



**MARINE SPATIAL PLANNING
FOR A BLUE ECONOMY
IN AUSTRALIA**

SUPPORTING PAPERS

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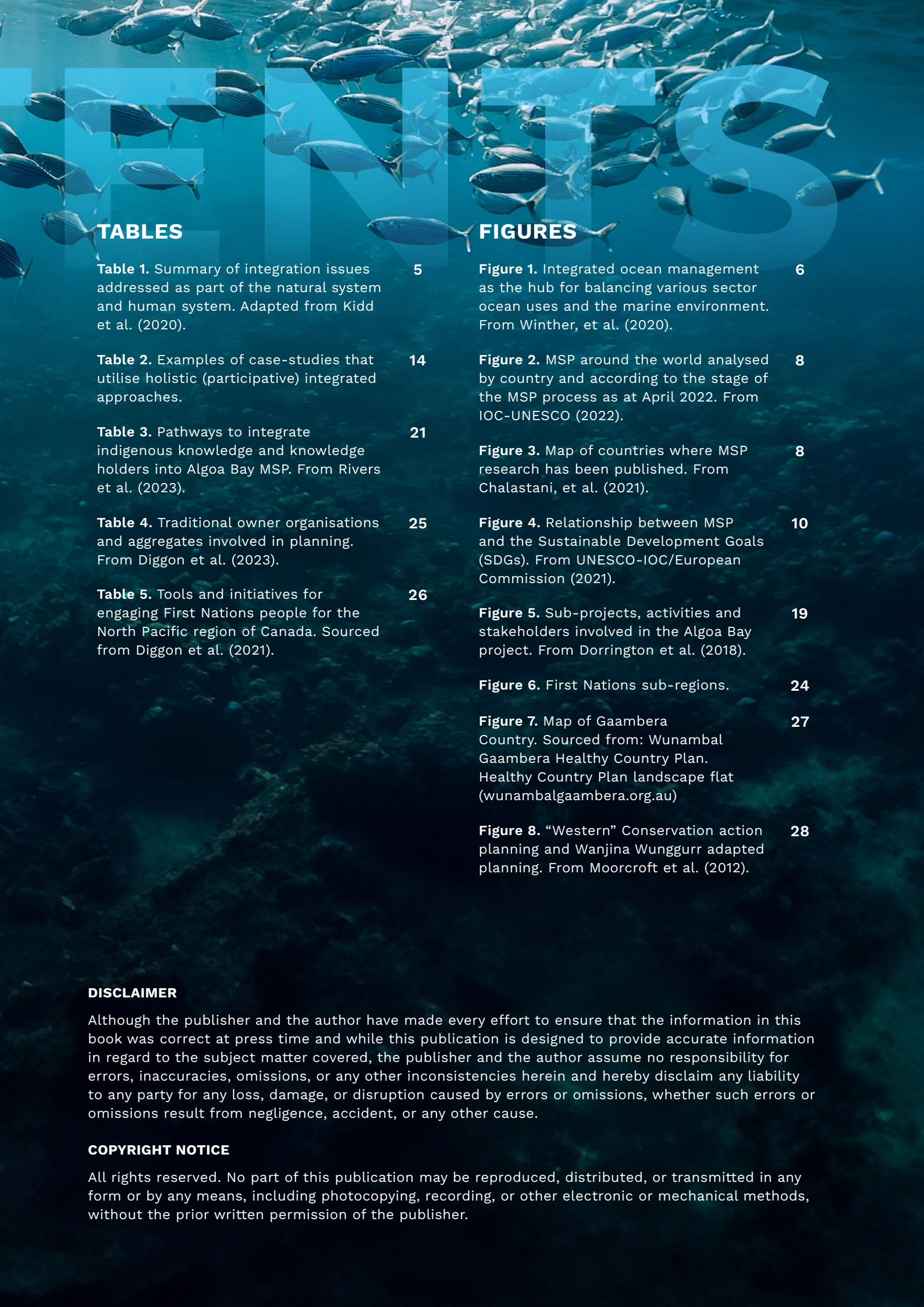
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All rights reserved. No part of this publication may be reproduced, distributed, or transmitted in any form or by any means, including photocopying, recording, or other electronic or mechanical methods, without the prior written permission of the publisher.

1. Marine Spatial Planning

Laura Griffiths and Chris Frid

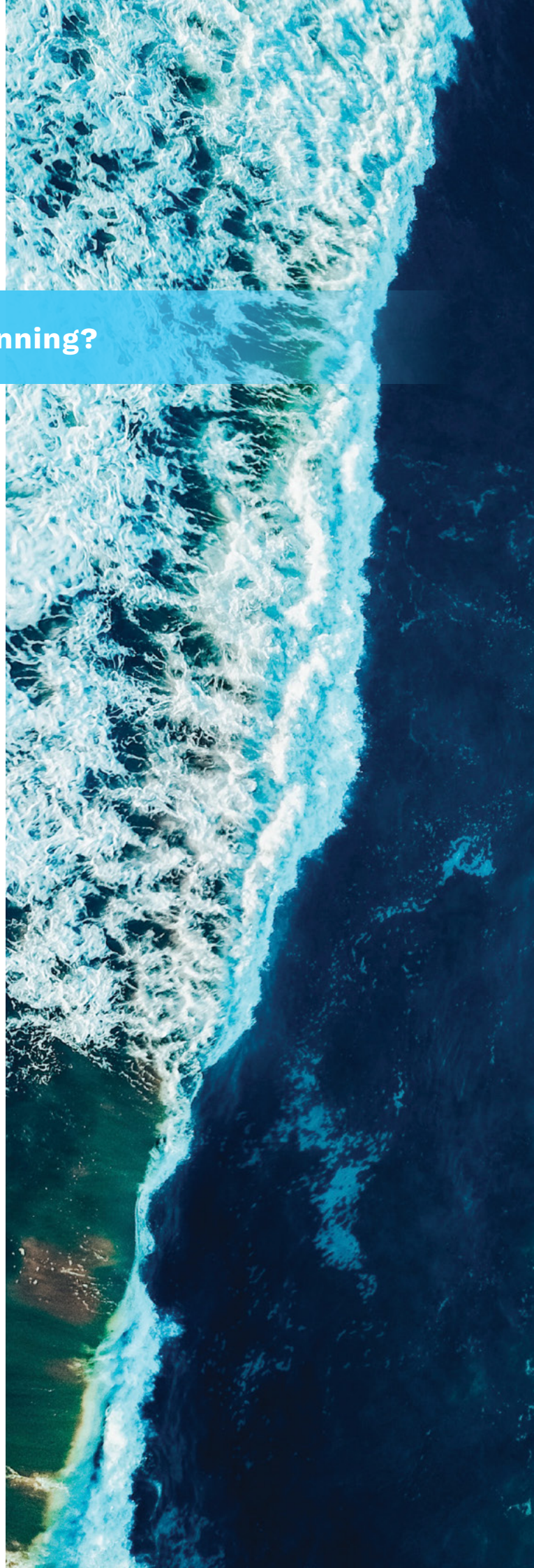
1.1. What is Marine Spatial Planning?

Marine Spatial Planning (MSP) is defined most succinctly as a “public process of analysing and allocating the spatial and temporal distribution of human activities in marine areas to achieve ecological, economic and social objectives that have been specified through a political process” (Ehler & Douvère, 2010).

This definition is also adopted by IOC-UNESCO (UNESCO-IOC/European Commission 2021). However, some countries have created their own definition for MSP. For example, the European Union (EU) Directive 2014/89/EU establishing a framework for MSP (EULEX, 2014) defines MSP as “a process by which the relevant Member State’s authorities analyse and organise human activities in marine areas to achieve ecological, economic and social objectives”.

Importantly to recognise, is that MSP is not a tool, but a multi-objective, multi-use, integrated planning process (Figure 1) that represents an agreed set of principles and processes to manage interactions between all uses of ocean space and their impact on the environment (Flannery and Cinneide, 2012; Ehler, 2021). Moreover, it has wide reaching impacts for stakeholders by synthesizing information and threats to the marine environment, resources, ecosystem services, uses and values (Agardy, et al., 2011).

Marine spatial planning is not intended to be a one-off process nor is it intended to produce a “master plan” or “blueprint”, rather it continually evolves and adapts as new issues/data emerge from monitoring and evaluation (Ehler, 2021). Marine spatial planning offers countries an operational framework to maintain the value of their marine biodiversity while at the same time allowing sustainable use of the economic potential of their oceans.



“As an operational framework, MSP is a multi-faceted approach that can simultaneously support the conservation of a nation’s marine environment, enable the realisation of its economic potential, and facilitate more integrated patterns of sea use among actors” (McAteer et al. 2022)

Concepts that incorporate all, or parts of MSP go by many names such as ocean zoning, maritime spatial plans, integrated coastal zone management (ICZM), regional marine plans, coastal management plans, spatial plans, multi-use plans, sea use management plans, etc. However, MSP is globally recognised as a stand-alone process that incorporates a series of principles and components that are unique to MSP (UNESCO-IOC/European Commission, 2021).

These principles include integration, ecosystem-based approach and a participatory process (defined in the next section). Therefore, MSP does not include zoning without plans, nor does it focus solely on Marine Protected Areas or Marine Reserves because they have very different goals, despite similar planning processes (Ehler, 2021). The Intergovernmental Oceanographic Commission (IOC) within the United Nations Educational, Scientific and Cultural Organization (UNESCO) has produced a global platform that delivers a roadmap and framework for MSP to support the uptake and adoption of MSP globally and is a useful site to access further information about MSP¹.

