map includes two Fijian sites that appear to be included under cultural criteria only in UNESCO's Tentative List database: the Sigatoka Sand Dunes and the Sovi Basin³²⁶ (these sites are further discussed below).



Figure 4. Overview of sites included on the Tentative Lists of States Parties in the Pacific region for potential consideration as natural or mixed nominations (as of May 2024). Produced by Luca Battistella

Label	Tentative List Site	State Party
1	Sigatoka Sand Dunes	Fiji
2	Sovi Basin	Fiji
3	Yaduataba Crested Iguana Sanctuary	Fiji
4	Raja Ampat Islands	Indonesia
5	Mili Atoll Nature Conservancy (and Nadrikdrik)	Marshall Islands
6	Northern Marshall Islands Atolls	Marshall Islands
7	Kermadec Islands and Marine Reserve	New Zealand
8	Whakarua Moutere (North East Islands)	New Zealand
9	Imeong Conservation Area	Palau
10	Huon Terraces - Stairway to the Past	Papua New Guinea
11	Kikori River Basin/Great Papuan Plateau	Papua New Guinea
12	Kokoda Track and Owen Stanley Ranges	Papua New Guinea
13	Milne Bay Seascape (Pacific Jewels of Marine Biodiversity)	Papua New Guinea
14	The Sublime Karsts of Papua New Guinea	Papua New Guinea
15	Trans-Fly Complex	Papua New Guinea
16	Upper Sepik River Basin	Papua New Guinea
17	Fagaloa Bay - Uafato Tiavea Conservation Zone	Samoa

³²⁶ Sources: FAO, 2015; Flanders Marine Institute, 2019; UNEP-UNEP-WCMC & IUCN, 2021; UNESCO, 2021b.

Label	Tentative List Site	State Party
18	Marovo - Tetepare Complex	Solomon Islands
19	Tropical Rainforest Heritage of Solomon Islands	Solomon Islands
20	Marianas Trench Marine National Monument	USA
21	Marine Protected Areas of American Samoa	USA
22	Pacific Remote Islands Marine National Monument	USA
23	Lake Letas	Vanuatu
24	Vatthe Conservation Area	Vanuatu

5.1.3 Overview and Analysis of Tentative Lists for natural WH sites in the Pacific region

The following observations and analysis can be made in relation to existing PIC natural and mixed Tentative Lists:

- Most Pacific countries that are State Parties to the WH Convention have prepared Tentative Lists.
- Most of these Tentative Lists were prepared some time ago, many during the period when New Zealand, as Chair of the WH Committee in 2007, supported many PICs to join the WH Convention and to prepare Tentative Lists. Most Lists have not been revised since then and are thus mostly out of date, in large part reflecting a general lack of capacity within Pacific countries for heritage management, as outlined in Section 4.1.5.
- There have been two exercises to revise Tentative Lists in PICTs over the last 10 years, in PNG and in the American Territories and Associated States. The Cook Islands and Tuvalu also submitted their first Tentative Lists to the WH centre in January 2024 (although no natural or mixed sites were included). PNG engaged a consultant, with support from Australia, in 2015 to review and revise their Tentative List and to identify priorities. The resulting report³²⁷ was noted as a useful and productive product which has greatly assisted with priority setting. The revision of Tentative Lists in the American Territories and Associated States was undertaken through a workshop in Guam in 2018³²⁸ and this was also noted as a useful process.
- These exercises to revise Tentative Lists were noted as relevant and useful exercises and that an important secondary benefit was that the process enhanced communication and cooperation between a range of actors involved in WH in the respective countries, including those working in the areas of natural and cultural heritage. This benefit was also noted by the other State Parties in relation to the process of developing Tentative Lists. For example, in Samoa a “Heritage Committee”, comprising the Ministry of Education for cultural sites and MNRE for natural sites developed a list of sites which could potentially be suitable as WH, after a range of field visits to sites in Samoa and consultation with local communities³²⁹. This process raised the profile of WH in Samoa and was well received at the time. However, it was not followed up and the level of interest in WH has waned since then.
- Any future review of existing natural and mixed tentative lists should also consider existing cultural site tentative lists to assist in exploring potential overlaps and synergies. Such an approach could also encourage collaboration between relevant government agencies collaborating across both natural and cultural World Heritage.

The following conclusions can be drawn regarding Tentative Lists for natural WH sites in the Pacific:

- The majority of existing PIC Tentative Lists for natural WH sites are out of date and require revision and updating.
- PICs consulted for this project noted a general lack of understanding about Tentative Lists and their role in the WH process. However, all agreed on the benefits of up-to-date WH Tentative Lists, noting they would like to update their Tentative Lists.
- There was agreement on the benefits of the Tentative Lists process for increasing the profile of WH and also improving cooperation between stakeholders on WH.
- All agreed that a shorter list of natural and mixed sites would be desirable, some PICs, including Solomon Islands and Palau noted a preference to concentrate on their existing WH sites rather than proposing additional sites for the nomination process.
- The preparation of Tentative Lists requires time and funding which is beyond the resources of most PICs and external support is required for their revision. Given these resource constraints at national levels, it may be worth developing a strategic regional process for revising and harmonizing Tentative Lists. This may be easier to support and ultimately more effective than national approaches.
- The guidance available from UNESCO on developing and revising Tentative Lists as well as on the Upstream Process is useful and applicable in the Pacific region. Support should be sought from UNESCO, IUCN and other organisations to support application of this guidance in revising Tentative Lists in PICs.
- Many of the PIC Tentative Lists currently do not include all priority high value conservation areas with OUV potential. Information on potential WH sites as outlined in Sections 5.2 and 5.3 of this report provides an important input for the revision of Tentative Lists for natural and mixed WH sites.

³²⁷ Hitchcock & Gabriel, 2015.

³²⁸ More information at: <https://www.Pacificpreservation.org/worldheritage>.

³²⁹ Personal communication with the State Party of Samoa.

5.2 Suggested priorities from expert consultations for natural and mixed WH

Several experts were consulted for this project and asked to suggest areas which may have potential as natural and mixed WH. The responses are outlined in Table 10. It is noted that some of these sites are on the Tentative Lists of PICTs as previously outlined, some are not. Listing in the table below is not a commentary as to whether a site has WH value nor whether countries have agreed with the sites outlined. It is simply a listing of sites identified by reviewers as potentially having WH values.

Table 10. Possible WH sites proposed by experts consulted for this project

PICTs ³³²	Possible WH sites ³³³	Comments
American Samoa	Pacific Remote Islands, American Samoa³³⁴	<p>(a) Pacific Remote Islands is on the USA Tentative List ³³⁵.</p> <p>(b) Reviewers note this as a possible transboundary site with the Fagaloa Bay Uafato Tiavea Conservation Zone Samoa³³⁶. However others noted the American Samoa National Marine Sanctuary and the Fagaloa Bay area are more appropriate as a potential transboundary WH site, rather than the Pacific Remote Islands, which are not that similar in culture or biological features.</p> <p>(c) Initial discussions were held through the “Two Samoas Initiative” in relation to Fagaloa Bay but further work would be required, under the framework of this initiative, if this was to proceed.</p>
Cook Islands	Marae Moana Marine Park³³⁷	<p>(a) Not on the Cook Islands Tentative List.</p> <p>(b) Marae Moana is a multi-use marine park – an area to be managed for sustainable use (i.e. through Marine Spatial Planning, or MSP, whereby MPAs are established through Section 24 of the Marae Moana Act 2017 out to 50nm around all islands, in which no commercial fishing or mining can occur. Marae Moana cannot be considered an MPA given there are commercial fishing activities, which is in contrast to IUCN Motion 66, and also seabed mineral exploration licenses granted in March 2022.</p> <p>(c) Reviewers note the entire Marae Moana area is unlikely to be considered for WH but there are sites within Marae Moana that may have WH potential.</p> <p>(d) Should the Government of the Cook Islands wish to proceed, marine areas of significance that potentially meet the WH criteria should be identified, established through MSP zoning under the Act, and then added to the TL for the Cook Islands as a potential WH nomination.</p>
Cook Islands	Suvarrow National Park	<p>(a) Not on the Cook Islands Tentative List.</p> <p>(b) Suvarrow National Park is a globally significant breeding, nesting and migration habitat for sea birds, including 3% of the global population of Red-tailed tropicbirds and 9% of the global population of Lesser frigatebirds. Additionally, there are several threatened megafaunal marine species, such as green turtle, humphead wrasse, giant manta ray, whale shark (all EN) and sperm whale (VU). It may thus have potential to meet criterion (x) as an important natural habitat for the in situ conservation of threatened biodiversity.</p> <p>(c) Given Suvarrow is uninhabited, it is also likely to meet the integrity criteria and is already a legally established PA and recognised KBA, IBA & EBSA, with clear governance (by government – NES is the management authority), making it potentially a relatively simple nomination to bring forward.</p>
FSM³³⁸	Pohnpei Uplands FSM (cloud forest)	<p>(a) Not on the FSM Tentative List.</p> <p>(b) Reviewers noted the critical importance of the cloud forest on Pohnpei which is part of the tropical and subtropical moist broadleaf forest ecoregion in Micronesia³³⁹.</p> <p>(c) Reviewers noted the potential for this to be considered as part of a possible Pacific Cloud (or Sky) Forest serial nomination comprising intact cloud forests in countries throughout Oceania (refer transboundary section below) High value cloud forests on Kosrae and Chuuk, could also potentially be considered as part of this serial nomination.</p> <p>(d) Reviewers noted the FSM Cloud Forest is also a culturally important area and could perhaps be considered as a mixed site nomination.</p>

³³² Pacific Island Countries and Timor-Leste and Territories.

³³³ Possible natural and mixed WH sites as suggested through expert consultations.

³³⁴ More information at: <https://www.fisheries.noaa.gov/pacific-islands/habitat-conservation/pacific-remote-islands-marine-national-monument>.

³³⁵ More information at: <http://whc.unesco.org/en/tentativelists/6236/>.

³³⁶ More information at: <https://whc.unesco.org/en/tentativelists/5090/>.

³³⁷ More information at: <https://www.maraemoana.gov.ck/>.

³³⁸ FSM - Federated States of Micronesia.

³³⁹ More information at: <https://www.oneearth.org/ecoregions/carolines-tropical-moist-forests/>.



Local community members weaving Areca palm leaves at a 'Yapese Disk Money Site' (a current cultural tentative list site) on the island of Yap, Federated States of Micronesia © Stuart Chape

Table 10. contd.

PICTs ³³⁰	Possible WH sites ³³¹	Comments
	Mahkontowe Conservation Area and Chuuk Lagoon.	<p>(a) Not on the FSM Tentative List.</p> <p>(b) The Mahkontowe Conservation area³⁴⁰ (Kosrae State) is a 15 square kilometre area which hosts a unique variety of significant cultural, archaeological, and biological aspects.</p> <p>(c) Chuuk Lagoon (Chuuk State) is noted as having important marine values and also important cultural values given the Japanese ships sunk in the lagoon during World War II.</p> <p>(d) Both sites were noted by reviewers as having important natural and cultural values.</p> <p>(e) The interview with the FSM State Party noted the potential of the Mahkontowe Conservation Area as a possible natural and mixed WH site. The FSM State Party also noted Chuuk Lagoon as a possible natural and cultural WH site.</p>
Fiji	Taveuni Island³⁴¹	<p>(a) Not on the Fiji Tentative List.</p> <p>(b) A large part of Taveuni is forest reserve and nature reserve. It has important natural values in terms of endemic species, including rare and critically endangered species such as the red-throated lorikeet but has also suffered from impacts of agricultural expansion and invasive species (American iguana).</p>
	Sigatoka Sand Dunes National Park (potential mixed site)³⁴²	<p>(a) On the Fiji Tentative List as a natural site but may have potential as a mixed site, noting the important cultural/archaeological values of the site in the Pacific context.</p>

³⁴⁰ Pacific Island Countries and Timor-Leste and Territories.

³³¹ Possible natural and mixed WH sites as suggested through expert consultations.

³⁴⁰ More information at: <https://irma.kosraestate.gov.fm/mca/>.

³⁴¹ More information at: <http://datazone.birdlife.org/site/factsheet/taveuni-highlands-iba-fiji/text> and <https://www.fiji.travel/places-to-go/taveuni-island>.

³⁴² More information at: <https://national-parks.org/fiji/sigatoka-sand-dunes>.

Table 10. contd.

PICTs ³³⁰	Possible WH sites ³³¹	Comments
	Lau Seascape Initiative	<p>(a) Not on the Fiji Tentative List.</p> <p>(b) The Lau Seascape³⁴³ is a partnership between iTaukei Affairs, the Lau Provincial Council and Ministry of Fisheries. The State Party and NGOs, including CI, have been developing the Lau Seascape initiative to protect the ecosystems of Fiji's Lau Islands.</p> <p>(c) This area has important biodiversity values and has been discussed as a possible natural and mixed WH or WH cultural landscape. Local communities have been fully involved in the development of conservation programmes in this area and discussions of this site as a possible WH site.</p>
Guam and Northern Marianas	The Marianas Trench Marine National Monument³⁴⁴	<p>(a) On the USA Tentative List, established by US Presidential Proclamation 2009.</p> <p>(b) Number of reviewers noted the global significance of this area.</p> <p>(c) Includes submerged lands and waters of the Northern Mariana Islands (CNMI) and Guam.</p> <p>(d) The Mariana Trench includes some of the deepest known areas on Earth. It also includes a range of important geological features, including a subduction zone, back arc basins, an active simmering island, and submarine volcanoes.</p>
Palau	Northern Peleliu Lakes (sandflats) in Peleliu State	<p>(a) Not on the Palau Tentative List.</p> <p>(b) Noted by several reviewers as having potential for being added to the existing Rock Islands Southern Lagoon WH site, as an extension, on the basis of its importance for migratory birds, including the critically endangered great knot and far eastern curlew, and critically important bird habitat.</p> <p>(c) Reviewers noted the Northern Peleliu Sandflats are the most significant migratory bird habitat in Oceania. Also, that protecting this site as WH would be a source of great national (and Peleliu State) pride.</p> <p>(d) The island has been designated an Important Bird Area (IBA) by BirdLife International.</p>
	Re-nomination of Rock Islands Southern Lagoon to address geological criteria	<p>(a) Site on the WH List but re-nomination not on Palau Tentative List.</p> <p>(b) Geology reviewers noted the Rock Islands has potential to meet criteria viii for geological values, noting it provides an outstanding example of drowned humid tropical cone karst.</p>
Papua New Guinea	Huon Terraces³⁴⁵	<p>(a) On the PNG Tentative List. 2015 review of the PNG Tentative List noted this site was well advanced towards nomination.</p> <p>(b) This tectonic and latitudinal setting allows the formation of spectacular uplifted coral terraces, which record the high sea level of the interglacial period³⁴⁶.</p> <p>(c) Noted by geological experts as having very important geological values. One reviewer noted: "one of the world's best records of sea level change, locality of considerable international scientific importance".</p> <p>(d) Additional support to the PNG Government would be required to prepare a WH nomination dossier and to ensure effective management of the site.</p>
	Kokoda Track and Owen Stanley Ranges³⁴⁷	<p>(a) On the PNG Tentative List. 2015 review of the PNG Tentative List noted this site was well advanced towards nomination with high potential for WH.</p> <p>(b) The property is on the Tentative List as a mixed cultural and natural site covering a significant proportion of the Owen Stanley Ranges near Port Moresby and potentially including the Kokoda Track, Managala Plateau and Mount Victoria and Mount Albert Edward region. The Owen Stanley Ranges, through which the Kokoda Track passes, is one of the most biologically important areas in the Asia Pacific region. The Owen Stanley Mountains Centre of Plant Diversity has one of the richest floras of any mountain range in New Guinea. The Central Papuan Mountains Endemic Bird Area is one of the richest areas for endemic birds on earth with 510 species (almost two thirds of all New Guinea birds) and 40 endemic or near endemic species³⁴⁸.</p> <p>(c) Work on the assessment of the potential WH values of this site has been supported by the Government of Australia.</p> <p>(d) Reviewers noted outstanding biodiversity values of this area.</p> <p>(d) Additional support to the PNG Government would be required to prepare a WH nomination dossier and to ensure effective management of the site.</p>

343 More information at: <https://www.conservation.org/stories/treasures-of-the-lau-islands>.

344 More information at: <https://www.fisheries.noaa.gov/Pacific-islands/habitat-conservation/marianas-trench-marine-national-monument>.