1.2. Common Principles of MSP

MSP is guided by a set of principles that are a common part of the MSP framework adopted internationally.

These principles include adopting integrated¹ holistic² approaches, using ecosystem-based management, having participative engagement and being future-focussed.

1.2.1. Integrated holistic approach

The concept of an integrated holistic approach is multi-faceted, incorporating both the natural system and human system in various ways (Kidd et al., 2020; Table 1).

Table 1. Summary of integration issues addressed as part of the natural system and human system. Adapted from Kidd et al. (2020).

Natural System	Human System
<p>Integration as related to the natural system includes:</p> <ul style="list-style-type: none"> △ spatial integration within large marine ecosystems △ integration across the land-sea interface △ integration across multiple dimensions of space and time 	<p>Integration as related to the human system includes:</p> <ul style="list-style-type: none"> △ sectoral (related to public policy areas and different sectoral types) △ territorial (related to spatial coverage such as cross border⁴ or transboundary⁵) △ administrative (related to matters of general coordination) △ political (related to potentially contradictory policy objectives and interests) △ cultural (related to ways of life and meanings associated with the ocean) △ knowledge-related (referring to different types of knowledge and data integration) △ technical (related to specific technical inputs)

¹ See MSP Global - www.mspglobal2030.org.

Marine spatial planning uses information on the natural system to support decision-making processes about the human system and create sustainable pathways to meet the economic, environmental and social needs of societies. The MSP process brings actors from different sectors (Figure 1) and action arenas to exchange visions, interests, concerns and work together in an integrated way towards developing a holistic and widely acceptable process and/or plan (UNESCO-IOC/European Commission, 2021).

This process should result in a coordinated and coherent system for actors utilising those marine resources within the allocated MSP space (Brennan et al., 2014). It has wide reaching impacts for stakeholders by synthesizing information and threats to the marine environment, resources, ecosystem services, uses and values (Agardy et al., 2011). The coordination of discussion among and within sectors and societal actors (horizontal and vertical integration) enables planning and/or operational processes to be made more efficient, as well as resolve current conflicts and avoid potential future ones (Ehler et al., 2019).

Figure 1. Integrated ocean management as the hub for balancing various sector ocean uses and the marine environment. From Winther, et al. (2020).



The introduction of an MSP framework is not intended to replace existing sectoral policies or plans (and rarely has done) but adds a stronger coordinating element to marine governance (UNESCO-IOC/European Commission, 2021). This can lead to changes in sectoral policies when they are later reviewed. In addition, national marine spatial plans can foster other multisectoral policies, such as blue economy strategies.

² Integrated is defined as bringing together departments responsible for marine management planning and regulation (including those whose activities threaten marine ecosystems) and organisations who have a vested interest in the marine estate, to create a common framework for understanding of management challenges (adapted from Rodrigues, 2017).

³ Holistic is defined as taking account of all activities that either operate in, or interact with, the marine environment. Holistic is connected with the participative approach.

⁴ Cross-border refers to entities that share a common (agreed or disputed) political border (e.g., neighbouring countries, regions, provinces or municipalities).

⁵ Transboundary refers to the engagement of multiple entities (e.g. countries, states, provinces) across one sea area which do not necessarily share common issues for marine planning.

1.2.2. Ecosystem-based approach

Ecosystem-based management (EBM) is defined as an environmental management approach that recognises the full array of interactions within a marine ecosystem, including humans, rather than considering single issues, species, or ecosystem services in isolation (Christensen et al., 1996).

It is based on the best available scientific knowledge about the ecosystem and its dynamics, in order to identify and take action on influences which are critical to the functioning of marine ecosystems (HELCOM-OSPAR, 2003). The goal of ecosystem-based marine management is to maintain marine ecosystems in a healthy, productive, and resilient condition so that they can sustain human uses of the ocean and provide goods and services (McLeod et al., 2005; Foley et al., 2010).

1.2.3. Participatory approach

A participatory approach is an important part of MSP because it provides an impartial and rational process to incorporate societal values, needs and concerns into planning (Flannery & McAteer, 2020). Active engagement and integration of needs across sectors, organisations and within different levels of government is essential to resolve conflicts and identify trade-offs. It also improves the legitimacy and quality of decision-making processes, builds trust and is widely viewed as leading to decisions that are more durable than those without participation (Fox et al., 2013). This is because it allows for enhanced understanding among stakeholders about the local marine environment, their multiple and cumulative impacts on the ecosystem and facilitates an understanding of other stakeholder perspectives (Ehler & Douvère, 2009).

There are a range of participation models used in MSP, from consultation processes to collaborative processes where stakeholders work with government to produce and implement a spatial plan (Fleming & Jones, 2012). The different models come with their own set of advantages and disadvantages. It is likely that different types of stakeholder participation may be appropriate at various steps of the MSP process.

1.2.4. Future-focussed

To be effective long-term, MSPs must plan beyond the current 'state of play' and incorporate processes that account for future social and environmental conditions, and future ocean uses (Zuercher et al., 2022).

This is achieved through a suite of mechanisms including ongoing monitoring and evaluation, with the flexibility to pivot plans in response to changing conditions⁶, using visioning exercises and scenario building tools to anticipate future uses (McGowan et al., 2019), reserving areas for future uses that are not yet explicit⁷ and incorporating future climate change impacts in MSP policies (Marine Management Organisation, 2020).

1.3. Global context for MSP

MSP has rapidly become the most commonly endorsed management regime for sustainable development in the marine environment, with initiatives being implemented across multiple regions of the globe (McAteer et al., 2022). In 2022, UNESCO reported that over 300 MSP initiatives have been initiated from 102 countries.

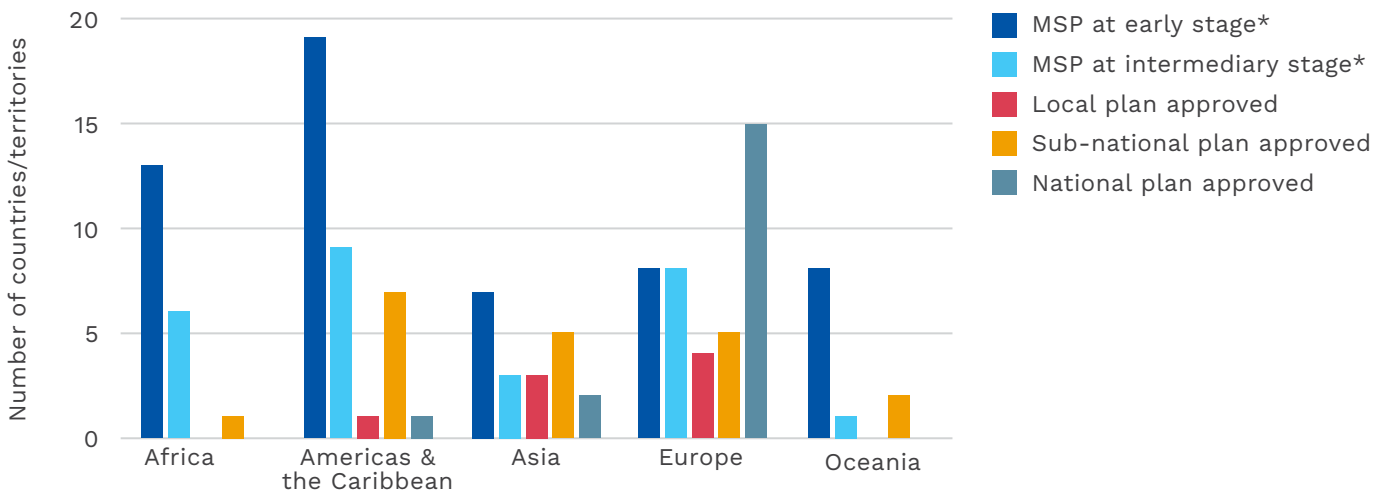
Approximately 50% of these countries are in the early stages of MSP, 25% are in plan development, and 38 countries have completed and approved plans at either a local, sub-national or national scale (IOC-UNESCO, 2022; Figure 2).

Countries with operational MSPs include Belgium, Germany, the Netherlands, Norway, China, and Belize, where the MSPs cover the majority of the domestic waters and the United States, Canada and Croatia where local or regional MSPs are in effect (UNESCO-IOC/ European Commission, 2021; Penino et al., 2021).

⁶ For example, Germany – https://www.bsh.de/EN/TOPICS/Offshore/Maritime_spatial_planning/maritime_spatial_planning_node.html.

⁷ For example, England - <https://explore-marine-plans.marineservices.org.uk/>.

Figure 2. MSP around the world analysed by country and according to the stage of the MSP process as at April 2022. From IOC-UNESCO (2022).

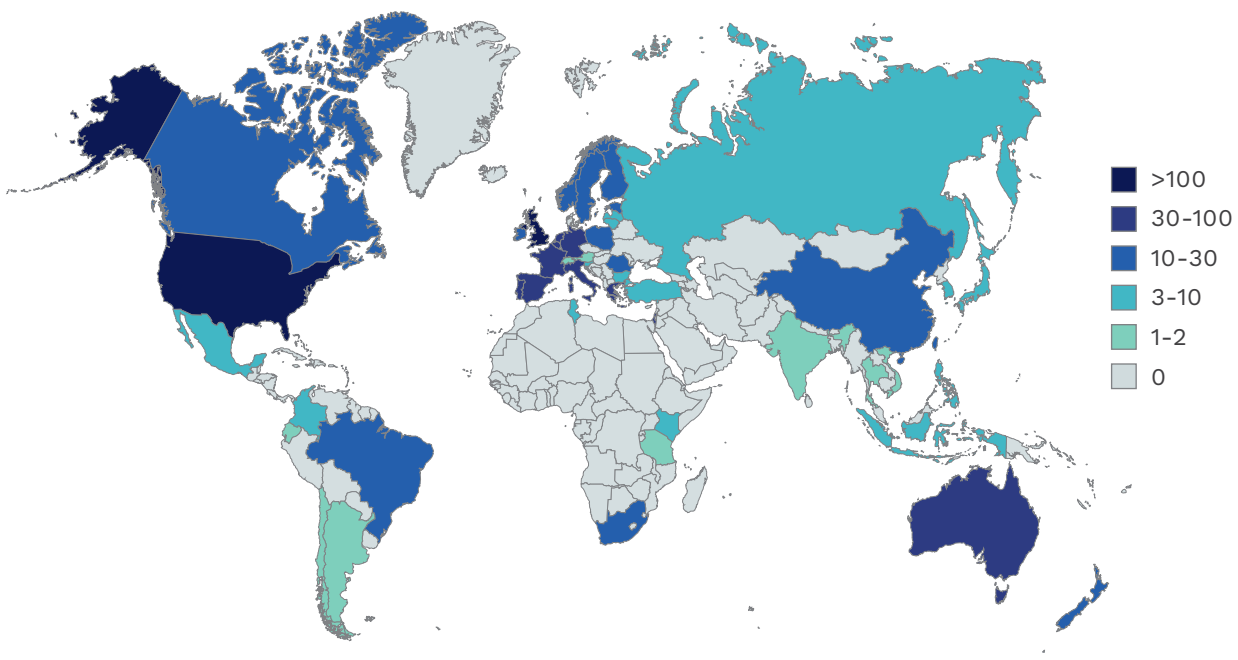


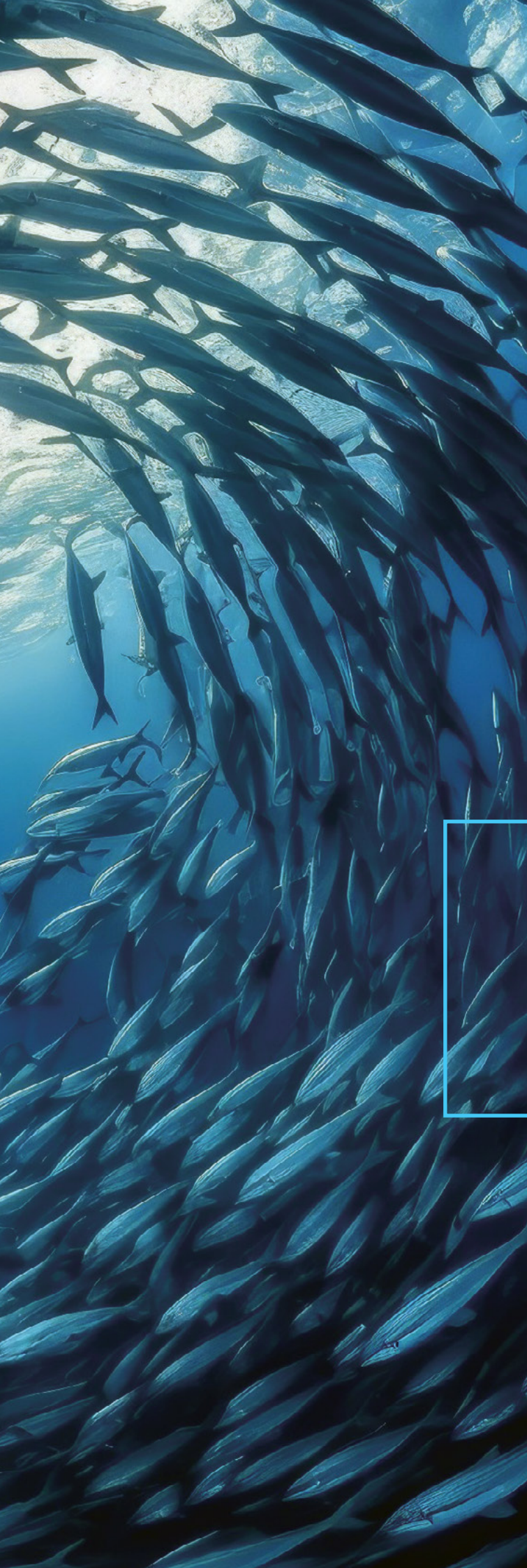
*Whenever a country/territory had only pilots, it was considered at an early stage independently of its development level. **For at least part of the maritime area. Note: Some countries were classified more than once due to the complexity of their planning systems.

Research on MSP is growing exponentially with 1,323 publications already published by 2019 (Chalastani et al., 2021). Majority of research has been published from countries of the European Union (EU) because of the 2014/89/EU Directive, as well as the United States (Figure 3). In Australia, most MSP research relates to the Great Barrier Reef (GBR). Research on MSP is typically qualitative indicating that MSP internationally is still in the planning stages (few exceptions) because quantitative MSP research (data, decision support tools, and monitoring and evaluation) come later in the planning stages of the MSP process (Chalastani et al., 2021).

Despite the broad and growing acceptance of MSP internationally, there are many lessons still to be learned and challenges to overcome that impact the realisation of MSPs potential.

Figure 3. Map of countries where MSP research has been published. From Chalastani, et al. (2021).





1.4. Future for MSP

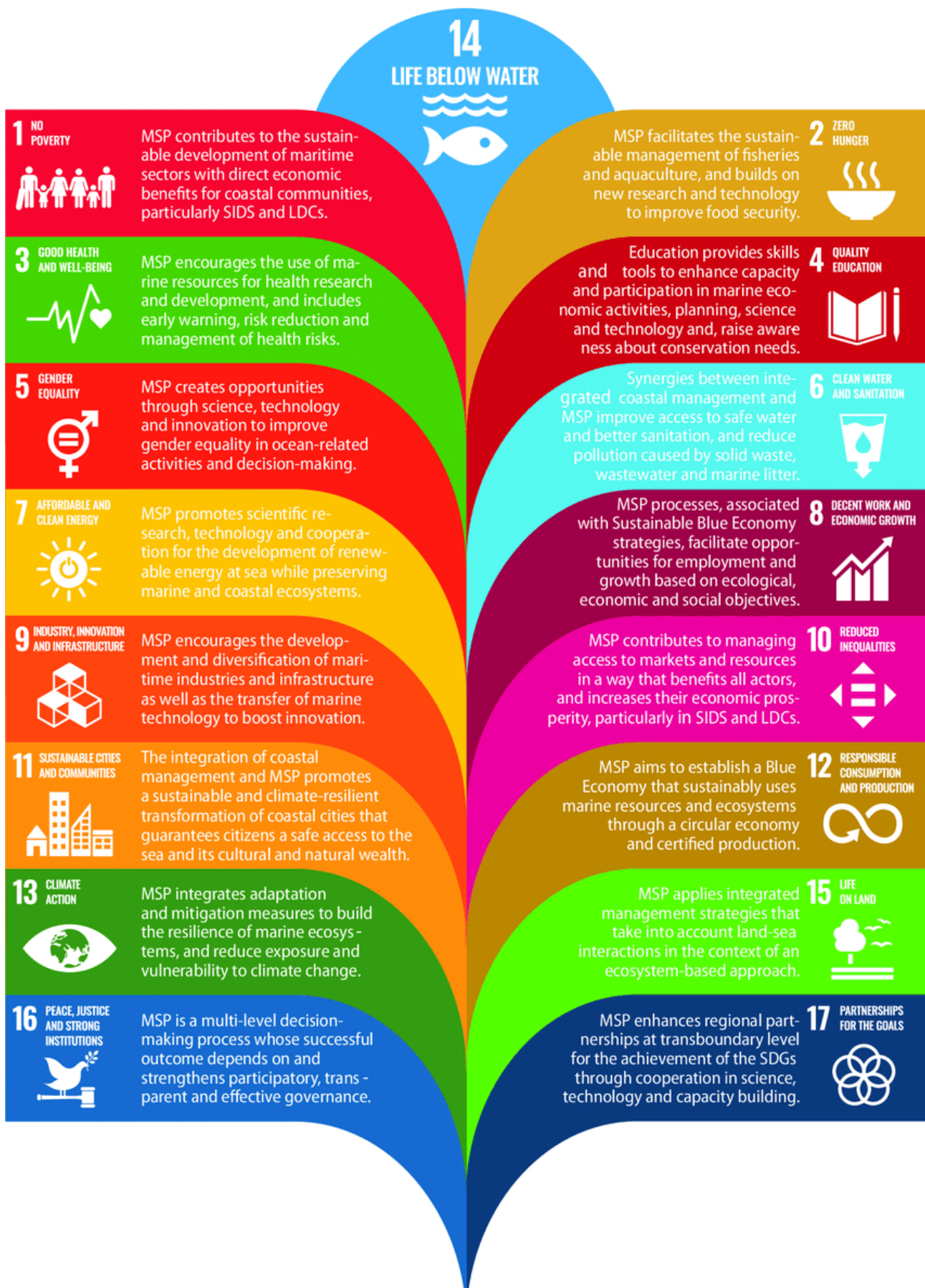
There has been a shift in focus from MSP being used as a conservation management tool to one that aligns and supports sustainable blue growth and economic development (Zeurcher et al., 2022; Penino et al., 2021). MSP is considered an enabler of the blue economy because it:

- △ identifies sites for new and emerging uses following an ecosystem-based approach
- △ mitigates conflict
- △ promotes multi-use spaces for coexistence and synergies
- △ increases investor confidence by introducing transparency and predictability
- △ facilitates filling critical knowledge gaps on the ocean and key sectors
- △ can foster collaboration across borders for regional development
- △ promotes capacity building through innovative and transformative technologies
- △ removes duplication of environmental approval processes, centralises data and access to it

There is also real opportunity to use MSP to future plan for expanding industries and address climate change issues, rather than just plan for past and current activities in alignment with existing policies (Zuercher et al., 2022).