345 More information at: <https://whc.unesco.org/en/tentativelists/5061/>.

346 Chappell & Polach, 1991

347 More information at: <https://whc.unesco.org/en/tentativelists/5061/>.

348 More information at: <https://whc.unesco.org/en/tentativelists/5061/>.

Table 10. contd.

PICTs ³³⁰	Possible WH sites ³³¹	Comments
	Fly River and Delta Transfly ³⁴⁹	(a) On the PNG Tentative List. 2015 review of the PNG Tentative List noted this site should have high priority for WH nomination. (b) Reviewers noted globally significant freshwater fish and mangrove diversity. Reviewers noted well documented biodiversity values for this site ³⁵⁰ . (c) Several reviewers noted the agreement from Indonesia, PNG and Australia to form the Tri-national wetlands initiative which links the management of the wetlands of the Transfly to Kakadu NP ³⁵¹ (already WH) and suggested this as an area which has strong potential.
	Bismark-Solomon Sea	(a) Not on the PNG Tentative List. (b) Transboundary nomination which would include PNG and SI and possibly Indonesia and Timor-Leste. (c) Reviewers noted important marine values ³⁵² . (d) A framework for cooperation on this could potentially be through the Coral Triangle Initiative ³⁵³ .
	Torricelli Mountains ³⁵⁴	(a) Not on the PNG Tentative List. (b) Reviewers noted the importance of terrestrial biodiversity including two of the most endangered mammals in the world. (c) The Tenkile Conservation Alliance ³⁵⁵ has been working with local communities on the protection of this site. (d) Additional support to the PNG Government would be required to prepare a WH nomination dossier and to ensure effective management of the site.
	YUS Conservation Area ³⁵⁶	(a) Not on the PNG Tentative List. (b) YUS Conservation Area is a protected area on the Huon Peninsula, Morobe Province of Papua New Guinea. It was established in 2009 as Papua New Guinea's first conservation area, and named after the Yopno, Uruwa and Som rivers that flow through it. The 760 km ² area of tropical forests is stretching from coral reefs off the northern coast to the 4,000-metre peaks of the western Saruwaged Mountains. It is a critical habitat for the endangered endemic Matschie's tree-kangaroo. (c) While the land remains under local customary ownership, villagers from 35 villages have formally committed to prohibit all hunting, logging and mining within the land that has been pledged to the conservation area. (d) Additional support to the PNG Government would be required to prepare a WH nomination dossier and to ensure effective management of the site.
	Carbon Seeps ³⁵⁷	(a) Not on the PNG Tentative List. (b) Reviewer suggested natural CO ₂ seeps near Papua New Guinea have potential WH value, noting: "these are famous within the oceanographic community but not well-known more generally. These unique and valuable sites are natural laboratories of a potential future in a high-CO ₂ world". (c) These include carbon seeps near Milne Bay ³⁵⁸ .

349 More information at: <https://www.britannica.com/place/Fly-River>.

350 Ellison, 1997 & Swales, 2021.

351 More information at: https://wwf.panda.org/wwf_news/?164555/AUSTRALIA-INDONESIA-PAPUA-NEW-GUINEA---Tri-National-Wetlands-Initiative.

352 More information at https://wwf.panda.org/wwf_news/?6743/Fact-Sheet-Bismarck-Solomon-Seas

353 More information at: <https://www.coraltriangleinitiative.org/>.

354 More information at: World Wildlife Fund for Nature (2008) Northern New Guinea mountain rain forests: Terrestrial Ecoregions.

355 More information at: <https://tenkile.com/>.

356 More information at: https://dbpedia.org/page/YUS_Conservation_Area.

357 More information at: <https://ocean.si.edu/ecosystems/coral-reefs/field-lab-how-carbon-seeps-provide-chance-see-future-impacts-ocean>.

358 More information at: <https://www.aims.gov.au/research-topics/environmental-issues/ocean-acidification/field-research-unique-co2-seeps>.

Table 10. contd.

PICTs ³³⁰	Possible WH sites ³³¹	Comments
Samoa	Upland forests on Savaii³⁵⁹	<p>(a) Not on the Samoa Tentative List.</p> <p>(b) Noted by several reviewers as important with having the largest intact forest area in Polynesia. The area has important biodiversity values³⁶⁰.</p> <p>(c) The Samoa State Party, when interviewed, noted the Savaii Cloud Forests could have potential, as the largest intact cloud forest in tropical Polynesia.</p> <p>(d) This site is also a Wetland of International Importance under the Convention on Wetlands.</p> <p>(e) This area harbours relict population of a critically endangered flagship species for conservation – the Manumea (tooth-billed pigeon).</p>
	Fagaloa Bay Uafato Tiavea Conservation Zone³⁶¹	<p>(a) On the Samoa Tentative List.</p> <p>(b) Reviewers note this as a possible transboundary site with the Pacific Remote Islands, American Samoa³⁶².</p> <p>(c) Some initial discussions were held through the “Two Samoas Initiative”, regarding Fagaloa Bay, but further work would be required, if this was to proceed.</p> <p>(d) The State Party, when interviewed, noted this site was proposed as a possible WH site in 2007 but that one of the challenges was that the sites were too small. There was some consideration of joint action with American Samoa on the Fagaloa Bay proposal, as a Pacific WH Archipelago Initiative but this never really got off the ground. However, there is an established framework for cooperation between Samoa and American Samoa, the two Samoas initiative, which could potentially provide a useful framework for pursuing this matter as a potential WH site.</p> <p>(e) This area harbours relict population of a critically endangered flagship species for conservation – the Manumea (tooth-billed pigeon).</p>
Solomon Islands	The Marovo-Tetepare Complex³⁶³	<p>(a) On the Solomon Islands Tentative List.</p> <p>(b) The property originally described on the Tentative List is a mixed natural and cultural site encompassing the marine areas of the Marovo Lagoon and selected terrestrial areas of Vangunu and Gatokae Islands, the uninhabited island of Tetepare and its associated coastal marine areas.</p> <p>(c) Marovo Lagoon faces a number of threats including logging which would pose integrity issues for any WH consideration, thus a number of reviewers suggested that any possible WH site should be focussed on Tetepare Island.</p> <p>(d) Tetepare Island³⁶⁴ was mentioned by several reviewers as having very high biodiversity importance, including for the New Georgia Flying Fox, and suitable for WH listing in its own right. Tetepare Island is the only unlogged island in the Solomon Islands and the Solomon Islands is currently going through the process of establishing a protected area. Reviewers noted that, for Tetepare, the community with support of WWF and other donors has managed to keep the island intact and they have the commitment to follow through with management.</p> <p>(e) Interviews with Solomon Islands Government noted their priority is to improve management of their existing WH site – East Rennell - before nominating additional sites.</p>
	Tropical Rainforest Heritage of Solomon Islands³⁶⁵	<p>(a) On the Solomon Islands Tentative List.</p> <p>(b) The Tropical Rainforest Heritage of Solomon Islands property is a natural serial site comprising representative tropical rainforest areas of Solomon Islands. Originally modelled on the Tropical Rainforest Heritage of Sumatra WH site to cover the most important areas of tropical forest</p> <p>(c) Noted by reviewers as having outstanding tropical forest biodiversity and outstanding importance for bird species.</p> <p>(d) Reviewers noted integrity issues associated with logging.</p> <p>(e) Interviews with Solomon Islands Government noted their priority is to improve management of their existing WH site – East Rennell - before nominating additional sites.</p>

359 More information at: <https://www.keybiodiversityareas.org/site/factsheet/27481>.

360 More information at: https://www.cepf.net/sites/default/files/59745_technicalreport_rap_upland_savaii.pdf.

361 More information at: <https://whc.unesco.org/en/tentativelists/5090/>.

362 More information at: <https://www.coris.noaa.gov/portals/pria.html#:~:text=The%20U.S.%20Pacific%20Remote%20Island,Hawai'i%20and%20American%20Samoa>.

363 More information at: <https://whc.unesco.org/en/tentativelists/5414/>.

364 More information at: <https://www.tetepare.org/>.

365 More information at: <https://whc.unesco.org/en/tentativelists/5416/>.

Table 10. contd.

PICTs ³³⁰	Possible WH sites ³³¹	Comments
	Kolombangara Island³⁶⁶	(a) Not on the Solomon Islands Tentative List. (b) Reviewer noted the importance for WH criteria (ix), noting intact highly diverse rainforest and important species, including the New Georgia flying fox. (c) Interviews with Solomon Islands Government highlighted their priority is to improve management of their existing WH site – East Rennell – before nominating additional sites.
Tonga	Vava'u Island³⁶⁷	(a) Not on the Tonga Tentative List. (b) Reviewers note the importance for whales and other marine species and potentially as part of a serial transboundary site based on migratory species, such as whales (refer to transboundary section). (c) One reviewer noted the January 2022 eruption of Hunga Tonga-Hunga Ha'apai near Vava'u ³⁶⁸ created a feature with internationally significant geological characteristics.
	Late Island	(a) Not on the Tonga Tentative List. (b) Singularly (relatively) unmodified, invasive mammal free, tropical Polynesian Island with full complement of naturally occurring threatened species and marine ecosystem illustrating the co-dependency of terrestrial and marine ecosystems for maintaining naturally occurring biodiversity.
Vanuatu	Eretoka Islands and Havannah Harbour	(a) Not on the Vanuatu Tentative List. (b) Marine reviewer suggested extension of Chief Roi Mata's Domain (cultural WH site) to include fringing reefs around Lelepa and Eretoka islands, noting their critical importance for marine biodiversity and also noting the healthy condition of these reefs (c) This site is documented as highest priority under the Vanuatu Special and Unique Marine Areas (SUMA) process, where it was listed as a SUMA (site EF17: Eretoka Island). (d) Reviewers suggested this could be linked into a single continuous WH site based on natural criteria with the adjacent Havannah Harbour on north Efate Island (EF7). (e) The full SUMA Report ³⁶⁹ provides a detailed assessment of important marine areas.
	Vatthe Conservation Area	(a) On the Vanuatu Tentative List ³⁷⁰ . (b) Located in Bay, on the Northern coast of Santo (the largest island in Vanuatu). (c) Reviewers noted the importance of the site for containing the most extensive alluvial and limestone forest in Vanuatu, as well as importance for bird species. BirdLife International notes the importance of the Santo Mountain Chain for bird species ³⁷¹ . (d) Reviewers note the site also has important cultural values and has potential for consideration as a mixed site.
Potential Transboundary/Transnational WH sites		
	Coral Sea Transboundary Site	(a) Not on the State Party Tentative Lists. (b) Several reviewers suggested a transboundary Coral Sea WH site should be developed, based on an extension of the "Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems WH site" to involve sites in all or some of Solomon Islands, PNG and New Caledonia. (c) More work would need to be done on the assessment of potential sites, however the Mission Blue Programme "Hope Spots" ³⁷² identifies a number of potential sites that may have WH value, based on analyses by various scientists. (d) Sites from the Hope Spot Analysis that may have potential as part of a possible transboundary WH site include: (a) the Conflict Islands (PNG) ³⁷³ an isolated ring of 21 individual islands in the Milne Bay Province of Papua New Guinea and (b) Kimbe Bay ³⁷⁴ possessing one of the highest biodiversity levels for tropical fish and coral in the world.

366 More information at: <https://en.wikipedia.org/wiki/Kolombangara>.367 More information at: <https://en.wikipedia.org/wiki/Vava%CA%BBu>.368 More information at: <https://volcano.si.edu/volcano.cfm?vn=243040>.369 More information at: <http://macbio-Pacific.info/wp-content/uploads/2018/07/SUMA-Vanuatu-Final-Digital.pdf>.370 More information at: <https://whc.unesco.org/en/tentativelists/1973/>.371 More information at: <http://datazone.birdlife.org/site/factsheet/santo-mountain-chain-iba-vanuatu>.372 More information at: <https://mission-blue.org/hope-spots/>.373 More information at: <https://storymaps.arcgis.com/stories/76ff207305b344f7a15683ec9578a647>.374 More information at: <https://storymaps.arcgis.com/stories/2b3e6d9f88614ee593919e2a19e90204>.

Table 10. contd.

PICTs ³³⁰	Possible WH sites ³³¹	Comments
	Migratory Whales	<p>(a) Not on the State Party Tentative Lists.</p> <p>(b) Some reviewers noted the possibility of a serial transboundary site based on migratory species, such as whales. This could parallel the concept of a serial cultural transboundary site based on Pacific people migration, specifically Polynesian migration pathways and sites.</p> <p>(c) The Vava'u Island Group in Tonga would be a key element of any proposal that would be developed as a transboundary whale migration site.</p>
	Kermadec Trench	<p>(a) On NZ Tentative List (as the Kermadec Islands and Marine Reserve³⁷⁵).</p> <p>(a) Geology reviewers suggested the Kermadec Trench could have potential as a transboundary WH site between NZ and Tonga.</p> <p>(c) The Kermadec Trench is a submarine channel in the floor of the southern Pacific Ocean just to the east of the Kermadec Islands and northeast of mainland New Zealand. Reviewer noted: "the Kermadec is Earth's fifth deepest oceanic trench, plunging more than ten kilometers beneath the ocean's surface — about five times deeper than America's Grand Canyon. This unique geographic feature includes a string of hydrothermal vents".</p> <p>(d) In 2016, the New Zealand government confirmed that it will move forward with plans to establish an ocean sanctuary encompassing the trench.</p>
	Possible High Seas MPAs	<p>(a) None of these areas are on the State Party Tentative Lists.</p> <p>(b) Nearly two-thirds of the world's ocean lies beyond the jurisdiction of nations, commonly called the High Seas. Marine Areas Beyond National Jurisdiction (ABNJ)³⁷⁶ cover half of our planet and contain natural wonders. States at the United Nations are negotiating a treaty to ensure the conservation and sustainable use of this vast global commons, and the WH Marine Programme has been exploring technical modalities for WH in High Seas³⁷⁷.</p> <p>(c) The Hope Spot Analysis above suggests there are marine areas beyond national jurisdictions which could potentially meet the criteria for WH. These four high seas enclaves³⁷⁸ in the western Pacific Ocean are entirely surrounded by the exclusive economic zones (EEZs) of neighboring island nations. The four "Donut Holes" are pockets of marine habitat beyond national jurisdiction, and have been described as the West Oceania Marine Reserve (WOMAR); Greater Oceania Marine Reserve (GOMAR); Moana Marine Reserve (MOANA); and the Western Pacific Marine Reserve (WPMR).</p> <p>(d) However, areas beyond EEZs are currently not feasible under the WH Convention which addresses sites nominated by State Parties to the Convention.</p>
	Cloud Forest Transnational Serial Nomination	<p>(a) Not on the State Party Tentative Lists.</p> <p>(b) Reviewer noted the possibility of a Pacific Cloud (or Sky) Forest serial nomination comprising intact cloud forests e.g. in the Santo Mountain Range (Vanuatu), Guadalcanal Uplands (Solomons), Buin Bougainville, (PNG), Savaii (Samoa), Rarotonga Cloud Forest (Cook Islands)³⁷⁹ and sites in French Polynesia.</p>
	Transnational Serial site focused on Tree Kangaroos	<p>(a) Not on the State Party Tentative Lists.</p> <p>(b) This suggestion was for a transboundary serial site focused on Tree Kangaroos. That could potentially involve PNG, Indonesia and Australia and any such area would capture enormous biodiversity. The 14 species (plus) provide a fantastic carrier for so much diversity and potentially connect natural heritage and cultural heritage also.</p>

Those of the above potential WH candidate sites that could be mapped easily (excluding transnational and serial sites for example) are shown in Figure 5 below. It is noted that a number of these sites are not included on the Tentative Lists of States Parties in the Pacific region.

375 More information at: <http://whc.unesco.org/en/tentativelists/5124/>.

376 More information at: <https://www.thegef.org/what-we-do/topics/areas-beyond-national-jurisdiction#:~:text=Marine%20Areas%20Beyond%20National%20Jurisdiction,95%20percent%20of%20its%20volume.>

377 More information at: <https://whc.unesco.org/en/highseas>.

378 More information at: <https://old.mpatlas.org/campaign/western-Pacific-donut-holes/>.

379 Home to multiple severely threatened endemic species, and including some of the best examples of primary montane rain and cloud forest in Eastern Polynesia, more information at <http://worldwildlife.org/ecoregions/oc0103>.