MSP can provide an important pathway to meet commitments and achieve goals under international agreements (Figure 4).

Figure 4. Relationship between MSP and the Sustainable Development Goals (SDGs). From UNESCO-IOC/European Commission (2021).



2. Integrated Participative Approaches

Laura Griffiths and Chris Frid

Integrated approaches are a fundamental part of the MSP process because they shape the way stakeholder participation is enabled and decisions are made. This chapter looks at international case studies to see how integration and participation has been applied in MSP. Other examples of integrated approaches used in Australia are also discussed. Two common decision-making approaches used in MSP are highlighted and their strengths and weaknesses considered.

2.1. International approaches

International case studies provide examples of participative integrated approaches applied to coastal and marine waters (Table 2).

Canada was the first country in the world to adopt a comprehensive and innovative federal legislative framework for integrated and sustainable ocean management through its Oceans Act 1996 and subsequent policies and strategies (Hall et al., 2011; Flannery & O’Cinneide, 2012; Ban et al., 2013).

The Department of Fisheries and Oceans (DFO) led the planning processes through a collaborative and co-management approach (Hall et al., 2011) including the development of five Large Ocean Management Areas (LOMAs).

The Eastern Scotian Shelf Integrated Management Area (ESSIM) (Oceans and Habitat Branch, Fisheries and Oceans Canada, 2007), was the first integrated plan to be developed because of the regions multiple conflicting uses, extensive areas of high biodiversity and extensive living and non-living resources (Rutherford et al., 2005; Hall et al., 2011).



The ESSIM promoted collaboration in addressing jurisdictional overlaps or inconsistencies among legislated authorities, as well as for management needs not adequately covered by existing legislated authorities. Other regulatory authorities retained their sector responsibilities for implementing policies and measures within their respective mandates (Department of Fisheries and Oceans, 2005; Hall et al., 2011).

Stakeholders included federal and provincial departments, local municipal and planning authorities, aboriginal communities, ocean industry and resource use sectors, environmental interest groups, coastal communities, and scientists (Rutherford et al., 2005). The ESSIM collaborative planning model had four institutional structures (Department of Fisheries and Oceans, 2007) including: 1) the Government Sector Structure; 2) the ESSIM Planning Office; 3) the ESSIM Forum and 4) the Stakeholder Advisory Council (SAC).

The design for stakeholder engagement in the planning model was identified initially through informal bilateral meetings, information sharing and discussions with stakeholders, and on a sector-to-sector basis. While this plan is now obsolete, it continues to inform the development of a new generation of regional marine spatial plans in Canada, including one for the Scotian Shelf-Bay of Fundy.

Other examples of participative integrated approaches to ocean management include the United States, Belgium, and England (Table 2).

In the US, during the era of Obama's National Ocean Policy (2010), federal coastal and ocean

planning was undertaken under the direction of the National Ocean Council, which utilised Regional Planning Bodies (RPBs) to facilitate interstate cooperation to develop Regional Ocean Plans (ROPs). However, the RPBs were not decision-making bodies and ROPs were limited to mapping ocean uses and did not identify optimal locations for future ocean uses. Unfortunately, only two ROPs were completed and federally approved before the Trump administration revoked the National Ocean Policy framework in 2018.

One of the plans that was approved was the Northeast Ocean Plan 2016 which continues to operate through the Northeast Regional Ocean Council's (NROC) Ocean Planning Committee, a voluntary participation between federal, state and tribal authorities. Outputs from this committee are used to inform government decision making including federal Executive Orders.

In England, marine planning is managed by the Marine Management Organisation (MMO), a non-departmental public body established under the Marine and Coastal Access Act 2009.

The MMO acts as a marine planning body and regulator and is responsible for the development and ongoing evaluation of England's 11 regional marine plans in accordance with its Marine Policy Statement (MPS), the cornerstone of marine planning in England. MMOs are required to engage with all stakeholders and interested parties in developing the plans in accordance with the Statement of Participation that has been published and approved for that particular marine region⁸.

⁸ e.g. See https://assets.publishing.service.gov.uk/media/5e18692ae5274a06b60be389/Revised_SPP_SE_Clean.pdf.



In Belgium, relevant federal and state governments are grouped into an Advisory Commission to provide advice on draft maritime spatial plans through informal bilateral consultations. The Commission resulted in the integration of federal departments and Maritime Spatial Plan Law.

Decisions on MSP are based on an 'equal treatment principle' (embedded in Belgian Constitution), where sectoral interests need to be weighed against public interests and with respect of equal treatment between sectors. Some sectors also have advisory bodies that give informal direct advice to a cabinet of Ministers.

2.2. Approaches in Australia

The Australian government utilises a holistic integrated management approach to manage the Great Barrier Reef Marine Park, however, this approach has not been widely adopted elsewhere in Australia's marine estate. Local councils have incorporated elements of a holistic approach to manage their land and catchments. Councils operate in a complex environment, with responsibilities under some 67 different Acts, and direct relationships with more than 20 State and Commonwealth agencies (Office of Local Government, 2021).

Local government planning connects with the wider spheres of regional, state and federal planning and there is a natural flow between the planning systems, with each level ultimately informing the others. For example, in New South Wales (NSW), an Integrated Planning and Reporting (IP&R) framework has been utilised since 2009, with amendments placing engagement with communities and community aspirations, at its core (Office of Local Government, 2021). The IP&R Framework begins with a Community Strategic Plan and includes a suite of integrated plans that set out a vision, goals and strategic actions to achieve them.

It involves a reporting structure to communicate progress to council and the community as well as a structured timeline for review to ensure the goals and actions are relevant. Joint councils must consider member councils strategic

priorities when developing their regional priorities. In Victoria, Catchment Management Authorities (CMAs) are established for each of the ten catchment and land protection regions under the Catchment and Land Protection Act 1994.

The CMAs are responsible for the development, coordination, and monitoring of Regional Catchment Strategies (RCS) (Victorian Department of Environment, Land, Water and Planning, 2016). The RCSs bring together and align federal and state policies and strategies with local community values across both public and private land. They are developed and implemented in collaboration with partners and communities, with regional catchment condition and management reporting developed for each RCS.

Table 2. Examples of case-studies that utilise holistic (participative) integrated approaches. Type: T indicates top-down approach; B indicates bottom-up approach. TO = Traditional Owners; NGO = Non-Government Organisation.

Location	Scope	Sectors/ Stakeholders	Approach for integration and collaboration	Type	Pros	Cons	Ref
Great Barrier Reef, (GBR) Australia	GBR Marine Park (within state and federal waters)	Federal and state government, Traditional Owners, community and industry groups, NGOs and scientists.	Overarching legislative framework to guide sectoral management ⁹ . Uses strategies and plans to achieve goals.	Both	Inclusive and adaptive, cross-boundary, vertical and horizontal integration, funded process.	Legislative mechanisms limited to area of plan, addressing drivers of threats (on land) dependent on building strong relationships.	Day & Dobbs, 2013 Kennington & Day, 2011 Olsen et al., 2014.
Victoria, Australia	State waters and 5km inland	State government, Statutory authorities, TOs, councils, NGOs, community and industry groups and peak bodies.	Integrated regional catchment planning with communities ¹⁰ . Aligns federal and state policies. Uses Regional Catchment Strategies (RCS) for priority planning and on-ground delivery of actions.	B	Highly inclusive, vertical and horizontal integration, cross boundary (land and sea), funded process.	Long process to finalise and approve RCS. Insufficient time for CMAs to deliver the value of the work.	Victorian Auditor General, 2014.
NSW, Australia	State land to MHWS, includes semi-enclosed waterways	Local councils, state government, industry and community groups and individuals.	Integrated planning framework within local councils ¹¹ . Uses Community Strategic Plan to address community-wide issues which are core to the process.	B	Allows for a long-term planning process, horizontal and vertical integration.	Community engagement limited to subset of individuals with capacity and motivation to engage.	Office of Local Government, 2021.
Canada	Federal waters (12-200 nm)	Federal and provincial government, local councils, TOs, industry groups, NGOs, community groups and scientists.	Links sector planning and management by defining overarching goals and objectives in a Regional Plan ¹² . Identifies strategies for inclusion in sector-based management processes to support broader objectives and outcomes.	B	Highly inclusive, promotes collaboration, well-defined structure to integrate stakeholders.	Decision-making by consensus reduced decisions to strategic objectives only.	Flannery & O’Cinneide, 2012. Flannery et al, 2018. Hall et al., 2011 Olsen et al. 2014. Rutherford et al., 2005.

Location	Scope	Sectors/ Stakeholders	Approach for integration and collaboration	Type	Pros	Cons	Ref
Belgium	State and federal waters	Federal and state government	Federal Minister for MSP. Federal and state government departments integrated through an MSP Advisory Commission ^{12F} . Equal treatment principle (within sectors, and between sectors and public) guides decision-making. Forum (Coast Guard) for consultation between public agencies.	T	Legislated process with clear reporting framework, social equity law (Belgian Constitution)	Not all sectors represented (i.e. those without advisory bodies or peak bodies) and low social equity, MSP mandated process.	Maes & Rabau, 2022.
Norway	1 nm to EEZ	Federal government, provincial government (counties), local councils, Sami parliament, scientists	Inter-ministerial steering committee and sector-led working groups guide sectoral management and drive spatial placement of activities through Integrated Management Plans ¹⁴ . Forums and meetings across sectors.	T	Strong structured approach, utilises regulatory instruments, fast process to translate policy into practise.	Rely on political will to develop integrated plans, not all sectors represented, limited stakeholder engagement at local level, national assembly approves MSP (not government).	Maes & Rabau, 2022. Olsen et al., 2014. Rodriguez. 2017. Winther et al., 2020.
United States (US)	Federal waters	Federal and state government, TOs, Fishery Management Councils, scientists.	New Policy to develop ocean plans ¹⁵ and strengthen ocean governance. Regional Planning Bodies formed to facilitate interstate coordination. Utilised overarching guiding principles, and mapped ocean use.	T	Utilised existing authorities and advisory groups, flexible framework.	No funding to enact the NOP, not all sectors represented, low social equity, not mandated, not a decision-making process. Policy now revoked (Appendix 1).	Bates, 2017 Hall et al., 2011 Olsen et al., 2014. Rodriguez. 2017. Winther et al., 2020.

Location	Scope	Sectors/ Stakeholders	Approach for integration and collaboration	Type	Pros	Cons	Ref
United States, Rhode Is.	State waters and federal waters	Federal and state government, industry and community groups, scientists, TOs.	Regional planning used existing legal instruments to mandate planning process ¹⁶ and extend into federal waters. Agreements for cross-boundary planning.	B	Extensive engagement, horizontal integration, utilised existing authorities.	Some sectors felt they weren't considered adequately during the planning process.	Bates, 2017 Hall et al., 2011 Olsen et al., 2014. Rodriguez. 2017. Winther et al., 2020.
United Kingdom (UK), England	English waters (from MHWS to the EEZ)	Federal and provincial government, NGOs, all marine industries, heritage.	Uses an executive, non-departmental public body ¹⁷ to manage English seas through a planning, licensing and regulatory framework. Planning guided by a policy ¹⁸ . Stakeholder and sector engagement guided by a statement ¹⁹ . Legislative requirement for integration with other plans.	Both	Legislated, MSP funded, structured sector and stakeholder engagement process, horizontal and cross-boundary integration.	Some sectors felt their opinions/ needs were not taken in to account during consenting.	Glegg et al., 2015. Hooper et al., 2015. Kennington & Day, 2011. Slater & Calydon, 2020.

⁹ Reef 2050 - <https://www2.gbrmpa.gov.au/our-work/reef-management-strategies/reef-2050-policies>.

¹⁰ Victoria's Integrated Catchment Management - <https://www.water.vic.gov.au/waterways-and-catchments/our-catchments/our-catchments-our-communities/celebrating-25-years-of-integrated-catchment-management-in-victoria>.

¹¹ IP&R Framework - <https://www.olg.nsw.gov.au/councils/integrated-planning-and-reporting/>.

¹² ESSIM Plan - <https://publications.gc.ca/site/eng/9.650616/publication.html>.

¹³ MSP 2020-2026 - <https://www.health.belgium.be/en/marinespatialplan.be>.

¹⁴ Norway's Integrated Ocean Management Plans - <https://www.regjeringen.no/en/dokumenter/meld.-st.-20-20192020/id2699370/?ch=2>.

¹⁵ Northeast Ocean Plan - <https://neooceanplanning.org/plan/>.

¹⁶ Rhode Island Ocean SAMP - http://www.crmc.ri.gov/samp_ocean.html.

¹⁷ Marine Management Organisation - <https://www.gov.uk/government/organisations/marine-management-organisation>.

¹⁸ Marine Policy Statement - <https://www.gov.uk/government/publications/uk-marine-policy-statement>.

¹⁹ Statement of Public Participation - <https://www.gov.uk/government/publications/marine-planning-statement-of-public-participation/marine-planning-statement-of-public-participation>.



2.3. Types of decision making

The governance approach for integration influences how management decisions are made. Marine planning decision making, and stakeholder engagement processes usually adopt (to some degree) one of two governance approaches:

1. **Top-down – strict control, planning and regulation by top management / government with limited stakeholder influence.**
2. **Bottom-up – flexible, inclusive, and adaptive; stakeholders can influence decisions.**

2.3.1. Top-down

The top-down approach is interpreted as a system with limited ability to change or adapt. Decisions are made mostly by leadership at the top and involve limited stakeholder influence. For example, stakeholder engagement may be limited to an information sharing exercise rather than being given the ability to influence decisions. MSP processes that have utilised this approach tended to have a regional or national guidance model, such as Belgium, Norway and the United States federal processes (Table 2). In all three examples, horizontal and vertical integration was facilitated through an overarching high-level committee or body that enabled round table discussions to take place between selected sectors and government departments.

2.3.2. Bottom -up

The bottom-up approach facilitates mechanisms that enable more comprehensive vertical and horizontal integration, cross boundary planning and gives a voice to stakeholders and rightsholders throughout the planning process. Examples of regions that use this approach have tended to be at the state, provincial or municipal level, such as Victoria's Integrated Catchment Management, the NSW council planning framework, and the Rhode Island Ocean SAMP in the United States (Table 2). Canada's marine federal planning process is an exception here and was the first country in the world to enact a legislated national co-management and collaborative regional planning process (Flannery & O'Conneide, 2011; Hall et al., 2011).



2.3.3. Research-led bottom-up approaches

Planning approaches led by researchers or industry are also part of the bottom-up governance model. Although none of these approaches are included in the case studies (Table 2), they exist elsewhere.

For example, in Israel, marine spatial planning (Technion Israel Institute of Technology, 2015) was an extra-governmental academic initiative from the Israel Institute of Technology to create a roadmap that served as a shadow-plan while institutional processes were being formulated. The process was conducted with the assistance of a large group of stakeholders consisting of representatives from government ministries and bodies, NGOs, local authorities, and marine-related business sectors (Rivers et al., 2022).

A separate government-led process was carried-out simultaneously and several of the planning principles from the academic plan were incorporated into the new Israel Maritime Policy (Israel Planning Administration, 2020). However, this was the only component of the academic plan that was utilised by government (Rivers et al., 2022).

In Greece, universities have developed maritime spatial pilot projects in places such as the Adriatic Ionian Region (Barbanti et al., 2015) aimed at promoting MSP implementation in the Mediterranean Sea. This work was funded by grants through the EU. Although the plans are non-binding and are not endorsed by public

authorities, they showcased how macroregional planning can be undertaken. More specifically, they created a pathway for operational cross-border MSP processes, which have prevented conflicts for space allocation, provided confidence for blue economy investment, involved all relevant stakeholders and enhanced coherence between terrestrial and marine planning (Barbanti et al., 2015).

The intent of the plan was to deliver a useful instrument to be adopted for future regional MSP initiatives which are intended to be implemented by the federal government (European MSP Platform, 2022). Current MSP processes in Greece are sector-led.

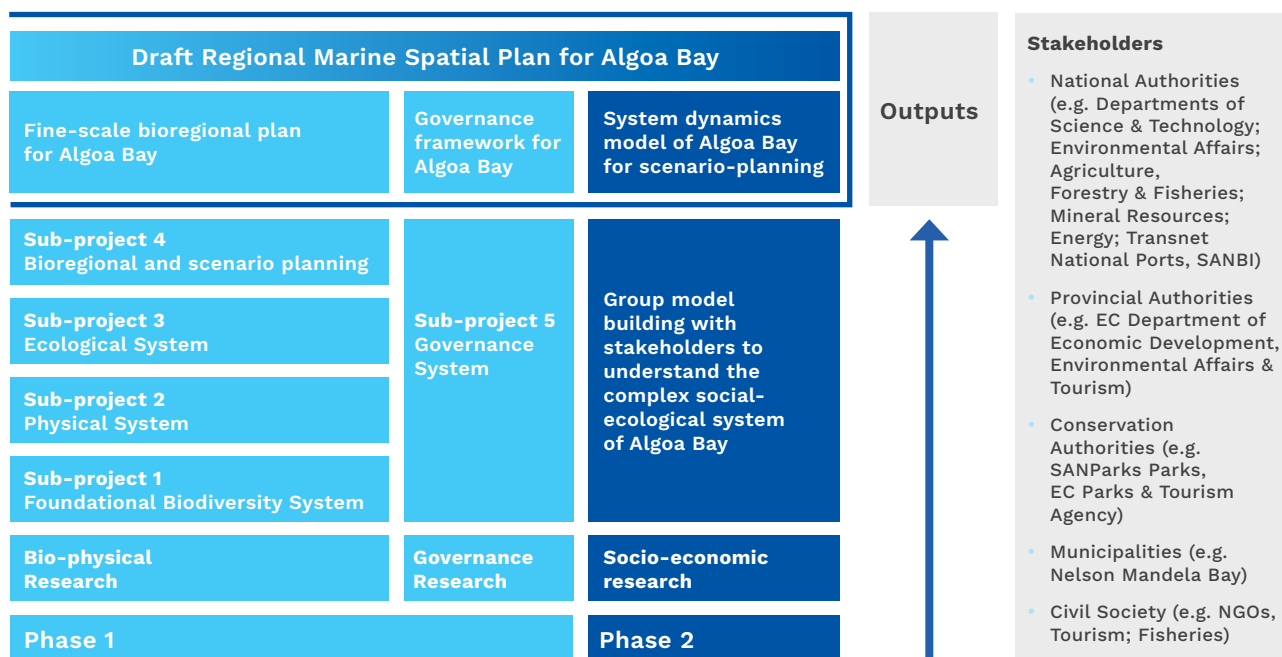
In South Africa, the Nelson Mandela University has been leading the Algoa Bay Marine Spatial Plan Project, a pilot project funded by the National Research Foundation Community of Practice to develop a collaborative, multi-sectoral, ecosystem-based MSP using Algoa Bay as a case study²⁰ (Figure 5).