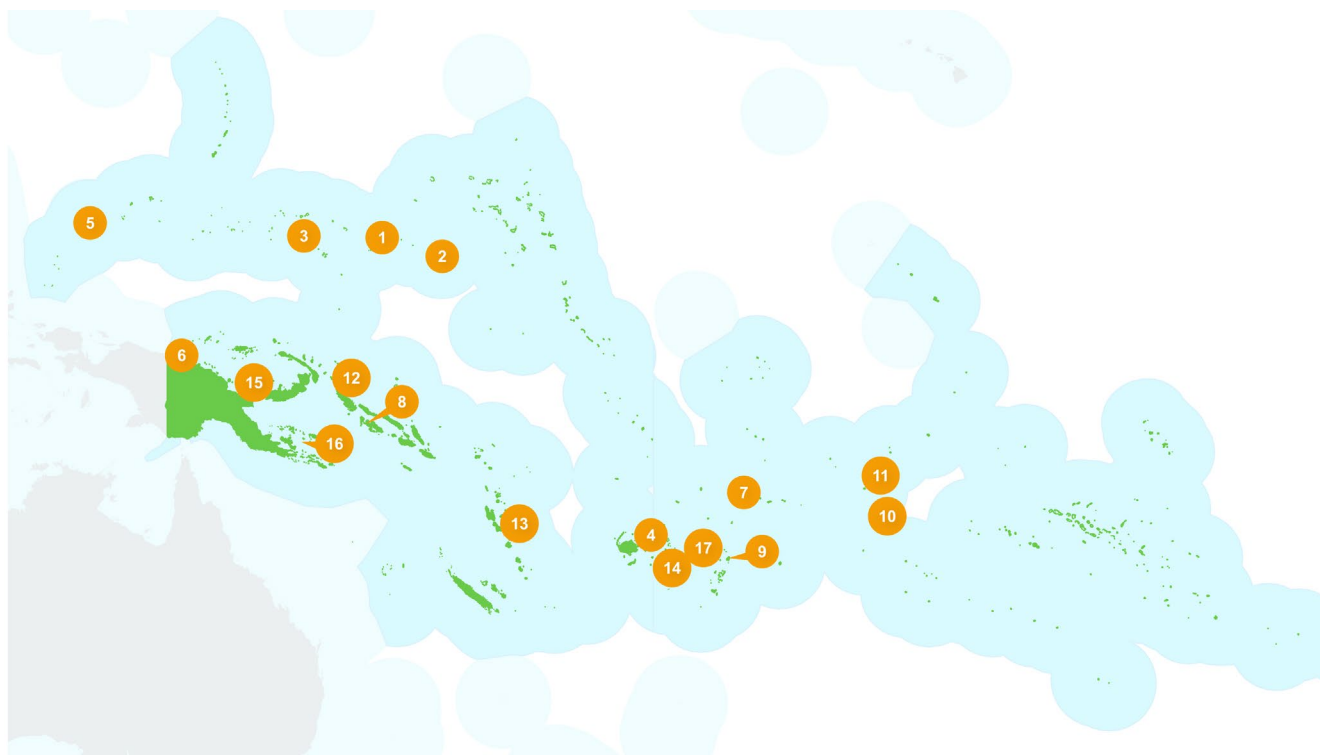


Figure 5. Potential WH candidate sites suggested during consultations which are not included on the Tentative Lists of States Parties in the Pacific region. Produced by Luca Battistella³⁸⁰

Label	Suggested Site	State Party
1	Pohnpei Uplands	FSM
2	Mahkontowe Conservation Area	FSM
3	Chuuk Lagoon	FSM
4	Taveuni Island	Fiji
5	Northern Peleliu Lakes (sandflats) [as potential extension to Rock Islands Southern Lagoon]	Palau
6	Torricelli Mountains	PNG
7	Upland forests of Savai'i	Samoa
8	Kolombangara Island	Solomon Islands
9	Vava'u Island	Tonga
10	Components of Marae Moana Marine Park	Cook Islands
11	Suvarrow National Park	Cook Islands
12	Bismarck-Solomon Seas	PNG, Solomon Islands, Indonesia
13	Eretoka Islands and Havannah Harbour [as potential extension to Chief Roi Mata's Domain]	Vanuatu
14	Lau Seascape Initiative	Fiji
15	YUS Conservation Area	PNG
16	Carbon Seeps	PNG
17	Late Island	Tonga

Implications for natural and mixed WH in the Pacific region

A number of sites proposed by experts as having potential WH values are also identified by State Parties within their Tentative Lists and are also identified through the analyses outlined in Section 5.3 below. A suggested list of the highest priority sites, a proposed “Top 20” natural and mixed WH sites, is outlined in Section 5.4.

³⁸⁰ See text for more information on each of the suggested sites and other potential priorities including transnational and serial sites. The land and sea areas of the 23 countries and territories covered by this report are indicated in green and blue respectively (Sources: FAO, 2015; Flanders Marine Institute, 2019).

5.3 Global and regional priorities: findings from assessments of natural and mixed WH priorities

This section provides an overview of key findings from relevant international and regional assessments of WH and heritage conservation priorities as well as a summary of WH thematic studies undertaken by IUCN, UNEP, UNEP-WCMC and UNESCO. It outlines a number of sites which may have potential as natural and mixed WH in the Pacific region. The Pacific region supports a number of globally important priority areas for biodiversity conservation. However, due to the overall small number of natural WH sites in the region, many of these priority areas still have no or very limited representation on the WH List. From a global perspective, the following key gaps with regard to broader conservation priorities should be noted.

5.3.1 Global assessments of high biodiversity areas in the Pacific region

Global Assessment systems relevant to potential natural and mixed WH in the Pacific region include:

- **WWF Global 200**³⁸¹: The Global 200 is the list of ecoregions³⁸² identified by WWF, as having the highest priority for biodiversity conservation. Priority terrestrial ecosystems within the region in the Global 200 list include the South Pacific Island Forests, three priority ecoregions on New Caledonia (Moist Forests, Dry Forests, and Rivers and Streams), the Fiji Barrier Reef, and marine areas of French Polynesia and Rapa Nui (Chile). Global 200 priority ecoregions have been selected for their irreplaceability or distinctiveness with regard to species richness, endemic species, unusual higher taxa, unusual ecological or evolutionary phenomena, and the global rarity of habitats.
- **Megadiverse countries**³⁸³: PNG is the only one of the 17 so-called megadiverse countries that does not have any natural or mixed WH sites yet. Each megadiverse country holds at least 1% of the world's plant species as endemics (i.e. these plant species do not occur anywhere else).
- **Biodiversity hotspots**³⁸⁴: Four of the world's 36 terrestrial biodiversity hotspots overlap with one or more of the 23 countries/territories covered by this report. Both New Caledonia and the East Melanesian Islands have very little WH coverage to date (see Table 10). The vast Polynesia-Melanesia hotspot is already covered in several natural or mixed WH sites, but the biggest contribution by land area comes from the Hawaii Volcanoes National Park in the USA, which is beyond our focal area and not inscribed for its biodiversity values. However, it is worth noting that this park is also listed as a Biosphere Reserve for its biodiversity values. The Wallacea hotspot also has marginal coverage and, within our focal area, concerns Timor-Leste only. Hotspots contain at least 1,500 endemic species of vascular plants and have already lost ≥70% of their primary vegetation.
- **High Biodiversity Wilderness Areas (HBWAs)**³⁸⁵: New Guinea is one of the five HBWAs worldwide but has only one natural (or mixed) WH site so far: Lorentz National Park on the Indonesian part of the island. There is no natural or mixed WH site in PNG yet despite the country's global significance for biodiversity conservation (see also above). HBWAs contain at least 1,500 endemic species of vascular plants, retain ≥70% of their primary vegetation and are sparsely populated.
- **Endemic Bird Areas (EBAs)**³⁸⁶: To qualify as an EBA, an area must encompass the entire breeding range of ≥2 bird species with global breeding ranges of <50,000 km². There are a number of EBAs in the Pacific region without WH coverage but the most important gaps are the Solomon Group EBA, which has more restricted-range bird species (79 species) than any other EBA in the world, and the New Britain and New Ireland EBA in PNG with 54 restricted-range species (Stattersfield et al. 1998). The existing WH site East Rennell belongs to a different EBA than the Solomon Group EBA.
- **Important Bird and Biodiversity Areas (IBAs)** provide a fundamental indicator for areas of high conservation value. The selection of IBAs is achieved through: *"the application of quantitative ornithological criteria, grounded in up-to-date knowledge of the sizes and trends of bird populations. The criteria ensure that the sites selected as IBAs have true significance for the international conservation of bird populations, and provide a common currency that all IBAs adhere to, thus creating consistency among, and enabling comparability between, sites at national, continental and global levels"*³⁸⁷. The IBA approach has been applied in a number of Pacific countries, including Fiji³⁸⁸.

381 Olson & Dinerstein, 2002

382 WWF defines an ecoregion as a "relatively large unit of land or water containing a characteristic set of natural communities that share a large majority of their species dynamics, and environmental conditions".

383 More information at: <https://www.iberdrola.com/sustainability/megadiverse-countries#:~:text=The%20World%20Conservation%20Monitoring%20Centre,Peru%2C%20Democratic%20Republic%20of%20Congo%2C>.

384 Biodiversity hotspots are both some of the most biologically diverse geographies of the world, but also some of the most threatened. Around the world, 36 areas qualify as hotspots representing around 2.5% of the earth's land area.

385 Together, the five high biodiversity wilderness areas hold 17% of the world's vascular plant species and 8% of the world's terrestrial vertebrate species as endemics.

386 More information at: <https://datazone.birdlife.org/eba>.

387 From <http://datazone.birdlife.org/site/ibacriteria>.

388 More information on IBA application in Fiji at: <http://datazone.birdlife.org/country/fiji/ibas>.

- **Key Biodiversity Areas (KBAs)** are the most important places globally for species and their habitats. KBAs are based on the principle that, faced with the current global environmental crisis, it is critically important to focus collective efforts on conserving the places that matter most. The KBA Programme supports the identification, mapping, monitoring and conservation of KBAs to help safeguard the most critical sites for nature on our planet – from rainforests to reefs, mountains to marshes, deserts to grasslands and to the deepest parts of the oceans³⁸⁹.
- **The Critical Ecosystem Partnership Fund (CEPF)**³⁹⁰ is designed to safeguard the world's biologically richest and most threatened regions, known as biodiversity hotspots. An assessment study was undertaken of the East Melanesian Islands Biodiversity Hotspot³⁹¹, which includes the island nations of Vanuatu, Solomon Islands and Papua New Guinea (PNG), which includes the provinces of Manus, New Ireland, East New Britain and West New Britain plus the Autonomous Region of Bougainville. The East Melanesian Islands qualify as a hotspot due to their high levels of plant and animal endemism, accelerating levels of habitat loss and the impacts of climate change and variability. The East Melanesian Islands Hotspot also holds exceptional cultural and linguistic diversity. The list of priority sites contains 20 KBAs, comprising five in PNG, nine in the Solomon Islands and six in Vanuatu, and covering a total area of 1.5 million hectares. While the priority sites are principally terrestrial conservation priorities, 11 of them contain significant areas of marine habitat, creating opportunities for ridge-to-reef conservation. The purpose of selecting priority species was to enable investments in species-focused conservation action to be directed at those globally threatened species whose conservation needs cannot adequately be addressed by habitat protection alone. After undertaking the initial biological prioritization, seven KBAs were assigned to the highest priority level and thus qualify as Alliance for Zero Extinction (AZE) sites: (i) Aneityum Vanuatu; (ii) East Makira Solomon Islands; (iii) Gizo Solomon Islands; (iv) Guadalcanal Watersheds Solomon Islands; (v) Nendö Solomon Islands; (vi) Santo Mountain Chain Vanuatu; and (vii) Vanikoro Solomon Islands.
- **The Alliance for Zero Extinction (AZE)**³⁹² is a joint initiative of biodiversity conservation organizations from around the world working to prevent extinctions by promoting the identification and ensuring the safeguard and effective conservation of key sites that constitute the last remaining refuges of one or more Endangered or Critically Endangered species. AZE uses three criteria to identify priority sites: (i) endangerment; (ii) irreplaceability; and (iii) discreteness; these criteria are the equivalent of Key Biodiversity Area (KBA) criterion. In 2018, a major reassessment mapped the AZE sites that must be effectively protected if the world's most threatened species are to survive. The location of each provisional site is shown as a polygon on a map³⁹³. Sites identified in the Pacific region include: (A) **PNG**: (i) Telefomin; (ii) West Torricelli Mountains; (iii) Central Manus; (iv) Mt Elimbari; (v) Kemp Welch River; (vi) Goodenough Mountains; (vii) Kiriwina; (viii) Maybole Range (West Fergusson Mountains); (ix) Hunstein Range; (B) **Solomon Islands**: (i) Gizo; (ii) Guadalcanal Watersheds; (iii) East Makira; (iv) Nendö and Tömotu; (v) Vanikoro; (C) **New Caledonia**: (i) Plaine des Lacs; (ii) Port Boisé; (iii) Massifs du Grand Sud; (D) **Fiji**: (i) Nausori Highlands; (ii) Gau Highlands; (iii) Taveuni Highlands; (iv) Yadua Taba Island; (E) **Samoa**: (i) Central Savaii Rainforest; (F) **French Polynesia**: (i) Rapa; (ii) Vallées Maruapo, Papehuetamai et Orofero; (iii) Vallée d'Opunohu; (iv) Makatea; (v) Niau; (vi) Ua Huka; (vii) Tahuata; (viii) Motane (Mohotani); (ix) Fatu Hiva; (x) Hatuta'a (G) **FSM**: (i) Pohnpei Watershed Forest Reserve; (H) **Pitcairn**: (i) Pitcairn Islands; (ii) Henderson Island; (I) Vanuatu: (i) Mota.
- **SUMA** – The Special and/or Unique Marine Areas (SUMAs) project, supported through the MACBIO Programme³⁹⁴ has identified priority marine sites within a number of PICTs and Timor-Leste including Fiji, Solomon Islands, Tonga and Vanuatu. This project identifies priorities for marine conservation, based on data sets which aim to inform government decision-making about what types of ocean zoning/level of protection should be afforded to which parts of the marine environment within participating countries.
- **Conservation International's Global Marine Centres of Endemism** has identified 18 global marine centres of endemism based on the number of restricted range reef fish, corals, snails and lobsters (Roberts et al 2002). There are two such centres in the Polynesia Micronesia Hotspot, namely the Hawaiian Islands and Easter Island.
- **The UNESCO Global Geoparks Programme** identifies sites of geological importance, some of which may meet the threshold of OUV required for natural and mixed WH. Various thematic studies on geological World Heritage³⁹⁵ identify geological sites of potential WH value and act as importance references for the consideration of potential geological WH sites in the Pacific region.

389 More information at: <https://www.keybiodiversityareas.org/>.

390 More information at: <https://www.cepf.net/>.

391 More information at: https://www.cepf.net/sites/default/files/emi_ecosystem_profile.pdf

392 More information at: <https://zeroextinction.org/conservation/protecting-aze-sites/>.

393 More information at: <https://zeroextinction.org/site-identification/2023-global-aze-map/>.

394 More information at: <https://macbio-pacific.info/>.

395 Casadevall et al, 2019, Williams, 2008



Doria's Tree Kangaroo (*Dendrolagus dorianus*) in the Owen Stanley Ranges, Papua New Guinea © Alex Slavenko

Table 11 outlines a summary of key gaps under each of the above classification and prioritization schemes.

Table 11. Summary of key gaps under different global classification schemes

Priority scheme	Key gaps in the region	Notes
Megadiverse countries (Mittermeier et al. 1997)	Papua New Guinea	PNG is the only megadiverse country without a natural and mixed WH site.
Biodiversity hotspots (Myers et al. 2000, Mittermeier et al. 2004)	New Caledonia (terrestrial); East Melanesian Islands; Polynesia-Micronesia; Wallacea	New Caledonia has a marine WH site but no site covering the terrestrial hotspot. Timor-Leste is the only country in the Wallacea hotspot covered by this report.
High biodiversity wilderness areas (Mittermeier et al. 2002 and 2003)	New Guinea	The only existing WH site in this HBWA is Lorentz National Park in Indonesia.
Global 200 priority ecoregions (Olson and Dinerstein 1998 and 2002, Olson et al. 2000)	Terrestrial: South Pacific Island Forests; New Caledonia Moist Forests; New Caledonia Dry Forests Freshwater: New Caledonia Rivers and Streams; Lakes Kutubu and Sentani (PNG) Marine: Fiji Barrier Reef; Societies/Tuamotus; Rapa Nui	New Caledonia has a marine WH site but no site covering the terrestrial and freshwater Global 200 priority ecoregions. Rapa Nui National Park in Chile is listed as a cultural WH site only.
Endemic Bird Areas (Stattersfield et al. 1998)	Solomon Group; New Britain and New Ireland	The Solomon Group EBA excludes Rennell Island with the existing WH site East Rennell.