It is envisioned that the outputs from this project, will guide and inform the South African government in developing its larger bio-geographic marine area plans (Dorrington et al., 2018) contemplated under the Marine Spatial Planning Act (Act No. 16 of 2018). Indigenous engagement was integral to this MSP approach (see Section 3 below).

²⁰ See www.algoabayproject.com/community-of-practice.

Figure 5. Sub-projects, activities and stakeholders involved in the Algoa Bay project. From Dorrington et al. (2018).

Community Of Practice In Marine Science



2.4. Summary

Whether top-down or bottom-up, there is no one size fits all approach to successful holistic planning (Winther et al., 2020; Stephenson et al., 2021). As such, top-down and bottom-up approaches have been combined to retain the strengths of the different approaches, such as the case in the GBRMP and in the United Kingdom (Table 2).

In case studies that lacked a legal framework to implement planning, policies or statements enabled the construction of a holistic marine management regime (Norway, Victoria, Canada). In these cases, sector laws and processes were essential to implement holistic planning. In the absence of a legal basis, management plans allow for a common understanding of the marine environment, agreed principles of use and management and its environmental, social and economic values. Some plans go further and highlight where opportunities for blue industries exist and where conflicts might occur (e.g. Canada).

Embedding planning into a legislative framework can create a more output-driven stable solution (e.g. Norway). However, achieving overall political and community trust and buy-in at all levels has been shown to be more important for successful implementation of plans, especially if funding is required to support the process (Olsen et al., 2014). Further, governance models need to be tailored to the particular characteristics and problems of the planning regions (Winther et al., 2020).

All case studies, a system to communicate was established through the creation of new or existing groups/forums (e.g., advisory groups, expert groups, steering committees, or working groups [e.g., US, Victoria]). Some case studies have created new institutions to coordinate actions and create a common arena for different sectors (e.g., United Kingdom, Belgium, GBRMPA). For example, the GBRMPA convened a summit to identify priority actions with all stakeholders, while Norway has used a discussion group called 'Blue Opportunities' for systematic dialogue between different sectors and users of the ocean economy.

Strong stakeholder-led bottom-up processes can be prone to indecision, as was the case in Canada, where decision by consensus removed the ability to incorporate performance measures into the plan. However, top-down approaches can compromise outcomes. For example, in Norway, which follows a heavy top-down approach, consensus was imposed between sector government institutions when developing regional sea plans, which led to suppression and compromising of values (Olsen et al., 2014).



3. Integration with Indigenous Peoples

Ainsley Leaning

In countries with indigenous populations, holistic integrative approaches to MSP recognise the importance of engaging with traditional owners. Historically, marine planning with traditional owners across the globe has ranged from tokenistic post-planning mechanisms with little decision-making influence to full participatory involvement. This chapter summarises three different planning initiatives that involved traditional owners from the outset.

The first two examples, Algoa Bay, South Africa, and British Columbia, Canada, describe mechanisms used to develop marine plans for a specific area. The third example involves the collaborative development of the Wunambal Gaambera Healthy Country Plan (northern Kimberley region, Western Australia) which covered both land and sea Country.

3.1. Algoa Bay, South Africa

Nelson Mandela University led the Algoa Bay Pilot Project which involved piloting the development of a marine plan for the Algoa Bay area to test the practicalities of applying the country's newly introduced MSP legislation (Rivers et al., 2023).

As part of this project, the university sought to identify and integrate indigenous knowledge into the marine plan. Traditional knowledge of Algoa Bay was identified through arts-based participatory research, ultimately resulting in a photographic exhibition²¹.

Coastal governance authorities were interviewed and attended workshops to understand current challenges and workarounds in coastal and ocean management, and to discuss potential traditional knowledge integration.

After a year of engagements with traditional owners and coastal authorities through the above-mentioned processes, a one day multi-stakeholder workshop was held to build consensus around knowledge integration. This workshop was divided into three consecutive sessions:

- △ **Session 1:** Participants interacted with the photographic exhibition to help them connect to Algoa Bay;
- △ **Session 2:** Participants formed groups and were asked to consider current stakeholder platforms, what is and is not working with regards to stakeholder involvement in coastal management, what is missing in terms of knowledge needs and finally how traditional knowledge can be presented or packaged so it can be adopted in practice by coastal authorities and policy makers;
- △ **Session 3:** A nominal group technique was used to build consensus on policy recommendations and inform future work for integrating traditional knowledge into MSP. Participants were asked to identify ten recommendations: five areas of change (what sort of knowledge is missing from current ocean and marine management) and five recommendations for how to integrate local knowledge and knowledge holders into MSP. These ten recommendations were analysed and condensed into six broad recommendations



Table 3. Pathways to integrate indigenous knowledge and knowledge holders into Algoa Bay MSP. From Rivers et al. (2023).

Knowledge integration pathways	Definition
4.1 Contextual approaches to coastal and ocean management (no one-size-fits-all)	
1. Context-specific responses to coastal governance issues	Governance responses need to be tailored to specific contexts (E.g. historical, political, economic etc.)
2. Fine grain socio-cultural studies carried out	Socio-cultural studies done at local context level (fine-grained studies/data) that shed light on contextualised coastal governance challenges and opportunities
3. Management plans informed by meaningful stakeholder engagement	Management plans for MSP area plans or MPAs need to be informed by meaningful stakeholder engagement processes
4. Knowledge co-creation opportunities	Opportunities for coastal stakeholders to co-develop knowledge and management plans together (E.g. methods like participatory community mapping or local fisherfolk employed to monitor fish in local MPAs). Knowledge co-creation opportunities can lead to greater sense of ownership and stewardship of coast and ocean and can be a gateway into co-management
5. Local community members working in protected areas	Local community members working in protected areas - learning but also drawing on their local knowledge for management (i.e. graduate programs)
6. Dedicated local authorities who understand local coastal community needs	Local authorities or NGO workers living closely in the communities they work in-finger on pulse of dynamics and needs (Local officials as channels of information between national government and local communities)
7. Partnerships with local organisations/institutions	Government can reach out to local NGOs, research institutes or local conservancies who work on the ground on a daily-basis and are connected to local context to obtain knowledge and information (E.g. Cross-disciplinary collaborations, local conservancies, universities)
8. Institutional memory and knowledge	Deep institutional knowledge and memory needs to be documented and shared so it is not lost
9. ILK is spatialised	Even though difficult and problematic, spatilising ILK when possible so it is not lost or forgotten, but protected and encouraged
10. Designating cultural activity use zones	Designating cultural activity use zones through context-specific marine area plans

4.2 Increased transparency and two-way communication

1. Government processes accommodating coastal communities	Government processes and initiatives that intentionally accommodate and include coastal communities in meaningful ocean resources management (E.g. meetings move around to accommodate different communities along the coast)
2. Cultivating engagement based on empathy and compassion	Empathy and compassion should drive and underpin meaningful engagement (E.g. Coastal authorities who enjoy engaging with local communities and are willing to take the time to understand their point of view regarding resource use; NGO workers invested in building meaningful relationships with coastal communities)
3. Fostering trust and partnership building	Cultivating trust and building partnerships are primary pathways for integrating ILK
4. Clear and consistent communication	Communication that is clear and consistent can be a mechanism/pathway to enabling the integration of different knowledge forms (open communication between Indigenous communities and coastal authorities can result in more equitable use of coastal resources and spaces)
5. Face-to-face, focused meetings	Face-to-face, in person meetings with specific foci that produce targeted information, knowledge, action and feedback
6. Using existing engagement platforms/ fora	Existing platforms that enable different stakeholders to come together and co-create knowledge, listen, engage and act together are useful pathways (E.g. stakeholder engagement meetings, MPA forums, workshops, radio programs, local business forum, ward council meetings, police forum meetings, ratepayers associations, Provincial and Municipal Coastal Committees, environmental education activities like beach clean-ups; oil spill contingency plan workshops, Whatsapp groups, Coastal Coordinating Committees; Integrated Development Program (IDP) cluster meetings and virtual platforms to communicate more widely with stakeholders)
7. Community leaders as gateway to ILK holders	Indigenous communities are often labelled as challenging to identify and contact but traditional community leaders such as chiefs and headmen are the first entry point to connect and engage with self-identifying Indigenous communities
8. Opportunities for stakeholders to network	Opportunities that allow different stakeholders to meet each other, make contact and start engaging on their own terms and broker new relationships (E.g. sponsored family or sports day to foster relationships in a relaxed environment)
9. Pressure from local communities to be included in ocean governance process	Pressure from local communities themselves demanding they be included in coastal and marine management processes
10. Authorities with strong stakeholder engagement skills	Coastal authorities who already have strong stakeholder engagement skills and understand the capacity (skills, time, funds etc.) required to engage stakeholders meaningfully are required to truly integrate ILK.