Cloud Forest of the Taveuni Highlands (an Alliance for Zero Extinction Site), Fiji © Stuart Chape

5.3.2 Potential natural and mixed WH identified in previous WH studies

A number of priority areas in the wider Pacific region have been identified in previous WH studies and analyses, including in previous Pacific World Heritage Action Plans for 2010-2015 and 2016-2020. IUCN, as the Advisory Body on natural WH, has also prepared several thematic studies³⁹⁶ which provide useful guidance in relation to potential WH sites, such as in relation to marine WH³⁹⁷. Table 12 provides an overview of “priority areas” in the wider Pacific that may warrant consideration as potential natural and/or mixed WH sites according to previous global, regional and/or thematic WH studies and analyses. It is noted that many of these priority areas represent broader gaps (e.g. a biodiversity hotspot) while others represent specific conservation areas (e.g. a potential national park). The list includes, in *italics*, priority areas that have been recognized as WH sites since the publication of these studies (see notes) in order to reflect past progress in addressing gaps.

Table 12. Summary of potential natural and mixed WH identified in previous WH studies in the Pacific

State Party/Country/ Territory	Priority area	Marine/Freshwater (FW) /Terrestrial focus	Noted in study/analysis
Cook Islands, France, Kiribati, USA	Line Islands Cluster — potential transnational serial site	Marine	Hillary et al. 2003 (A List)
Fiji, Samoa, American Samoa	Global 200 terrestrial ecoregion: South Pacific Islands Forests — potential transnational serial site	Terrestrial	CIFOR & UNESCO 1999, Patry & Ripley 2003
Fiji	Forest areas of Taveuni	Terrestrial	Chape 2012
Fiji	Great Astrolabe Reef	Marine	Thorsell et al. 1997
Fiji	Kandavu / Lau Group	Marine	Hillary et al. 2003 (B List)
France	New Caledonia terrestrial biodiversity hotspot	Terrestrial	Bertzky et al. 2013
France	Global 200 terrestrial ecoregions: New Caledonia Dry & Moist Forests — Serial site?	Terrestrial	CIFOR & UNESCO 1999, Patry & Ripley 2003

³⁹⁶ More information at: <https://www.iucn.org/theme/world-heritage/resources/publications>.

³⁹⁷ More information at: <https://www.iucn.org/content/marine-natural-heritage-and-world-heritage-list-interpretation-world-heritage-criteria-marine-systems-analysis-biogeographic-representation-sites-and-a-roadmap-addressing-gaps>.

State Party/Country/ Territory	Priority area	Marine/Freshwater (FW) /Terrestrial focus	Noted in study/analysis
France	Global 200 freshwater ecoregions: New Caledonia Rivers and Streams	Terrestrial/FW	Magin & Chape 2004
France	<i>New Caledonia — potential serial site</i>	Marine	Hillary et al. 2003 (A List)
France	Island of Tahiti	Terrestrial	IUCN CNPPA 1982
Micronesia (Federates States of)	<i>Village of Nan Madol</i>	Terrestrial/marine	IUCN CNPPA 1982
Micronesia (Federates States of)	Pohnpei-Kosrae Island Cluster — Serial site?	Marine	Hillary et al. 2003 (A List)
Kiribati	<i>Phoenix Group</i>	Marine	Hillary et al. 2003 (B List), Williams 2008
Palau	<i>Rock Islands Cluster</i>	Marine	Hillary et al. 2003 (A List), IUCN CNPPA 1982, Thorsell et al. (1997), Williams 2008
Papua New Guinea	Only megadiverse country in the world without a natural or mixed WH site	Terrestrial	Bertzky et al. 2013
Papua New Guinea	Global 200 freshwater ecoregion: Lakes Kutubu and Sentani plus Kikori River Basin	Terrestrial/FW	CIFOR & UNESCO 1999, Patry & Ripley 2003, Williams 2008
Papua New Guinea	Global 200 terrestrial ecoregion: New Guinea Montane Forests - Hunstein Range	Terrestrial	CIFOR & UNESCO 1999, Patry & Ripley 2003, Le Saout et al. 2013
Papua New Guinea	Huon Terraces, Kikori River, Sublime Karsts — potential serial site	Terrestrial	Williams 2008, Dingwall 2012, Mc Keever & Narbonne 2021
Papua New Guinea	Sepik and Ramu Floodplains	Terrestrial/FW/marine	Thorsell et al. 1997
Papua New Guinea	Karkar Island Caldera	Terrestrial	IUCN CNPPA 1982
Papua New Guinea	Long Island	Terrestrial	IUCN CNPPA 1982
Papua New Guinea	Milne Bay — potential serial site	Marine	Hillary et al. 2003 (A List)
Papua New Guinea	New Hanover and Manus Cluster — potential serial site	Marine	Hillary et al. 2003 (A List)
Samoa	Le Pupu-Pue National Park	Terrestrial	IUCN CNPPA 1982, Thorsell & Sigaty 1997, Patry & Ripley 2003
Samoa	Upland forests of Savai'i	Terrestrial	Chape 2012
Solomon Islands	<i>Global 200 terrestrial ecoregion: Solomons-Vanuatu-Bismarck Moist Forests — potential serial site</i>	Terrestrial	CIFOR & UNESCO 1999, Patry & Ripley 2003
Solomon Islands	<i>Rennell Island (East Renell)</i>	Terrestrial/FW/marine	IUCN CNPPA 1982, Thorsell & Sigaty 1997, Thorsell et al. 1997, Patry & Ripley 2003, Williams 2008
Solomon Islands	Endemic Bird Area: Solomon Group	Terrestrial	Magin & Chape 2004, Bertzky et al. 2013
Solomon Islands	Kulambangara / Kolombangara Island	Terrestrial	IUCN CNPPA 1982



Volcanic craters, lakes and the upland forests of Savaii, Samoa © Stuart Chape

State Party/Country/Territory	Priority area	Marine/Freshwater (FW) /Terrestrial focus	Noted in study/analysis
Solomon Islands	Savo Island	Terrestrial	IUCN CNPPA 1982
Solomon Islands	Marovo Lagoon and Arnavon Islands	Marine	Hillary et al. 2003 (A List)
Tonga	Ha'apai Islands	Marine	Hillary et al. 2003 (B List)
Tonga (plus others)	Globally significant breeding ground for humpback whales — potential transnational serial site with other whale sanctuaries (e.g. in French Polynesia, New Caledonia and the Cook Islands)	Marine	Dingwall 2012
USA	<i>Global 200 terrestrial ecoregions: Hawaii Dry & Moist Forests — potential serial site</i>	Terrestrial	CIFOR & UNESCO 1999, Patry & Ripley 2003, Bertzky et al. 2013
USA	<i>Hawaii Volcanoes National Park</i>	Terrestrial	IUCN CNPPA 1982
USA	<i>NW Hawaiian Islands</i>	Marine	Hillary et al. 2003 (B List)
Vanuatu	Kuwae Caldera	Terrestrial	Casadevall et al. 2019
Vanuatu	Vatthe karst area	Terrestrial	Dingwall 2012

The above list comprises priority areas suggested by previous studies within the 23 countries/territories covered by the report and other areas in the wider Pacific region (same geographic area considered as in Table 1. However, it does not include all of the broader gaps in the region because not all of them are likely to support WH sites. For example, there are several Endemic Bird Areas (EBAs) in the region but the Solomon Group EBA is the most important gap in terms of the number of endemic/restricted-range species. While Hillary et al. (2003) compiled three lists of marine priority areas, only those priority areas on the A List and B List are hereby included.

5.3.3 Congruence of current Tentative List sites with global conservation priorities and broad gaps in the wider Pacific region

Table 13 shows the overlap of natural and mixed Tentative List sites in the wider Pacific region (as of May 2024) with global conservation priorities and broad gaps. Global conservation priorities considered here are: terrestrial biodiversity hotspots (Hotspot); High Biodiversity Wilderness Areas (HBWA); terrestrial, freshwater or marine Global 200 priority ecoregions (G200-T, G200-FW or G200-M); Intact Forest Landscapes (IFL); Endemic Bird Areas (EBA); Key Biodiversity Areas (KBA); Important Bird Areas (IBA); Alliance for Zero Extinction sites (AZE); Ecologically or Biologically Significant Marine Areas (EBSA); and Important Marine Mammal Areas (IMMA). All other information is from the UNESCO WH Tentative Lists (UNESCO, 2021b). The overlaps are only indicative because the exact boundaries for most Tentative List sites are not available and the boundaries of potential WH nominations may differ substantially. Where available, we used protected area boundaries recorded in the World Database on Protected Areas (UNEP-UNEP-WCMC and IUCN, 2021) for our analysis, otherwise we buffered the approximate point locations of the Tentative List sites with a 15 km radius. We manually removed misleading overlaps (e.g. marine priorities for purely terrestrial sites).

Table 13. Overlap of natural and mixed Tentative List sites with global conservation priorities and broad gaps

State Party	Site	Type	Criteria on Tentative List	Marine areas	Year of submission	Global conservation priorities	Broad gaps covered
Fiji	Sigatoka Sand Dunes	Cultural	(iii)(iv)(v)	No	1999	Hotspot, EBA	Polynesia-Micronesia hotspot
Fiji	Sovi Basin	Cultural	(iii)(iv)(v)	No	1999	Hotspot, G200-T, EBA, KBA, IBA	Polynesia-Micronesia hotspot, South Pacific Island Forests G200-T
Fiji	Yaduatuba Crested Iguana Sanctuary	Natural	(x)	No	1999	Hotspot, KBA, AZE	Polynesia-Micronesia hotspot, South Pacific Island Forests G200-T
Indonesia	Raja Ampat Islands	Natural	(vii)(x)	Yes	2005	Hotspot, G200-T, G200-M, IFL, EBA, KBA, AZE	(Wallacea hotspot – minimal overlap)
Marshall Islands	Mili Atoll Nature Conservancy (and Nadrikdrik)	Natural	Not specified	Yes	2005	Hotspot	Polynesia-Micronesia hotspot
Marshall Islands	Northern Marshall Islands Atolls	Mixed	Not specified	Yes	2005	Hotspot, KBA	Polynesia-Micronesia hotspot
New Zealand	Kermadec Islands and Marine Reserve	Natural	(vii)(viii)(ix)(x)	Yes	2007	Hotspot	-
New Zealand	Whakarua Moutere (North East Islands)	Natural	(vii)(viii)(ix)(x)	Yes	2007	Hotspot, G200-T, G200-M, EBA, KBA	-
Palau	Imeong Conservation Area	Mixed	Missing	No	2004	Hotspot, EBA, KBA, IBA	Polynesia-Micronesia hotspot
Papua New Guinea	Huon Terraces - Stairway to the Past	Mixed	(iii)(v)(vii)(viii)(ix)(x)	No	2006	HBWA, G200-T, IFL, EBA, KBA	Megadiversity country PNG, New Guinea HBWA
Papua New Guinea	Kikori River Basin / Great Papuan Plateau	Mixed	(iii)(iv)(v)(vii)(viii)(ix)(x)	No	2006	HBWA, G200-T, G200-FW, EBA	Megadiversity country PNG, New Guinea HBWA

State Party	Site	Type	Criteria on Tentative List	Marine areas	Year of submission	Global conservation priorities	Broad gaps covered
Papua New Guinea	Kokoda Track and Owen Stanley Ranges	Mixed	(iii)(v)(vi)(vii)(x)	No	2006	HBWA, G200-T, IFL, EBA, KBA	Megadiversity country PNG, New Guinea HBWA
Papua New Guinea	Milne Bay Seascape (Pacific Jewels of Marine Biodiversity)	Mixed	(iii)(v)(vii)(viii)(ix)(x)	Yes	2006	HBWA, G200-M, EBSA	Megadiversity country PNG, New Guinea HBWA
Papua New Guinea	The Sublime Karsts of Papua New Guinea	Mixed	(v)(vii)(viii)(ix)(x)	No	2006	Hotspot, G200-T, IFL, EBA, KBA	Megadiversity country PNG, East Melanesian Islands hotspot, New Britain and New Ireland EBA
Papua New Guinea	Trans-Fly Complex	Mixed	(v)(vi)(x)	No	2006	HBWA, G200-T, G200-FW, EBA	Megadiversity country PNG, New Guinea HBWA
Papua New Guinea	Upper Sepik River Basin	Mixed	(i)(iii)(iv)(v)(vii)(viii)(ix)(x)	No	2006	HBWA, G200-FW, EBA	Megadiversity country PNG, New Guinea HBWA
Samoa	Fagaloa Bay - Uafato Tiavea Conservation Zone	Mixed	(v)(vii)(x)	Yes	2006	Hotspot, G200-T, EBA, KBA, IBA, EBSA, IMMA	Polynesia-Micronesia hotspot, South Pacific Island Forests G200-T
Solomon Islands	Marovo - Tetepare Complex	Mixed	(iii)(v)(vi)(vii)(viii)(ix)(x)	Yes	2008	Hotspot, G200-T, G200-M, EBA, KBA, IMMA	East Melanesian Islands hotspot, Solomon Group EBA
Solomon Islands	Tropical Rainforest Heritage of Solomon Islands	Natural	(vii)(ix)(x)	No	2008	Hotspot, G200-T, IFL, EBA, KBA, IBA, AZE	East Melanesian Islands hotspot, Solomon Group EBA
USA	Marianas Trench Marine National Monument	Natural	(viii)(ix)(x)	Yes	2017	Hotspot, EBA, KBA, IBA	Polynesia-Micronesia hotspot
USA	Marine Protected Areas of American Samoa	Natural	(vii)(ix)(x)	Yes	2017	Hotspot, G200-T, EBA, KBA, IBA, EBSA, IMMA	Polynesia-Micronesia hotspot
USA	Pacific Remote Islands Marine National Monument	Natural	(vii)(viii)(x)	Yes	2017	Hotspot, KBA, IBA, EBSA, IMMA	Polynesia-Micronesia hotspot
Vanuatu	Lake Letas	Natural	(vii)(ix)(x)	No	2004	Hotspot, G200-T, EBA, KBA, IBA	East Melanesian Islands hotspot
Vanuatu	Vatthe Conservation Area	Natural	(vii)(ix)(x)	No	2004	Hotspot, G200-T, EBA, KBA, IBA	East Melanesian Islands hotspot

The above list comprises all natural and mixed Tentative List sites within the 23 countries/territories covered by the report and other areas in the wider Pacific region (same geographic area considered as in Table 1).

5.3.4 Congruence of other potential candidate areas with global conservation priorities and broad gaps in the Pacific

Table 14 outlines the overlap of potential WH candidate sites suggested during the consultations (and which are not yet included on the Tentative Lists of States Parties) with global conservation priorities and broad gaps. Global conservation priorities considered here are: terrestrial biodiversity hotspots (hotspot); High Biodiversity Wilderness Areas (HBWA); terrestrial, freshwater or marine Global 200 priority ecoregions (G200-T, G200-FW or G200-M); Intact Forest Landscapes (IFL); Endemic Bird Areas (EBA); Key Biodiversity Areas (KBA); Important Bird Areas (IBA); Alliance for Zero Extinction sites (AZE); Ecologically or Biologically Significant Marine Areas (EBSA); and Important Marine Mammal Areas (IMMA). The overlaps are only indicative because the exact boundaries for most candidate areas are not available and the boundaries of potential WH nominations may differ substantially. Where available, approximate boundaries of the candidate areas were used for the analysis, otherwise the approximate point locations of the candidate areas were buffered with a 15 km radius. Misleading overlaps (e.g. marine priorities for purely terrestrial sites) were manually removed.

Table 14. Overlap of potential WH candidate sites suggested during the consultations³⁹⁸ with global conservation priorities and broad gaps

State Party/ Country/Territory	Priority area	Marine areas	Global conservation priorities	Broad gaps
Cook Islands	Components of Marae Moana Marine Park (Cook Islands EEZ)	Yes	G200-M, EBSA, IMMA	-
Cook Islands	Suvarrow National Park		KBA, IBA, EBSA	Also includes no-take marine areas (50nm under S24 of Marae Moana Act 2017)
Fiji	Taveuni Island	No	Hotspot, G200-T, EBA, KBA, IBA, AZE	Polynesia-Micronesia hotspot, South Pacific Island Forests G200-T
Micronesia (Federates States of)	Chuuk Lagoon	Yes	Hotspot, EBA, KBA	Polynesia-Micronesia hotspot
Micronesia (Federates States of)	Mahkontowe Conservation Area	No	Hotspot, EBA, KBA, IBA	Polynesia-Micronesia hotspot
Micronesia (Federates States of)	Pohnpei Uplands	No	Hotspot, EBA, KBA, IBA, AZE	Polynesia-Micronesia hotspot
Palau	Northern Peleliu Lkes (sandflats) IBA [as potential extension to Rock Islands Southern Lagoon]	Yes	Hotspot, G200-M, EBA, KBA, IBA, IMMA	Polynesia-Micronesia hotspot
Papua New Guinea	Torricelli Mountains	No	HBWA, G200-FW, IFL, EBA, KBA, AZE	Megadiversity country PNG, New Guinea HBWA
Papua New Guinea, Solomon Islands, Indonesia	Bismarck-Solomon Seas Global 200 marine priority ecoregion	Yes	G200-M, EBSA, IMMA	-
Samoa	Upland forests of Savai'i	No	Hotspot, G200-T, IFL, EBA, KBA, IBA, AZE	Polynesia-Micronesia hotspot, South Pacific Island Forests G200-T
Solomon Islands	Kolombangara Island	No	Hotspot, G200-T, IFL, EBA, KBA, IBA	East Melanesian Islands hotspot
Tonga	Vava'u Island	Yes	Hotspot, G200-T, IFL, KBA, IBA, EBSA, IMMA	Polynesia-Micronesia hotspot, South Pacific Island Forests G200-T
Vanuatu	Eretoka Islands and Havannah Harbour SUMAs [as potential extension to Chief Roi Mata's Domain]	Yes	Hotspot, G200-T, EBA, KBA	East Melanesian Islands hotspot

³⁹⁸ And which are not yet included on the Tentative Lists of States Parties.

5.4 High potential natural WH sites in the Pacific Region

A number of priorities for potential natural WH sites have been identified through PICTS Tentative Lists (Section 5.2), through expert assessments (Section 5.2), and various conservation priority assessment systems (Section 5.3). Several sites are mentioned in both the majority of assessments, and Tentative Lists and can therefore be considered as high priority sites with potential for meeting the natural criteria of OUV under the WH Convention. These sites have been identified on the basis of the following criteria:

- recognition of biodiversity importance within biodiversity and other classification systems.
- an assessment of the relative possibility of nomination within the short to mid-term³⁹⁹.
- the level of integrity issues which may potentially affect the future success of the nomination.

Table 14 outlines high potential natural and mixed WH sites in the Pacific Region. Table 15 outlines high potential natural and mixed serial/transnational WH sites in the Pacific Region. Serial/transnational WH sites are geographically separated sites, within and between countries, with different component parts which, when taken together, “contribute to the OUV of the property as a whole in a substantial, scientific, readily defined and discernible way”⁴⁰⁰. To be inscribed on the WH List these sites require: “a management system or mechanisms for ensuring the coordinated management of the separate components”⁴⁰¹. The identification, nomination and inscription of such sites is challenging in the Pacific, in particular due to the lack of capacity for the management of natural WH sites in the countries of the region.

These suggested priority sites are based solely on the analysis provided within this publication, and any potential future World Heritage nominations remains fully at the decision of the relevant State Party. This report and its recommendations should be read in the full understanding that the responsibility for determining the official position of IUCN (and ICOMOS) regarding the possible inscription of each nomination rests exclusively with the respective World Heritage Panels. They alone decide the recommendation that IUCN (and ICOMOS) will make to the World Heritage Committee. Furthermore, the World Heritage Committee is uniquely responsible for deciding whether a nominated property will or will not be inscribed on the World Heritage List.

Table 15. High potential natural WH sites in the Pacific Region

State Party	Site	Type	Justification and Comments
Cook Islands	Suvarrow National Park		<p>(a) Reviewers noted the importance of this area as a significant breeding, nesting and migration habitat for sea birds, including 3% of global population of Red-tailed tropicbirds and 9% of the global population of Lesser Frigatebirds, in addition to other important endangered and vulnerable species.</p> <p>(b) Suvarrow is recognized as an IBA, KBA and EBSA.</p> <p>(c) Given Suvarrow is isolated and uninhabited, it is also likely to meet WH conditions of integrity, and is already a legally established protected area.</p> <p>(d) Not on the Cook Islands Tentative List.</p>
FSM ⁴⁰²	Pohnpei Uplands	Natural	<p>(a) Reviewers noted significance of the cloud forest on Pohnpei which is part of the tropical and subtropical moist broadleaf forest ecoregion in Micronesia⁴⁰³. Also identified as a biodiversity priority under a number of classification systems (Hotspot, EBA, KBA, IBA, AZE).</p> <p>(b) This could be considered as part of a possible Pacific Cloud (or Sky) Forest serial nomination comprising intact cloud forests in countries throughout Oceania (see table 15).</p> <p>(c) Not on the FSM Tentative List.</p>
Fiji	Taveuni	Natural	<p>(a) Relatively high level of protection through forest reserve and nature reserve designation.</p> <p>(b) Significant natural values, including endemic and critically endangered species.</p> <p>(c) Identified within various biodiversity classification schemes as a priority including Hotspot, G200-T, EBA, KBA, IBA and AZE.</p> <p>(d) Not on the Fiji Tentative List.</p>

399 Based on views expressed through those interviewed for this project as well as the subjective views of the author.

400 Section 137 (b) of the Operational Guidelines for the World Heritage Convention.

401 Section 114 of the Operational Guidelines for the World Heritage Convention.

402 Federated States of Micronesia.

403 More information at: <https://www.oneearth.org/ecoregions/carolines-tropical-moist-forests/>

State Party	Site	Type	Justification and Comments
Fiji	Lau Seascape	Natural and/or Cultural Landscape	<p>(a) Important natural values.</p> <p>(b) High level of community, government and NGO involvement.</p> <p>(c) Not on the Fiji Tentative List.</p>
Papua New Guinea ⁴⁰⁴	Huon Terraces – Stairway to the Past	Mixed Geological Values	<p>(a) Noted by geological experts as having very important geological values. One reviewer noted: “one of the world’s best records of sea level change, locality of considerable international scientific importance”.</p> <p>(b) Identified within various biodiversity classification schemes as a priority within this megadiverse country, including HBWA, G200-T, IFL, EBA and KBA.</p> <p>(c) On the PNG Tentative List. The 2015 review of the PNG Tentative List noted this site was well advanced towards nomination.</p> <p>(d) Additional support to the PNG Government would be required to prepare a WH nomination dossier and to ensure effective management of the site.</p>
Papua New Guinea	Kokoda Track and Owen Stanley Ranges	Mixed	<p>(a) Identified within various biodiversity classification schemes as a priority within this megadiversity country, including HBWA, G200-T, IFL, EBA and KBA. The Owen Stanley Ranges is one of the most biologically important areas in the Asia Pacific, with one of the richest floras of any mountain range in New Guinea. The Central Papuan Mountains Endemic Bird Area is one of the richest areas for endemic birds on earth.</p> <p>(b) On the PNG Tentative List. 2015 review of the PNG Tentative List noted this site was well advanced towards nomination with high potential for WH.</p> <p>(c) The property is on the Tentative List as a mixed cultural and natural site covering a significant proportion of the Owen Stanley Ranges.</p> <p>(d) Work on the assessment of the potential WH values of this site has been supported by the Government of Australia.</p> <p>(e) Additional support to the PNG Government would be required to prepare a WH nomination dossier and to ensure effective management of the site.</p>
Papua New Guinea	Trans-Fly Complex	Mixed	<p>(a) Identified within various biodiversity classification schemes as a priority within this megadiverse country, including HBWA, G200-T, G200-FW and EBA.</p> <p>(b) On the PNG Tentative List. 2015 review of the PNG Tentative List noted this site should have high priority for WH nomination.</p> <p>(c) Reviewers noted globally significant freshwater fish and mangrove diversity. Reviewers noted well documented biodiversity values for this site.</p> <p>(d) A number of reviewers noted the agreement from Indonesia, PNG and Australia to form the Tri-national wetlands initiative which links the management of the wetlands of the Transfly to Kakadu NP (already a designated WH site) and suggested this as an area which has strong potential.</p>

404 PNG has seven natural and mixed sites on their Tentative List, all have potential for demonstrating OUV, not surprising given the status of PNG as a mega-diverse country. There are several additional sites in PNG which have been proposed by reviewers as having importance and potential OUV (refer to Section 5.1.3). However, the 2015 review of the PNG TL noted that the 3 sites included in this “Top 20” are either further advanced and/or have a greater likelihood of being progressed through CEPA within the PNG Government system. Prioritisation of sites is also very important given the limited financial and human resources available to CEPA for WH activities.

State Party	Site	Type	Justification and Comments
Samoa	Upland forests of Savai'i	Natural	<p>(a) Identified within various biodiversity classification schemes as a priority within the Polynesia-Micronesia biodiversity hotspot, including Hotspot, G200-T, IFL, EBA, KBA, IBA and AZE in Polynesia-Micronesia Hotspot.</p> <p>(b) Not on the Samoa WH Tentative List.</p> <p>(c) Noted by a number of reviewers as important as having the largest intact forest area in tropical Polynesia, and important biodiversity values.</p> <p>(d) The Samoa State Party interviewed noted the Savai'i Cloud Forests could have potential as natural WH, as the largest intact cloud forest in Polynesia.</p>
Solomon Islands ⁴⁰⁵	Marovo-- Tetepare Complex	Mixed	<p>(a) The uninhabited island of Tetepare is part of the Marovo-- Tetepare Complex as listed in the Solomon Islands Tentative List. Marovo Lagoon faces a number of threats, including logging, reviewers thus suggested that any possible WH site should be focussed on Tetepare Island.</p> <p>(b) Identified within various biodiversity classification schemes as a priority within the East Melanesia biodiversity hotspot, including Hotspot, G200-T, G200-M, EBA, KBA and IMMA.</p> <p>(c) Tetepare Island was mentioned by several reviewers as having very high biodiversity importance, including for the New Georgia Monkey-faced Bat, and suitable for WH listing in its own right. Tetepare Island is the only unlogged island in the Solomon Islands and the Solomon Islands is currently establishing a protected area. There is strong support for biodiversity initiatives.</p> <p>(e) Interviews with the Solomon Islands Government noted their priority is to improve management of their existing WH site – East Rennell – before nominating additional sites.</p>
Tonga	Vava'u Island	Natural	<p>(a) Identified within various biodiversity classification schemes as a priority within the Polynesia-Micronesia biodiversity hotspot, including Hotspot, G200-T, IFL, KBA, IBA, EBSA and IMMA.</p> <p>(b) Not on the Tonga Tentative List.</p> <p>(c) Reviewers note the importance for whales and other marine species and potentially as part of a serial transboundary site based on migratory species, such as whales.</p>
USA	Marianas Trench Marine National Monument	Natural Geology	<p>(a) Number of reviewers noted the global geological significance of this area.</p> <p>(b) On the USA Tentative List</p> <p>(c) Includes submerged lands and waters of the Northern Mariana Islands (CNMI) and Guam.</p> <p>(d) The Mariana Trench includes some of the deepest known areas on Earth. It also includes a range of important geological features, including a subduction zone, back arc basins, an active simmering island and submarine volcanoes.</p>
Vanuatu	Vatthe Conservation Area	Natural	<p>(a) Identified within various biodiversity classification schemes as a priority within the East Melanesia biodiversity hotspot, including Hotspot, G200-T, EBA, KBA and IBA.</p> <p>(b) On the Vanuatu Tentative List as a Natural Site.</p>

⁴⁰⁵ Solomon Islands has two natural sites on their Tentative List and there are several additional sites in the Solomon Islands which have been proposed by reviewers as having importance and potential OUV (refer to Section 5.1.3). Prioritisation of sites is very important given the limited financial and human resources available to MEDCM in Solomon Islands for WH activities.

Table 16. High potential transboundary natural WH sites in the Pacific Region

State Parties	Potential Transboundary WH sites	
France, Indonesia, PNG, Solomon Islands	Coral Sea Transboundary and/or Transnational Site	<p>(a) Not on the State Party Tentative Lists.</p> <p>(b) Several reviewers suggested a transboundary and/or transnational Coral Sea WH site should be developed, based on an extension of the “Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems WH site” to involve sites in all or some of Solomon Islands, PNG and New Caledonia. This WH site could include sites within the Bismarck Solomon Seas ecoregion, stretching from the Birdshead (Doberal) Peninsula of West Papua (also known as Irian Jaya), across the Admiralty and Bismarck archipelagos of Papua New Guinea, to Makira Island of the Solomon Islands.</p> <p>(c) This could also potentially link with other CTI member countries, for example to include other effectively managed MPAs in eastern Indonesia and Timor-Leste which could meet the threshold of OUV.</p> <p>(d) More work would need to be done on the assessment of potential sites within the Coral Sea region, including through assessment of data arising from The Special and/or Unique Marine Areas project.</p>
Tonga, France, Cook Islands, and potentially others (dependent on further research)	Migratory Whales	<p>(a) Not on the State Party Tentative Lists.</p> <p>(b) Some reviewers noted the possibility of a serial transnational site based on migratory species, such as whales. This could parallel the concept of a serial cultural transboundary site based on Pacific people migration, specifically Polynesian migration pathways and sites.</p> <p>(c) The Vava'u Island Group in Tonga would be a key element of any proposal that would be developed as a transboundary whale migration site.</p>
New Zealand and Tonga	Kermadec Trench	<p>(a) On the New Zealand Tentative List (as the Kermadec Islands and Marine Reserve⁴⁰⁶).</p> <p>(b) Geology reviewers suggested the Kermadec Trench could have potential as a transboundary and/or transnational WH site between New Zealand and Tonga.</p> <p>(c) The Kermadec Trench is a submarine channel in the floor of the southern Pacific Ocean just to the east of the Kermadec Islands and northeast of mainland New Zealand. Reviewer noted: “<i>the Kermadec is Earth's fifth deepest oceanic trench, plunging more than ten kilometers beneath the ocean's surface — about five times deeper than America's Grand Canyon. This unique geographic feature includes a string of four “Donut Holes” hydrothermal vents</i>”.</p>
Not applicable	Possible High Seas MPAs	<p>(a) None of these areas are on State Party Tentative Lists.</p> <p>(b) The Hope Spot Analysis above suggests there are marine areas beyond national jurisdictions which may have the potential to meet the criteria for OUV. These four high seas enclaves⁴⁰⁷ in the western Pacific Ocean are surrounded by the exclusive economic zones (EEZs) of neighbouring island nations. There are pockets of marine habitat beyond national jurisdiction and have been described as the West Oceania Marine Reserve (WOMAR); Greater Oceania Marine Reserve (GOMAR); Moana Marine Reserve (MOANA); and the Western Pacific Marine Reserve (WPMR).</p> <p>(c) However, areas beyond EEZs are currently not feasible under the WH Conventions which addresses sites nominated by State Parties to the Convention.</p>
PNG, Samoa, Solomon Islands, Vanuatu, Cook Islands	Cloud Forest Serial transnational Nomination	<p>(a) Not on the State Party Tentative List.</p> <p>(b) Reviewer noted the possibility of a Pacific Cloud (or Sky) Forest serial transnational nomination comprising intact cloud forests e.g. in the Santo Mountain Range (Vanuatu), Guadalcanal Uplands (Solomons), Buin Bougainville (PNG), Savaii (Samoa) and Rarotonga Cloud Forest (Cook Islands).</p>

406 More information at: <http://whc.unesco.org/en/tentativelists/5124/>.

407 More information at: <https://old.mpatlas.org/campaign/western-Pacific-donut-holes/>.



The landscape south of Brigade Hill along the Kokoda Track, Papua New Guinea © Olliver Tallwin

Conclusion

The above sites are identified as having high potential as future natural and mixed WH sites. However, further work would be required to clarify and refine boundaries and address integrity issues should State Parties wish to proceed with the nomination of any of these sites to the WH list. There have been many assessments, studies, reports and expert opinions which have highlighted the substantial number of areas in the region that could potentially demonstrate natural or mixed OUV and, could warrant being progressed toward WH listing. The moderating reality that counters these assessments is the very limited resources, capacity and funding that exist in PICTs, that tentative listing and nomination processes are lengthy and challenging, and that there is a general desire to try and focus on existing natural WH sites as a priority. The concept of alternative or intermediate designation or recognition could be explored, such as the model of the ASEAN Heritage Parks⁴⁰⁸, the IUCN Green List, Wetlands of International Importance and Biosphere reserves, and PAs under PICTs national legislation.