11. Stakeholder engagement training/skills for coastal authorities	Training for coastal authorities in stakeholder engagement skills and processes
4.3 Increase access to relevant and usable information	
1. Interactive and accessible databases	Creating interactive and accessible databases that include social and cultural data
2. Coastal and marine information to be tailored to specific audiences	Coastal and marine information to be tailored to specific language groups and audiences to be understandable and therefore empowering as opposed to alienating
3. Peer-to-peer learning and knowledge sharing	New knowledge and lessons better received from within communities than from outsiders coming in
4. Horizontal and vertical coordination and knowledge- sharing across government departments	Improved coordination across national to local government departments regarding coastal plans/management; departments relying on each other's strengths and knowledge and communicating (collaborations between different municipal departments E.g. architects and South African Heritage Resources Agency); local government collaborating with governmental agencies that work closely and meaningfully with communities E.g. Mandela Bay Development Agency
5. Reliable bridging actors	Local councillors that represent their constituents' needs fairly and relay important information clearly, consistently and correctly (from local communities to local government and vice versa)
4.4 Reviewing and amending relevant MSP legislation towards a stronger connection between MSP and Indigenous knowledge legislation	
1. Recognition of ILKS in MSP legislation	The inclusion of Indigenous and local knowledge must be legally mandated in (E.g. legislation that makes provision for traditional and cultural activities)
2. Consideration of ILKS and representation of ILK holders on National MSP Working Group	Consideration of ILKS and Representation from the National Indigenous Knowledge Systems Office (NIKSO) on the National Working Group on MSP
4.5 Amending legislation pertaining to access to coastal and marine areas	
1. Increased access to coastal and marine areas	Indigenous and local knowledge holders seek increased access to coastal areas in order to freely undertake cultural practices

Recommendations included ensuring each plan is context specific, and accounts for the fact that a plan for a particular area may span a number of indigenous peoples with differing views, culture, and heritage. Adequate resources (e.g. funds, time, capacity, skills and knowledge) are therefore required to develop marine area plans that can identify and account for all these differences.



3.2. British Columbia, Canada – North Pacific Marine Coast Plan

In Canada, seventeen First Nations communities partnered with the British Columbia government to establish the Marine Plan Partnership (MaPP) which produced the North Pacific Coast regional plan (Figure 6). Planning was scaled up from First Nations territories to sub-regional to regional (Table 4). Territorial marine use plans were developed by the respective First Nations communities and focussed solely on First Nation goals and aspirations.

This was achieved through a First Nation's Community Co-ordinator working with a committee of First Nations community members including food harvesters, commercial fishers, youths, Elders and Hereditary leaders. The Community Coordinator then collaborated with aggregate First Nations organisation working at the sub-regional and regional level (Figure 6) to harmonise and integrate territorial plans into the wider regional plan with the provincial government (Diggon et al., 2021).

Governance at the sub-regional and regional level involved committees or teams co-led by representatives from both the province and associated First Nation(s) aggregate.

The roles of each committee were described in terms of reference, along with the process for arriving at decisions and resolving disputes. Formal agreements solidifying the co-governance structures ensured the proper approval structures were in place when the plans were completed.

A number of tools and initiatives were used by the territorial committees to engage and collect input from First Nations people (Table 5).

Figure 6. First Nations sub-regions.

From: MaPP Implementation Strategy 2015-2020.
http://mappocean.org/wp-content/uploads/2016/12/MaPP_Implementation_Strategy_web_20161230.pdf

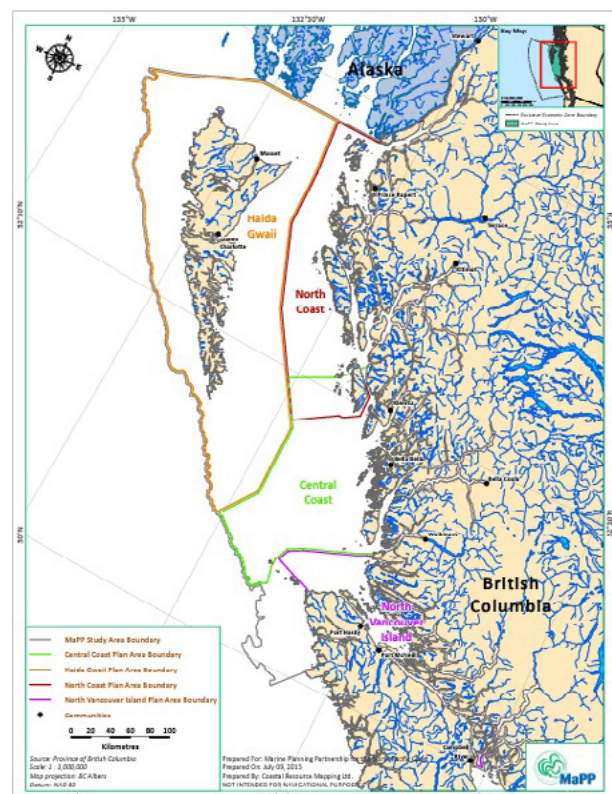




Table 4. Traditional owner organisations and aggregates involved in planning. From Diggon et al. (2023).

Sub-region	First Nations	Sub-regional Aggregate/ Organization	Regional Aggregate Organization
Haida Gwaii	Old Massett Village Council Skidegate Band Council	Council of the Haida Nation	Coastal First Nations - Great Bear Initiative provided coordination, technical and secretariat functions
North Coast	Gitga'at Nation Gitxaala Nation Haisla Nation Kitselas Nation Kitsumkalum Nation Metlakatla First Nation	North Coast Skeena First Nations Stewardship Society	
Central Coast	Heiltsuk Nation Kitasoo/Xai'Xais Nation Nuxalk Nation Wuikinuxv Nation	Nanwakolas Council	
Northern Vancouver Island	Mamalilikulla Qwe'Qwa Sot'Em Nation Gwasala Naxwaxdax'da Nation Tlowitsis Nation Da'naxda'xw Awaetlatla Nation We Wai Kum Nation Kwiakah Nation K'ómoks Nation	NOPTA	

Table 5. Tools and initiatives for engaging First Nations people for the North Pacific region of Canada. Sourced from Diggon et al. (2021).

Tool	Description
Traditional ecological knowledge study (TEK)	This required First Nations committee to synthesise existing tradition use and ecological knowledge. Mapping interviews were held with community knowledge holders to document marine ecological and resource use. This identified ecological and cultural significant areas and areas with potential for conservation and Nation level economic development. Spatial analysis was then used to determine where high value areas conflicted with other uses.
Economic development survey and visioning	A community socio-economic profile was created to support each Nation's visioning of sustainable economic development in their territory and the identification of objectives and strategies for economic well-being. This included developing an inventory of local economic development resources and services, and conducting economic visioning workshops to support the creation of an economic development vision for each Nation.
Community harvest needs study	A project was designed to quantify the biomass of marine species required to meet community needs based on a preferred community diet. The methodology also anticipated future needs for food, trade and feasting purposes. The study included a household survey, workshops, interviews, and modelling of dietary requirements and future needs. The resulting data were combined with estimates of biomass from the TEK study and independent fisheries data to identify the spatial allocation required to produce the requisite harvests for food security and cultural practice.
Marine zoning	This involved formulating a suite of zones that would maintain or enhance important habitats, protect cultural sites and natural resources while ensuring Nation access to them, and to create a sustainable economy benefiting local people. The TEK data, and other human use data (shipping routes and commercial fisheries data) were analysed and discussed at community meetings. Many of the Nations used a matrix which outlined compatible marine activities. This information identified how many and which zones were needed to reduce conflict and realize the broader planning goals.

3.3. Wunambal Gaambera Country (Land and Sea), Western Australia

In 2010, the Wunambal Gaambera people published their Health Country Plan (Wunambal Gaambera Aboriginal Corporation, 2010) for managing Wunambal Gaambera Country (land and sea), which is an Indigenous Protected Area (IPA) under the Australian Government’s IPA program²² (Figure 7).

Plan development was led by the Wunambal Gaambera people in collaboration with Bush Heritage Australia and the Kimberley Land Council using a “Western” conservation action planning approach adapted to reflect Wunambal Gaambera’s heritage, culture and community needs (Figure 7).