This report highlights that a number of issues remain to be solved for effective implementation of the WH Convention in the Pacific region, particularly in relation to funding for the nomination and on-going management of WH sites and the critical importance of building support for WH at all levels within PICTs, particularly from local communities. Existing WH sites such as East Rennell and PIPA face major challenges stemming from a lack of resources. As well as considering potential new natural WH sites there is a need to consolidate and ensure that the management of existing natural WH sites is enhanced and improved. It is critically important that adequate funding is available, and that local communities and national governments are fully in support of the nomination of any site as WH. This was reinforced by State Parties with existing natural WH sites (Solomon Islands and Palau) noting the current priority is to consolidate and improve management of existing sites before proceeding with new WH sites.

PNG has seven natural and mixed sites on their Tentative List, all have potential for meeting OUV, not surprising given the status of PNG as a megadiverse country. There are a number of additional sites in PNG which have been proposed by reviewers as having importance and potential OUV (refer to Section 5.1.3). However, the 2015 review of the PNG TL noted that the three sites included in this “Top 20” are either further advanced and/or have a greater likelihood of being progressed through CEPA within the PNG Government system. Prioritization of sites is also very important given the limited financial and human resources available to CEPA for WH activities. The situation is similar for the Solomon Islands where a number of additional sites were proposed by reviewers as having importance and potential OUV (refer to Section 5.1.3).

A number of potential natural and mixed transboundary and/or transnational WH sites are also suggested in this report. It is noted that there are significant challenges in nominating WH sites at a national level within PICTs, and these challenges are magnified when it comes to consideration of sites between countries. It is thus suggested that the priority for transboundary and/or transnational WH sites should be on sites where there is: (a) strong support from the national governments involved; and (b) a willingness to develop cooperative management programmes and regimes for any transboundary and/or transnational WH site that may be put forward. One reviewer⁴⁰⁹ suggested the WH Centre should undertake a detailed elaboration of how transboundary and/or transnational WH sites could be approached in the region, including sites that currently fall outside the Convention but within the region, such as the migratory whale serial site possibility, and a potential high seas nomination.

408 More information at: <https://www.aseanbiodiversity.org/the-asean-heritage-parks-programme/>.

409 Personal communication with Peter Valentine.

Towards more effective implementation of natural World Heritage in the Pacific

6



This section outlines the key actions required for the more effective implementation of the WH Convention in the Pacific region, in relation to natural and mixed WH sites. Recommendations link with Chapter 4 of this report and, where possible, link with and reinforce recommendations in the Pacific Regional WH Action Plan 2021-2025. This linkage reflects the close cooperation between the Regional WH Action Plan and this project, at all stages of project implementation.

6.1 Several important natural areas within the Pacific region may have potential as WH and these should be considered by PICT State Parties

The issue: The Pacific region is very poorly represented on the WH List, with a very limited number of natural and mixed WH sites, by comparison with other regions of the world. There are a number of important ecosystems and natural areas within the Pacific region which may have potential as natural and mixed WH but are not represented within the existing natural and mixed WH network. Sites which may have potential as natural or mixed WH are suggested in Chapter 5 of this report, however, these are indicative suggestions only and the responsibility for nomination of any new sites rests with State Parties. There are a number of key issues that need to be addressed before nomination of any new PICT WH sites, including the issue of inadequate finance and limited capacity. It is also noted that some PICT State Parties with existing WH sites noted their preference to improve the management of existing sites before nominating any additional sites. The high cost of the preparation of nominations is beyond most PICTs and thus additional support would be required if any new WH sites are to be nominated.

Recommendation 1: That PICTs consider recommendations of this report for potential natural WH sites in their countries and consider if they wish to proceed with the nomination of any of these, or any other, natural and mixed sites within their country.

Implementation: PICT State Parties. Whether to proceed or not with the nomination of natural WH sites is a matter for PICTS State Parties to the WH Convention. If State Parties wish to proceed with any nominations, they may wish to seek financial and/or technical assistance from UNESCO, the WH Advisory Bodies, and donors and partners including NGOs and the Metropolitan Countries.

6.2 WH Tentative Lists should be revised and updated

The issue: Tentative Lists have been prepared for most of the States and Territories of the Pacific region as outlined and described in Chapter 5 of this report. Several sites outlined as having potential as natural and mixed WH in Chapter 5 are on the Tentative Lists of PICT State Parties, however a number are not. The majority of Tentative Lists have not been revised for more than 10 years and, in several cases, do not reflect the sites with the highest potential to demonstrate OUV. Should countries wish to proceed with new nominations they would need to revise their Tentative Lists accordingly. The processes used by PNG and the American Territories may provide a useful model for the revision of these lists. A regional approach to update Tentative Lists at regional/sub-regional scales has been promoted by the WHC and IUCN and undertaken in other regions, such as in Latin America, and this may be relevant to the Pacific region. PICTs do not have the technical capacity and resources to either revise their tentative lists or undertake WH nominations. Additional financial and resources would be required to support these processes.

Recommendation 2: PICT State Parties should revise their Tentative Lists for natural and mixed WH sites, in the light of information in this report, as well as other relevant information, should they wish to proceed with the nomination of additional WH sites. Donors and partners, including UNESCO, should support PICTs in the revision and harmonization of their Tentative Lists.

Implementation: PICT State Parties to the WH Convention, donors and partners. If State Parties wish to proceed with revision of their Tentative Lists, they may wish to seek financial and/or technical assistance from UNESCO, the WH Advisory Bodies, and donors and partners including NGOs and the Metropolitan Countries.

6.3 The awareness of natural and mixed WH in the Pacific region needs to be increased

The issue: There is a very low level of awareness of the WH Convention in the Pacific region, at all levels. Most State Parties have limited understanding of the implications, benefits and costs of natural WH. In particular, there is a lack of knowledge regarding the requirements of nomination, inscription and management as well as a lack of knowledge as to how to access support for WH from UNESCO and other partners. It is important that information is clear and communicated effectively in a way that does not unrealistically raise expectations. There are positive examples of natural and mixed WH in the Pacific region, such as the Rock Islands Southern Lagoon (a mixed property) in Palau, and the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems, where WH has resulted in positive benefits for both nature and the people. As argued in Chapter 4 of this report, a clear and effective communications plan for WH should be prepared and widely communicated in the Pacific region. Information by itself is not enough however, any communication strategy must be backed up by a significant increase in resources if natural and mixed WH is to succeed in the Pacific. It is particularly important that advice be provided on how to access the resources necessary to implement the WH Convention in the Pacific region.



Nyctimystes papuae in the Owen-Stanley Ranges, Papua New Guinea © Alex Slavenko

Recommendation 3: A Pacific WH Communication Strategy, directed at key target audiences, should be developed which clearly sets out: (a) the background and rationale for WH in the Pacific region, including the benefits of WH as well as the definition and meaning of OUV; (b) the implications of WH for State Parties and local communities; (c) the processes of WH including nomination, inscription, management and monitoring; (d) case studies of positive natural and mixed WH examples in the Pacific region, including on sustainable financing; (e) alternative options to natural and mixed WH designation; and (f) means of accessing funding for all aspects of natural WH, from nomination through to management and monitoring.

Implementation: The Communication Strategy should be coordinated and implemented through UNESCO and the PHH, with involvement of other relevant agencies at regional and national levels, in particular IUCN, the Advisory Body for natural WH sites to the Convention. Logically the PHH should play an important role in the implementation of this plan. There is also a potential role for the Pacific Islands Protected Area Portal (PIPAP) to assist with raising WH awareness in the region by making available relevant communication materials.

6.4 Substantial additional funding is required by PICT State Parties if the WH Convention is to succeed in the Pacific region

The issue: Lack of funding is a key constraint to the effective implementation of natural WH sites in the Pacific region, for all stages of natural WH: nomination, inscription, management and monitoring. Existing natural WH sites in the Pacific region are generally managed by poorly resourced environment agencies, which do not have the funding to effectively manage natural and mixed WH sites. The significant resources required for the assessment of potential WH sites, preparation of nomination dossiers, and management of these sites, is well beyond the current resources of PICTs. The UNESCO WH Committee has identified WH in Small Island Developing States, including PICTs, as a priority. Some support has been provided to PICTs under this programme, however the level of support is inadequate to support natural WH sites in the Pacific region.

UNESCO should increase its direct support for WH in the Pacific region, to reflect its expressed priority on WH in SIDS. This report recommends that UNESCO develop multi-million USD flagship projects in the Pacific, as it has done in other regions. These could cover restoration works for existing sites, setting up sustainable funding models (trust funds), or supporting new nominations including setting up the systems required for inscription and management. Greater use should be made of the Rapid Response Facility, which has been established to provide timely resources to address threats affecting WH sites with high biodiversity values. This fund is directly relevant to the Pacific, particularly for sites such as East Rennell in the Solomon Islands. World Heritage should also be better linked with global funding instruments, such as GEF and GCF. Innovative financing models such as the Green Fund applied in the Rock Islands Southern Lagoon WH site in Palau, and the PIPA Trust Fund in Kiribati, also need to be widely communicated and applied to meet the specific needs of other PICT WH sites. There are also other funding schemes that should be considered,

such as the new Legacy Landscapes Fund set up by the German Government and partners⁴¹⁰ as well as opportunities available through BIOPAMA, the Kiwa Initiative⁴¹¹, the UNDP Small Grants Programme⁴¹², among others, that provide opportunity for funding submissions that could be associated with addressing issues for natural and mixed WH sites.

Recommendation 4: UNESCO and other donors and partners should increase their support for natural and mixed WH in the Pacific region, including in supporting the development of nomination dossiers, and, most importantly, the effective management of natural and mixed WH sites. UNESCO should develop multi-million USD flagship projects for WH in the Pacific, as it has done in other regions. Instruments such as the RRF, GEF and the GCF should be much more widely and effectively applied in the Pacific. Major donor funded initiatives such as GEF, Pacific BioScapes and BIOPAMA could be orientated to better address the challenges faced by natural WH sites of the region, particularly East Rennell and PIPA.

Implementation: UNESCO as well as other donors and partners, particularly those who have previously provided support for natural and mixed WH in the Pacific region, such as Australia, and new donors such as the GEF and GCF.

Recommendation 5: UNESCO, PHH and IUCN should support communication of best practice for sustainable financing of natural and mixed WH, drawing on lessons from the Rock Islands Southern Lagoon in Palau and PIPA in Kiribati. They should also encourage and stimulate investment by other donors such as GEF and GCF. PICTs should include information on natural and mixed WH as a part of relevant national and local events and celebrations such as National Environment Days.

Implementation: UNESCO and IUCN to communicate examples of WH sustainable financing. PICTs to include WH within national events and/or celebrations.

6.5 Local communities need to be more effectively involved if natural and mixed WH is to succeed in the Pacific region

The issue: Land and water resources are communally owned in the Pacific. Any planning and management of natural and mixed WH must thus be with and through local communities, for WH to succeed. Engagement with local communities must be open, transparent and based on the clear identification of the implications of natural WH. The nomination and management of natural WH sites must build on and reinforce traditional systems of conservation, which protect important natural and cultural resources, including systems such as Locally Managed Marine Areas. Economic benefits to local communities need greater attention for natural WH sites in the region to: (a) support programmes which ensure that benefits flow directly to the communities – rather than flowing to other relatively expensive delivery mechanisms (such as through regional organisations and/or international NGOs); and (b) ensure simple mechanisms are available for the communities to access the funding. For example, current mechanisms such Kiwa Initiative and BIOPAMA are too complicated for most (if not all) community committees or similar.

Recommendation 6: Local communities must be effectively involved and engaged in all activities regarding natural and mixed WH in the Pacific region at all stages of the WH process: nomination, inscription, management and monitoring. Where possible, natural WH programmes need to provide economic benefits to local communities and simple, easy to apply mechanisms should be available for communities to access funding.

Implementation: National Governments, donors and partners to ensure that local communities are fully involved at all stages of the process of WH nomination, inscription and management.

6.6 World Heritage must deliver tangible benefits for local communities and expectations about WH must be realistic and clearly communicated, at all stages of the WH process

The issue: Several natural WH sites in the Pacific have not been successful because they have failed to deliver tangible benefits for local communities and national governments, even when the initial expectation was that benefits would be delivered. This highlights the need for establishing clear expectations as to what WH will, and will not, deliver. It also underlines that natural WH sites must be planned and managed in a way that delivers tangible benefits to local communities without compromising the core conservation values for which the site was inscribed. It is thus important to develop programmes in and around natural WH sites which can provide tangible benefits to local communities, while protecting WH values. The presence, or absence, of such programmes will have a significant influence on the level of local community support and engagement with natural and mixed WH sites.

410 The Legacy Landscapes Fund (LLF) will provide financing for two types of programs to support legacy landscapes: perpetual funding of US\$1 million per year or 15-year-long funding of US\$1 million per year. For both types of grant, a minimum of 1:2 and a maximum of 1:1 match funding is required. More information at <http://whc.unesco.org/en/news/2400> plus <https://legacylandscapes.org/>.

411 More information at: <https://kiwainitiative.org/en/about-kiwa-initiative>.

412 More information at: <https://sgp.undp.org/>.

Recommendation 7: Expectations regarding natural and mixed WH must be clearly communicated to local communities, as early as possible in the WH process. Natural WH sites must be planned and managed in a way that delivers tangible benefits to local communities without compromising core conservation values

Implementation: PICT State Parties, with relevant partners and donors.

6.7 Capacity for natural and mixed WH in the Pacific needs to be developed and strengthened at all levels

The issue: There is limited capacity for natural and mixed WH in the Pacific, at regional, national and local levels for the management of natural and mixed WH. There are a number of specific gaps and deficiencies relating to WH capacity in the Pacific region.

At the regional level, the PHH exists, but it is weak and ineffective due to a lack of interest in and involvement in WH from regional agencies. There is an established Pacific Islands Roundtable for Nature Conservation (PIRT) which involves a number of relevant agencies, and this could provide a framework for improved coordination on natural and mixed WH.

At the national level, key WH capacity challenges include: (a) weak government agencies with inadequate staff to ensure effective management of WH sites; (b) lack of awareness of elements of the WH Convention and, in particular, ways to access assistance to support WH; and (c) lack of skills of staff managing natural and mixed WH sites, particularly in the areas of sustainable financing, engagement strategies for working with local communities and management planning, including tourism planning.

Efforts to highlight and strengthen natural and mixed WH management should be encouraged at all levels, including national (policies and legislation) and local (site management skills). There are tools and services available through IUCN and the BIOPAMA Programme (refer to Section 1.2.2 of this report) to support protected areas and heritage conservation. However, greater effort needs to be made to better link the services and tools available through BIOPAMA in the Pacific with the challenges facing natural WH sites in the Pacific, in particular East Rennell WH site and the PIPA in Kiribati.

Recommendation 8: A tailored programme of capacity building for natural and mixed WH should be developed and implemented in the Pacific region. At regional levels this should include strengthening the Pacific Heritage Hub and establishment of a WH Working Group within PIRT to improve coordination between relevant regional CROP agencies and NGOs on WH. At national levels this should include institutional strengthening for agencies involved in natural and mixed WH and strengthening the skills and capacity of local WH site managers, drawing on successful WH capacity building programmes, particularly those which strengthen governance of natural and mixed WH sites, such as the Enhancing our Heritage (EoH) Toolkit. The involvement of Pacific natural and mixed WH managers with relevant networks, such as the WH Marine Managers Network, should be encouraged and facilitated.

Implementation: UNESCO, IUCN, and SPREP (BIOPAMA), with the PHH, working with and drawing on the expertise of relevant agencies, including NGOs, working on capacity building for natural and mixed WH in the region. Donors and partners should be approached to provide support for this programme. Longer term options will need to be considered and developed, where possible linked to future IUCN/UNESCO capacity building plans for the Asia-Pacific region.

6.8 There needs to be better linkages between natural and cultural WH in the Pacific region

The issue: Culture is integral to, and embedded in, the Pacific way of life. It is very difficult to separate nature and culture in the Pacific. There is great potential for strengthening linkages between natural and cultural WH sites in the Pacific, including through greater consideration of mixed WH sites, such as the Rock Islands Southern Lagoon and consideration of potential WH sites as Cultural Landscapes. Papahānaumokuākea and Tongariro are also mixed sites that other Pacific Islands can learn from. The preparation of the WH Regional Action Plan in 2021-22 also provided an excellent opportunity for increased cooperation between natural and cultural agencies within PICTs and this should continue.

Recommendation 9: Opportunities for better linking of natural and cultural WH should be explored in the future, including through consideration of mixed WH nominations and application of the WH Cultural Landscape approach. People-centred approaches should be applied to the conservation of nature and culture in heritage management. Opportunities for increasing cooperation between natural and cultural WH agencies in PICTs should be encouraged and enhanced.

Implementation: PICT State Parties and relevant agencies involved with natural and cultural heritage in PICTs. The WH Advisory Bodies: IUCN, ICOMOS and ICCROM should also support this process.



Local communities transport wood on a traditional canoe on Tegano Lake, East Rennell, Solomon Islands © Paul Dingwall

6.9 Better coordination and partnership for natural and mixed WH is required at all levels in the Pacific region

The issue: Better partnerships, at the regional, national and local levels, are essential for natural and mixed WH to succeed in the region.

At regional levels, better partnerships are required between relevant international agencies working on WH, particularly UNESCO and IUCN, and national agencies responsible for natural WH. Partnerships between NGOs and PICTs are also very important given the important role many NGOs play in heritage conservation in the Pacific. The PIRT Protected Areas Working Group (PAWG) could play a more prominent role with this coordination, in partnership with the newly established PIRT nature and culture working group. These partnerships should be better mobilized to deliver advice and support to PICTs on all aspects of WH. Partnerships should also reach out to and involve existing WH sites which have offered to assist and provide lessons learned, such as Papahānaumokuākea.

At national levels, a tailored approach is required which encourages cooperation and builds on models which engage local communities, such as LMMAs and other traditional governance models. Better coordination and cooperation is also required between key government agencies, particularly for marine WH sites, as well as between Government agencies and local communities.

Recommendation 10: Mechanisms which encourage and facilitate partnership on natural and mixed WH need to be encouraged, such as strengthening the PHH, working through the PIRT nature and culture working group, and establishing relevant forums at national and local levels.

Implementation: Relevant agencies involved with natural and mixed WH at regional and national levels, with UNESCO, IUCN and the PHH playing an important coordination role. PIRT members and/or partners working on WH issues can also potentially play an important role in the implementation of this recommendation.

6.10 Leadership is important and should be encouraged for natural and mixed WH to succeed

The issue: Leadership is important at regional, national and local levels in the region for WH to succeed. For example, the 2007 “Pacific Appeal” played an important leadership role in encouraging a number of PICTs and Timor-Leste to ratify and engage with the WH Convention. The leadership role of Pacific leaders has been evident in programmes such as the Micronesian Challenge and the Pacific Oceanscape initiative. UNESCO and IUCN, along with the PHH, have vital potential leadership roles in WH in the Pacific region, working with and through relevant partners. These roles need to be encouraged and developed. Leadership at local levels is also essential. The support of community leaders, including community elders, the Church and associated groups, and Women’s Groups is essential for initiatives on natural and mixed WH to proceed.

Recommendation 11: Leadership Initiatives for natural and mixed WH should be encouraged in the Pacific region. UNESCO and IUCN, along with the PHH, should provide leadership roles for WH in the Pacific region, working with and through relevant partners.

Implementation: UNESCO and IUCN, along with the PHH, working with partners, at regional national and local levels. Potential collaboration with the ICCROM/IUCN WH Leadership Programme⁴¹³ should be explored, noting that the Pacific region has not benefited much from this initiative yet.

6.11 Natural and mixed WH needs to be considered in a broader context in the Pacific region

The issue: All sites on the WH List must meet both the rigorous criteria of OUV under the Convention and the conditions of integrity. It is important to ensure that only the sites with the highest chance of successful nomination are identified and proposed by PICTs. However not all sites which are important for biodiversity or natural systems will meet the threshold for OUV and integrity criteria of the Convention. It is thus important to set and manage expectations within PICTs and to encourage application of alternative designations such as Wetlands of International Importance and Biosphere Reserves, and to consider developing systems to recognize important natural areas at a regional level, perhaps using the approach of the ASEAN Heritage Parks. Natural WH sites should also be better integrated with relevant national and state planning instruments, such as National Development Plans and NBSAPs. Encouraging application of the IUCN Green List Global Standard in the region – with WH sites taking a lead role would also be positive and useful in the Pacific region.

Recommendation 12: PICTs should be encouraged to apply a range of international site designations, in addition to WH, such as Wetlands of International Importance and Biosphere Reserves, and to consider developing systems to recognize important natural areas at a regional level. This should include training of PICT PA staff on the criteria and processes for a range of site designations - i.e. WH, Wetlands of International Importance and Biosphere reserves. This way state parties can better understand the “context” and suitability for WH nomination for a particular site in comparison to other options. At national and local levels, PICTs should ensure natural and mixed WH is better integrated with relevant national and state planning instruments, such as National Development Plans and NBSAPs. This wider perspective could be used to grow awareness and connection to conservation mechanisms, especially for natural heritage.

Implementation: UNESCO and IUCN to encourage application of broader approaches. WH Working Group of PIRT to consider and advise on the development of a regional system to recognize important areas of regional importance. PICTs should ensure natural and mixed WH is better integrated with relevant national and state planning instruments.

413 More information at: <https://iucn.org/our-work/topic/world-heritage/our-work/world-heritage-leadership-linking-nature-and-culture>.

Conclusions and recommendations

7



7.1 Conclusions

There are currently four natural World Heritage (WH) sites and two mixed sites in the 23 countries and territories of the Pacific region covered by this report. Natural and mixed WH has generally not been a success in the region, due to limited support at all levels, unrealistic expectations about what WH can and cannot deliver, and a lack of resources to support all aspects of the WH process, particularly WH site management. Of the natural WH sites in the region, one (East Rennell) is on the WH in Danger List and for another (PIPA) the Kiribati Government has reversed its previous policy of banning commercial fishing within the WH marine site, which may impact its WH status.

There have been some successful examples reflecting either a higher level of resources, including from metropolitan countries, such as for the Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems, and/or success in revenue generation at the site, such as from tourism in the Rock Islands Southern Lagoon. Experience such as this should be shared with other PICTs involved in natural WH.

By comparison to other regions of the world, the Oceania region is very poorly represented on the WH List, and is an area where much greater attention is required and warranted, at global, regional and national levels. There is the added unique problem of the High Seas beyond national jurisdiction where marine resources and significant sea floor natural resources are unprotected. There is currently no international mechanism which would ensure WH recognition and protection in such areas.

Despite this poor representation on the WH List there are clearly several areas within the region, both marine and terrestrial, which potentially could meet the criteria of OUV under the WH Convention and a number of potential WH sites are outlined in Chapter 5 of this report.

For WH to be successful there must be a significant increase in resources for WH, without substantial additional resources natural and mixed WH is unlikely to succeed in the region. Increased support is required from donors and partners, including from Metropolitan Countries. UNESCO must also play a more effective role and ensure the resources provided for WH in the Pacific region reflect stated UNESCO policy regarding the importance of WH in SIDS. IUCN also needs to increase its role in supporting natural and mixed WH in the region, through up-stream efforts. The PHH also needs to play a more dynamic and proactive role in the region.

Other key areas that need to be addressed if natural and mixed WH is to be effectively implemented are outlined in Chapter 6 and include the need:

- for PICTs to assess sites which may have the potential to demonstrate OUV and revise their Tentative Lists (Sections 6.1 and 6.2).
- to increase awareness of natural and mixed WH in the Pacific region at all levels (Section 6.3).
- to more effectively involve local communities in natural and mixed WH (Section 6.5).
- to deliver tangible benefits for local communities and ensure expectations about WH are realistic and clearly communicated (Section 6.6).
- to develop and strengthen capacity for natural and mixed WH at all levels (Section 6.7).
- to ensure better linkages between natural and cultural WH in the Pacific region (Section 6.8).
- to improve coordination and partnership for natural and mixed WH at all levels (Section 6.9).
- to encourage leadership for natural and mixed WH at all levels (Section 6.10).
- to better consider WH in a broader context in the Pacific region (Section 6.11).

This report outlines several recommendations which will, if applied, contribute to the more effective implementation of natural WH sites in the Pacific region.

7.2 Summary of recommendations and roadmap

All recommendations are outlined below, with a reference to the corresponding section of the report, and an assessment of the priority of the recommendation. Priorities are assessed as either High (H), Medium (M) or Low (L) based on the professional judgement of the report author in light of the following criteria:

- the need to take immediate action;
- the level of potential impact on the effectiveness of the WH Convention in PICTs and Timor-Leste;
- the level of potential for immediate outcomes or “quick wins”;
- a broad assessment of benefits relative to costs of the recommendation.

This report recommends the oversight of implementation of recommendations rest with UNESCO World Heritage Centre, the UNESCO Pacific Office and the IUCN Oceania Regional Office, in close consultation with SPREP and the Pacific Heritage Hub. It is further recommended that UNESCO and IUCN prepare an Implementation Plan for these recommendations and that the level of achievement of the Implementation Plan be assessed by these organisations on a biennial basis.

Recommendation (R)	Section of Report	Priority
R1: PICTs consider recommendations of this report for potential natural WH sites in their countries and consider if they wish to proceed with the nomination of any of these, or any other, natural and mixed sites within their country.	5.4 and 5	H
R2: PICT State Parties should revise their Tentative Lists for natural and mixed WH sites, in the light of information in this report, as well as other relevant information, should they wish to proceed with the nomination of additional WH sites. Donors and partners, including UNESCO, should support PICTs in the revision and harmonization of their Tentative Lists.	5.1	H
R3: A Pacific WH Communication Strategy, targeted at key target audiences, should be developed which clearly sets out: (a) the background and rationale for WH in the Pacific region, including the benefits of WH as well as the definition and meaning of OUV; (b) the implications of WH for State Parties and local communities; (c) The processes of WH including nomination, inscription, management and monitoring; (d) case studies of positive natural and mixed WH examples in the Pacific region, including on sustainable financing; (e) alternative options to natural and mixed WH designation; and (f) means of accessing funding for all aspects of natural WH, from nomination through to management and monitoring.	4.1.1	M
R4: UNESCO and other donors and partners should increase their support for natural and mixed WH in the Pacific region, including in supporting nomination documents, and, most importantly, effective management of natural and mixed WH sites. UNESCO should develop multi-million USD flagship projects for WH in the Pacific, as it has done in other regions. Instruments such as the RRF, GEF and the GCF should be much more widely and effectively applied in the Pacific. Major donor funded initiatives such as GEF, Pacific BioScapes and BIOPAMA could be orientated to better address the challenges faced by natural WH sites of the region, particularly East Rennell and PIPA.	4.1.3	H
R5: UNESCO, PHH and IUCN should support communication of best practice for sustainable financing of natural and mixed WH, drawing on lessons from the Rock Islands Southern Lagoon in Palau and PIPA in Kiribati. They should also encourage and stimulate investment by other donors such as GEF and GCF. PICTs should include information on natural and mixed WH as a part of relevant national and local events and celebrations such as National Environment Days.	4.1.3 and 4.1.1	M
R6: Local communities must be effectively involved and engaged in all activities regarding natural and mixed WH in the Pacific region at all stages of the WH process: nomination, inscription, management and monitoring. Where possible, natural World Heritage programmes need to provide economic benefits to local communities and simple, easy to apply mechanisms should be available for communities to access funding.	4.1.4	H
R7: Expectations regarding natural and mixed WH must be clearly communicated to local communities, as early as possible in the WH process. Natural WH sites must be planned and managed in a way that delivers tangible benefits to local communities without compromising core conservation values.	4.1.4	H
R8: A tailored programme of capacity building for natural and mixed WH should be developed and implemented in the Pacific region. At regional levels this should include strengthening the Pacific Heritage Hub and establishment of a WH Working Group within PIRT to improve coordination between relevant regional CROP agencies and NGOs on WH. At national levels this should include institutional strengthening for agencies involved in natural and mixed WH and strengthening the skills and capacity of local WH site managers, drawing on successful WH capacity building programmes, particularly those which strengthen governance of natural and mixed WH sites, such as the Enhancing our Heritage (EoH) Toolkit 2.0. The involvement of Pacific natural and mixed WH managers with relevant networks, such as the WH Marine Managers Network, should be encouraged and facilitated.	4.1.5	H
R9: Opportunities to better link natural and cultural WH should be explored in the future, including through consideration of mixed WH nominations and application of the WH Cultural Landscape approach. People-centred approaches should be applied to the conservation of nature and culture in heritage management. Opportunities for increasing cooperation between natural and cultural WH agencies in PICTs should be encouraged and enhanced.	4.1.6	M

Recommendation (R)	Section of Report	Priority
R10: Mechanisms which encourage and facilitate partnership on natural and mixed WH need to be encouraged, such as strengthening the PHH, working through the PIRT nature and culture working group, and establishing relevant forums at national and local levels.	4.1.7	M
R11: Leadership Initiatives for natural and mixed WH need to be encouraged in the Pacific region. UNESCO and IUCN, along with the PHH, need to step up and provide leadership roles for WH in the Pacific region, working with and through relevant partners.	4.1.8	M
R12: PICTs should be encouraged to apply a range of international site designations, in addition to WH, such as Wetlands of International Importance and Biosphere Reserves, and to consider developing systems to recognize important natural areas at a regional level. This should include training of PICTs PA staff on the criteria and processes for a range of site designations — i.e. WH, Wetlands of International Importance and Biosphere reserves. This way countries can better understand the “context” and suitability for WH nomination for a particular site in comparison to other options. At national and local levels PICTs should ensure natural and mixed WH is better integrated with relevant national and state planning instruments, such as National Development Plans and NBSAPs. This wider perspective could be used to grow awareness and connection to conservation mechanisms, especially for natural heritage.	4.1.9	M

References

- Asaad, I., Lundquist, C.J., Erdmann, M. & Costello, H. (2018). *Delineating priority areas for marine biodiversity conservation in the Coral Triangle*, 222, 198-211. <https://doi.org/10.1016/j.biocon.2018.03.037>.
- Bertzky, B., Shi, Y., Hughes, A., Engels, B., Ali, M.K. & Badman, T. (2013). *Terrestrial Biodiversity and the WH List: Identifying broad gaps and potential candidate sites for inclusion in the natural and mixed World Heritage network*. IUCN and UNEP-WCMC. <https://portals.iucn.org/library/node/10399>
- Casadevall, T. J., Tormey, D., & J. Roberts (2019). *World Heritage Volcanoes: Classification, gap analysis, and recommendations for future listings*. IUCN <https://doi.org/10.2305/IUCN.CH.2019.07.en>
- Chape, S. (2012). Natural and mixed WH in Oceania: Challenges and Opportunities. In: Smith, A. (ed.), *World Heritage in a Sea of Islands: Pacific 2009 Programme*. (pp. 40-45) WH Papers 34. UNESCO WH Centre. <https://unesdoc.unesco.org/ark:/48223/pf0000368867>
- Chape, S. & D. Watling (Unpublished.). Tropical Forest Heritage of Taveuni, Fiji. Unpublished Tentative List proposal prepared for National Trust of Fiji.
- Chasek, P. (2010). Confronting Environmental Treaty Implementation Challenges in the Pacific Islands. Pacific Islands Policy (6), East West Centre. <https://www.eastwestcenter.org/sites/default/files/private/pip006.pdf>
- Center for International Forestry Research (CIFOR) & UNESCO (1999). *World Heritage Forests: The World Heritage Convention as a mechanism for conserving tropical forest biodiversity*. CIFOR and UNESCO WH Centre. <https://whc.unesco.org/document/9115>
- Diamond J. (2005). *Collapse: How Societies Choose to Fail or Survive*. Allen Lane/Penguin Group. [http://cpor.org/ce/Diamond\(2005\)Collapse-HowSocietiesChooseFailureSuccess.pdf](http://cpor.org/ce/Diamond(2005)Collapse-HowSocietiesChooseFailureSuccess.pdf)
- Dingwall, P. (2012). Pacific Islands WH Tentative Lists. In: Smith, A. (ed.), *World Heritage in a Sea of Islands: Pacific 2009 Programme*. (pp. 28-33) WH Papers 34. UNESCO WH Centre. <https://unesdoc.unesco.org/ark:/48223/pf0000217235>
- Food and Agriculture Organization of the United Nations (FAO) (2015). Global Administrative Unit Layers (GAUL), 2015. <https://data.apps.fao.org/map/catalog/srv/eng/catalog.search#/metadata/9c35ba10-5649-41c8-bdfc-eb78e9e65654>
- Flanders Marine Institute (2019). Maritime Boundaries Geodatabase, version 11. Available online at: <https://www.marineregions.org/>. <https://doi.org/10.14284/382>
- Govan, H. (2009). *Achieving the potential of locally managed marine areas in the South Pacific*. Traditional Marine Resource Management and Knowledge Information Bulletin #25. Secretariat of the Pacific Community. http://coastfish.spc.int/News/Trad/25/Trad25_16_Govan.pdf
- Hamilton-Smith, E. (2005). *Karst and Caves of the South Pacific: A state-of-knowledge review*. IUCN.
- Hamilton-Smith, E. (2007.) *Karst and Caves of Micronesia*. IUCN. <http://st1.asflib.net/MEDIA/ASF-CD/ASF-M-00090/2%20South%20Pacific%20Karst1.1.pdf>
- Hare, S.R., Williams, P.G., Jord'an, C.C., Hamer, P.A., Hampton, W.J., Scott, R.D., Pilling, G.M. (2020). *The eastern and central Pacific tuna fishery: 2020 overview and status of stocks*. Oceanic Fisheries Programme, SPC. Tuna Fisheries Assessment Report no. 21. <https://pacificdata.org/data/dataset/oai-www-spc-int-3327cd06-cdd4-4013-86c7-5a5fe97a8efd>
- Hillary, A., M. Kokkonen & L. Max (eds.) (2003). *Proceedings of the World Heritage Marine Biodiversity Workshop, Hanoi, Vietnam, February 25 – March 1, 2002*. UNESCO WH Centre, Paris, France. <https://unesdoc.unesco.org/ark:/48223/pf0000138456>
- Hitchcock P. & Gabriel J. (2015). World Heritage Tentative Listed Sites in Papua New Guinea. PNG Government. <https://www.sprep.org/attachments/VirLib/PNG/world-heritage-sites-png.pdf>
- Hughes, T., Bellwood, D., Connolly, S., Cornell, H., & Karlson, R. (2014). Double Jeopardy and Global Extinction Risk in Corals and Reef Fishes, *Current Biology*, 24(24). [https://www.cell.com/current-biology/fulltext/S0960-9822\(14\)01346-3](https://www.cell.com/current-biology/fulltext/S0960-9822(14)01346-3)
- International Council on Monuments and Sites (ICOMOS). (2005). The WH List: Filling the Gaps – An Action Plan for the Future. ICOMOS. <https://www.icomos.org/en/116-english-categories/resources/publications/258-monumentsasites-xii>
- International Union for Conservation of Nature (IUCN). (2014). *World heritage and rights-based approaches : Learning from practice : Building capacity to support rights-based approaches in the World Heritage Convention*. IUCN. <https://portals.iucn.org/library/node/44765>

- IUCN. (2021). The IUCN Red List of Threatened Species. IUCN. <https://www.iucn.org/resources/conservation-tool/iucn-red-list-threatened-species>
- IUCN Commission on National Parks and Protected Areas (CNPPA) (1982). *The World's Greatest Natural Areas: An Indicative Inventory of Natural Sites of WH Quality*. IUCN CNPPA. <https://portals.iucn.org/library/node/5828>
- Jupiter, S., Mangubhai, S., Kingsford, R. (2014). Conservation of Biodiversity in the Pacific Islands of Oceania: Challenges and Opportunities. *Pacific Conservation Biology*, 20(2), 206–220. <https://library.wcs.org/doi/ctl/view/mid/33065/pubid/PUB15180.aspx>
- Le Saout, S., Hoffmann, M., Shi, Y. et al. (2013). Protected areas and effective biodiversity conservation. *Science*, 342 (6160), 803–805. <https://doi.org/10.1126/science.1239268>
- Magin, C. & Chape, S. (2004). *Review of the WH Network: Biogeography, Habitats and Biodiversity*. IUCN and UNEP-WCMC. <https://portals.iucn.org/library/node/12800>
- Mc Keever, P.J. & Narbonne, G.M. (2021). *Geological World Heritage: a revised global framework for the application of criterion (viii) of the World Heritage Convention*. IUCN. <https://doi.org/10.2305/IUCN.CH.2021.12.en>
- Mittermeier, R.A. et al. (1997). *Megadiversity: Earth's Biologically Wealthiest Nations*. CEMEX.
- Mittermeier, R.A. et al. (2003). Wilderness and biodiversity conservation. *Proceedings of the National Academy of Sciences*, 100(18), 10309–10313. <https://doi.org/10.1073/pnas.1732458100>
- Mittermeier, R.A. et al. (2004). *Hotspots Revisited: Earth's Biologically Richest and Most Endangered Ecoregions*. CEMEX.
- Myers, N. et al. (2000). Biodiversity hotspots for conservation priorities. *Nature*, 403, 853–858. <https://doi.org/10.1038/35002501>
- Olson, D.M. & Dinerstein, E. (1998). The Global 200: A representation approach to conserving the earth's most biologically valuable ecoregions. *Conservation Biology*, 12 (3), 502–515. <https://doi.org/10.1046/j.1523-1739.1998.012003502.x>
- Olson, D.M. & Dinerstein, E. (2002). The Global 200: Priority ecoregions for global conservation. *Annals of the Missouri Botanical Garden*, 89, 199–224. <https://doi.org/10.2307/3298564>
- Olson, D.M. et al. (2000). The Global 200: A Representation Approach to Conserving the Earth's Distinctive Ecoregions. Conservation Science Program, WWF-US, Washington DC, USA.
- Osipova, E., Emslie-Smith, M., Osti, M., Murai, M., Åberg, U. & P. Shadie (2020). *IUCN WH Outlook 3: A conservation assessment of all natural and mixed World Heritage sites*, November 2020. IUCN. <https://doi.org/10.2305/IUCN.CH.2020.16.en>
- Patry, M. & Ripley, S (eds.) (2007). *WH Forests: Leveraging Conservation at the Landscape Level*. Proceedings of the 2nd WH Forests Meeting, Nancy, France, March 9-11, 2005. UNESCO WH Centre. <https://unesdoc.unesco.org/ark:/48223/pf0000150878>
- Perez, F. (2021). The Silent Forest: Impact of Bird Hunting by Prehistoric Polynesians on the Decline and Disappearance of Native Avifauna in Hawai'i. *Geographies*, 1(3), 192-216. <https://www.mdpi.com/2673-7086/1/3/12>
- Rocliffe, S., & Peabody, S. (2014). *Locally-managed marine areas: towards a global learning network*. Blue Ventures Conservation report. https://blueventures.org/wp-content/uploads/2021/03/WCC_LMMA_Workshop_0757_Report.pdf
- Smith, A & Jones, KL (2007). *Cultural Landscapes of the Pacific Islands*. ICOMOS and UNESCO WH Centre. <https://openarchive.icomos.org/id/eprint/2654>
- SPREP. (2016). Battling Invasive Species in the Pacific: Outcomes of the Regional GEF-PAS IAS Project Prevention, control and management of invasive species in the Pacific islands. SPREP. <https://www.sprep.org/attachments/Publications/BEM/battling-invasive-species-pacific.pdf>
- SPREP. (2016). Campaign to battle invasive species in the Pacific. SPREP. <https://www.sprep.org/attachments/Publications/BEM/campaign-battle-invasive-species.pdf>
- SPREP. (2008). Climate Change and the Pacific. SPREP Factsheets. <https://www.sprep.org/attachments/Publications/FactSheet/pacificclimate.pdf>
- SPREP. (2020). Pacific ecosystem-based adaptation to climate change: strengthening and protecting natural ecosystem services to enhance resilience to climate change. SPREP. <https://www.sprep.org/sites/default/files/documents/publications/Pacific-Ecosystem-based-adaptation-climate-change.pdf>
- SPREP. (2021). Pacific Islands Framework for Nature Conservation and Protected Areas 2021-2025. SPREP. <https://www.sprep.org/pirt/framework-for-nature-conservation-and-protected-areas-in-the-pacific-islands-region-2021-2025>
- SPREP. (2016). State of Conservation in Oceania: regional report. SPREP. <https://www.sprep.org/attachments/Publications/BEM/state-conservation-oceania-report.pdf>

- Stattersfield, A.J. et al. (1998). Endemic Bird Areas of the World: Priorities for Biodiversity Conservation. BirdLife International <https://datazone.birdlife.org/info/pubEBAs>
- Steadman, D.W. (1995). Prehistoric extinctions of Pacific Island birds: biodiversity meets zooarchaeology. *Science* 267, 1123-1131. <https://doi.org/10.1126/science.267.5201.1123>
- Steadman, DW. & Martin, P (2003). The late Quaternary extinction and future resurrection of birds on Pacific Islands. *Earth-Science Reviews*, 61(1–2), 133–147. [https://doi.org/10.1016/S0012-8252\(02\)00116-2](https://doi.org/10.1016/S0012-8252(02)00116-2)
- Taylor, S. & Kumar, L. (2016). Global Climate Change Impacts on Pacific Islands Terrestrial Biodiversity: A Review. *Journal of Tropical Conservation Science*, 9(1), 203–223. <https://doi.org/10.1177/194008291600900111>
- Thorsell, J. & Sigaty, T. (1997). A Global Overview of Forest Protected Areas on the World Heritage List. IUCN. <https://portals.iucn.org/library/sites/library/files/documents/WH-WP-003.pdf>
- Thorsell, J., Ferster Levy, R & Sigaty, T. (1997). A Global Overview of Wetland and Marine Protected Areas on the WH List. IUCN. <https://portals.iucn.org/library/sites/library/files/documents/WH-WP-002.pdf>
- TRC Tourism. (2021). Sustainable Tourism Policy Framework. Pacific Tourism Organisation. <https://southpacificislands.travel/wp-content/uploads/2021/07/Pacific-Sustainable-Tourism-Policy-Framework.pdf>
- Twyford, K. (2019). Capacity and competency needs assessment and strengthening for Cook Islands Ridge to Reef approaches and protected area management - Capacity strengthening action plan. Plan prepared for Ridge to Reef (R2R) Project and UNDP. https://www.pacific-r2r.org/sites/default/files/2020-04/R2R%20CSAP_FINAL%2010.04.20.pdf
- Twyford, K. (2020). Towards a Protected Areas Classification System for the Cook Islands: Policy paper #2. Prepared for Cook Islands National Environment Service and Ridge to Reef (R2R) Project.
- United Nations Environment Programme (UNEP), United Nations Environment Programme – World Conservation Monitoring Centre (UNEP-WCMC) & IUCN (2021). Protected Planet: The World Database on Protected Areas (WDPA) [Online], August 2021. UNEP, UNEP-WCMC and IUCN. Available online: www.protectedplanet.net
- United Nations Educational, Scientific and Cultural Organization (UNESCO). General Assembly of States Parties to the World Heritage Convention (2015). Policy Document for the Integration of a Sustainable Development Perspective into the Processes of the World Heritage Convention. <https://whc.unesco.org/document/139747>
- UNESCO (2021a). World Heritage List. Available online: <http://whc.unesco.org/en/list/>
- UNESCO (2021b). Tentative Lists. <http://whc.unesco.org/en/tentativelists/>
- UNESCO, International Centre for the Study of the Preservation and Restoration of Cultural Property (ICCROM), ICOMOS, IUCN. (2023). Enhancing our heritage toolkit 2.0: assessing management effectiveness of World Heritage properties and other heritage places. Manual. UNESCO, ICCROM, ICOMOS, IUCN. <https://portals.iucn.org/library/node/51506>
- van Nimwegen, P., Leverington, F.J, Jupiter, S. & Hockings, M. (edsE.) (2022). Conserving our sea of islands: State of protected areas in Oceania. IUCN. <https://doi.org/10.2305/IUCN.CH.2022.08.en>
- Western and Central Pacific Fisheries Commission (WCPFC) (2014). Report of the 14th Meeting of the International Scientific Committee for Tuna and Tuna-like Species in the North Pacific Ocean. WCPFC. <https://meetings.wcpfc.int/node/8693>
- Williams, P. (2008). *World Heritage Caves and Karst: A Thematic Study*. IUCN. <https://portals.iucn.org/library/node/9267>
- World Wildlife Fund for Nature (WWF) (2008). Northern New Guinea mountain rain forests: Terrestrial Ecoregions.

Annex A: Agencies/Organisations consulted for this project

The following agencies/organisations were either interviewed or consulted for this project⁴¹⁴. The willingness of all consulted to share views, experience, and advice is greatly appreciated.

Category of agency/organisation consulted	Aims and process of consultation	Agency consulted
PICTs State Parties to WHC: PICTs representatives of countries which are State Parties to the WH Convention: <ul style="list-style-type: none"> • Cook Islands • Federated States of Micronesia • Fiji • Kiribati • Marshall Islands • Nauru • Niue (NZ) • Palau • Papua New Guinea • Samoa • Solomon Islands • Timor-Leste • Tonga • Tuvalu • Vanuatu 	Aims: (1) to identify PICTs State Party views on and experience with WH including key challenges and issues; (2) to seek views as to how the WH Convention could be more effectively implemented; and (3) to identify views on possible future sites within their country. Process: an interview with a representative(s) of each country/territory with tailored questions addressing each of the above aims. Some PICTs provided written responses to the listed questions	The following PICTs State Parties were either interviewed or provided written responses to questions for this project: <ul style="list-style-type: none"> • Cook Islands (interview) • FSM (written response) • Fiji (interview) • Palau (interview) • PNG (interview) • Solomon Islands (interview) • Samoa (interview) • Tonga (interview) • Tuvalu (interview) • Vanuatu (written response)
PICTs which are <i>not</i> State Parties to WHC: PICTs representatives of countries which are not State Parties to the WH Convention: <ul style="list-style-type: none"> • American Samoa (US) • French Polynesia (France) • Guam (US) • New Caledonia (France) • Northern Mariana Islands (US) • Tokelau (NZ) • Wallis and Futuna (France) • Pitcairn Islands (UK) 	Aims: To identify PICTs non-State Party views on the WH Convention and specifically to: (1) identify whether they may be considering joining the WH Convention in the future; and (2) whether they consider there are sites within their country/territory which may have the potential for being inscribed on the WH List. Process: involved an interview with a representative(s) of each country/territory with tailored questions to address each of the above aims.	The following PICTs non-WH State Parties were either interviewed or provided written responses to questions for this project: <ul style="list-style-type: none"> • US⁴¹⁵ (covering American Samoa, Guam and Northern Mariana Islands) • Tokelau (NZ) - interview • New Caledonia (France) - interview

⁴¹⁴ A number of these interviews were carried out jointly with consultants working on the UNESCO Pacific Regional WH Action Plan 2021-2025.

⁴¹⁵ One interview with the State Party of the US addressed WH issues in the three US territories listed.

Category of agency/organisation consulted	Aims and process of consultation	Agency consulted
<p>WH Site managers: covering managers of WH sites in the Pacific region:</p> <ul style="list-style-type: none"> • <i>East Rennell</i>, Solomon Islands • <i>Phoenix Islands Protected Area</i>, Kiribati • Rock Islands Southern Lagoon, Palau • Henderson Island, UK • <i>Lagoons of New Caledonia: Reef Diversity and Associated Ecosystems: Reef Diversity and Associated Ecosystems</i>; New Caledonia, France • <i>Hawaii Volcanoes National Park National Park</i>, Hawaii, US • <i>Papahānaumokuākea</i>, Hawaii, US 	<p>Aims: To identify the views of WH site managers regarding: (1) the key challenges and issues facing the WH site they are responsible for; (2) their views on potential future WH sites in their country and within the Pacific region; and (3) their general views on the application of WH Convention in the Pacific region.</p> <p>Process: involved a request for written feedback on questions addressing each of the above aims.</p>	<p>Written responses were received from the site managers of the following WH sites:</p> <ul style="list-style-type: none"> • East Rennell, Solomon Islands • Rock Islands Southern Lagoon, Palau • Hawaii Volcanoes National Park, Hawaii, US • Papahānaumokuākea, Hawaii, US
<p>Experts in WH in the Pacific region: requests for advice and input were sent to more than 50 WH experts covering the fields of marine biodiversity, terrestrial biodiversity and geology.</p>	<p>Aims: To identify expert views on: (1) potential WH sites in the Pacific region; (2) key issues and challenges facing WH in the Pacific region; and (3) opportunities for increasing support and funding for WH in the Pacific region.</p> <p>Process: involved a request for written feedback on questions addressing each of the above aims.</p>	<p>Written responses were received from representatives of the following agencies/organisations⁴¹⁶:</p> <ul style="list-style-type: none"> • AIMS • Auckland University • Coral Reef Research • Coral Triangle Centre • Ecological • EXTENT Heritage Advisers • Hatfield Consulting Group • IUCN Global HQ and IUCN Oceania Regional Office • IUCN WCPA • James Cook University • Polynesianexplorer • Protected Area Solutions • Reefecologic • Samoa Conservation Society • SPREP • Tierramar • Wildlife Conservation Society • UNESCO WH Centre • University of Queensland • University of the South Pacific • WWF Pacific <p>Written responses were also received from eighteen (18) WH experts who were not affiliated with an organisation.</p>

416 Listed in alphabetic order.



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