Figure 7. Map of Gaambera Country. Sourced from: Wunambal Gaambera Healthy Country Plan. Healthy Country Plan landscape flat (wunambalgaambera.org.au)

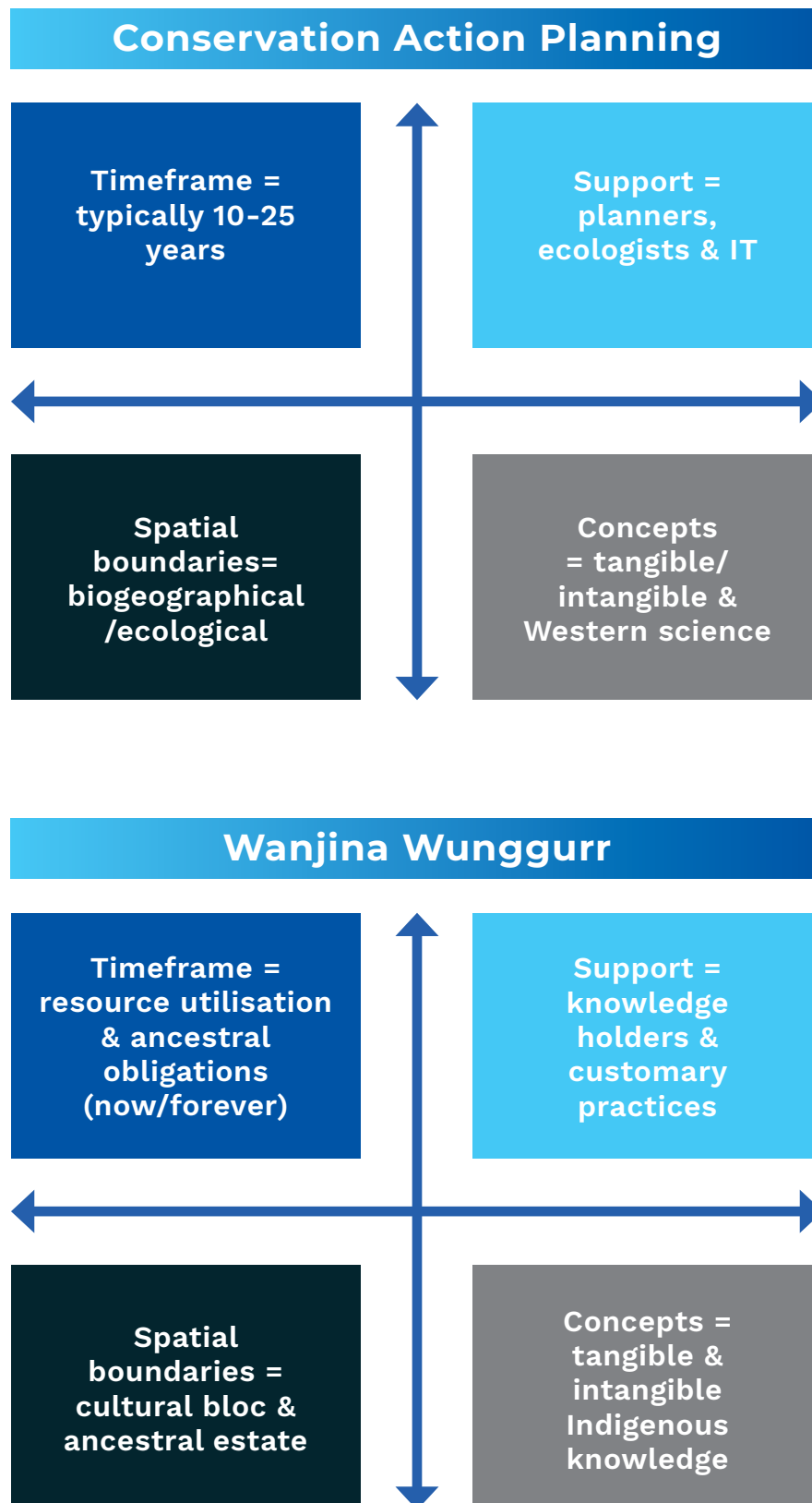


Adaptations to the plan included (Moorcroft et al., 2012):

- △ **Planning on country** – large workshops were held with representatives from all family groups on Wunambal Gaambera Country. A smaller workshop was then held to develop objectives, strategies and actions but this was not on Wunambal Gaambera Country. The final planning workshop was a ‘travelling road show’ with some held at locations within Wunambal Gaambera Country, while others were held in nearby towns. Holding some meetings on Wunambal Gaambera Country gave participants the chance to visit and spend time connecting with Country. These workshops also helped participants relate seemingly abstract non-indigenous planning concepts to their indigenous knowledge.
- △ **Using local governance structures** – this involved breaking into men’s and women’s groups, referring particular issues to senior people.
- △ **Adopting flexible timeframes and providing feedback** – this included summing up at the conclusion of each workshop, revisiting discussions and outcomes from previous workshops, and preparing regular pictorial reports for participants to read between workshops.
- △ **Plain language glossary of terms** – this was used to explain ecological / scientific based terms.
- △ **Incorporating indigenous values in targets, threats and indicators** - this meant protecting the ‘really important things about Country’. For example, the plan identified 11 threats and 10 targets to Country. Threats included not being secure on Country, visitors not being respectful, and commercial fishing. Targets included fish and other seafoods, cultural places on islands, and marine turtles and dugongs.

²² See <https://www.dcceew.gov.au/environment/land/indigenous-protected-areas>.

Figure 8. “Western” Conservation action planning and Wanjina Wunggurr adapted planning. From Moorcroft et al. (2012).



4. The Context for Spatial Planning in Australia's Marine Estate

The last chapter looks at the Australia's marine institutional framework and identifies opportunities for spatial planning to be considered across Australia's marine estate.

4.1. Australia's historical marine institutional framework

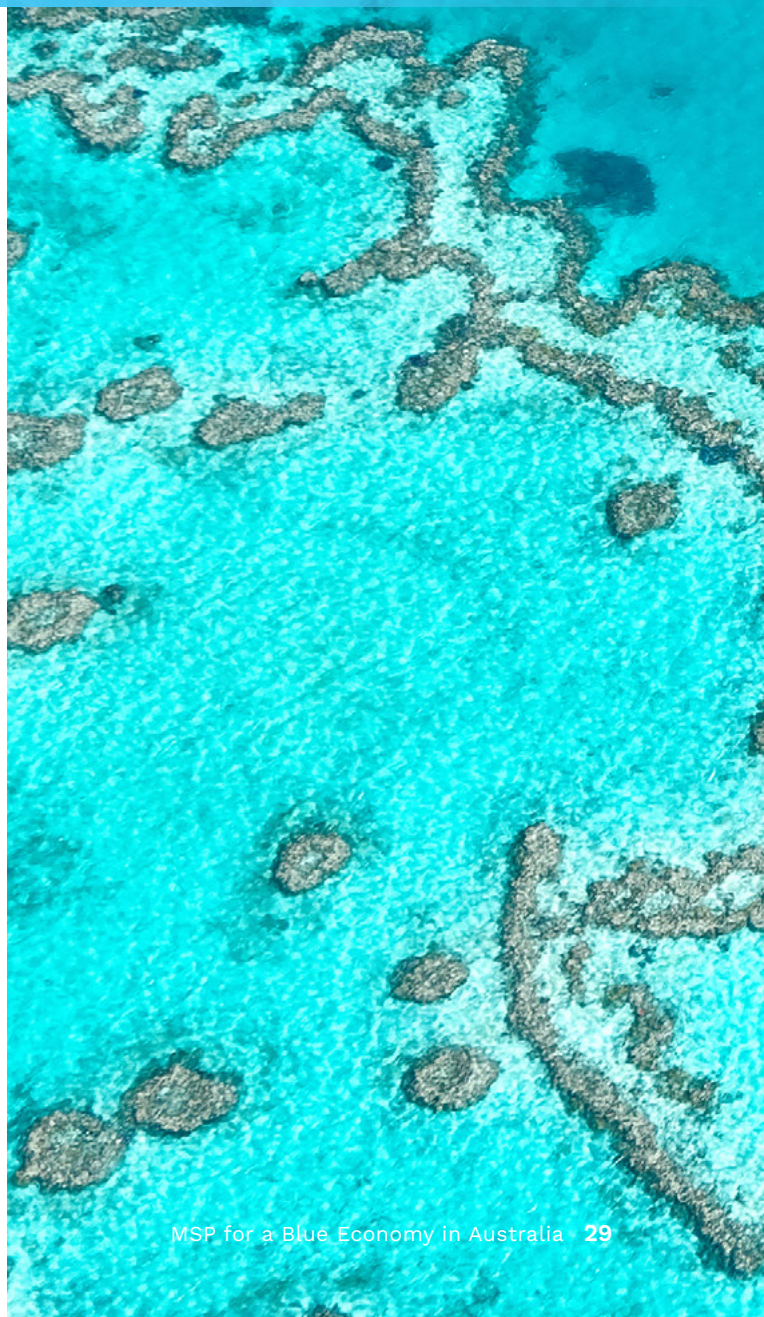
Joanna Vince and Marcus Haward

Australia has a lengthy experience in marine management. State government legislative responsibilities, and related administrative arrangements and processes, date back to the granting of responsible government to the colonies from the mid-1800s.

The states retained responsibility overfishing in 1901 after Federation, with the Commonwealth having limited direct interest. The limits of jurisdiction over fisheries (and other matters) were seen to be three nautical miles – the conventional 'cannon shot' limit of a states' coastal sovereignty in the late nineteenth century.

As the Commonwealth increased its interests in and responsibilities ocean activities from the 1930s with the Beaches, Fishing Grounds and Sea Routes Protection Act 1932 and the Fisheries Act 1952, (entered into force in 1955) the issues of offshore jurisdiction remained unresolved.

Development of offshore oil and gas exploration and later production in the early 1960 led to cooperative arrangements were anchored by the Petroleum Submerged Lands Acts 1967 as "mirror" or identical commonwealth and state legislation.



Disputes over the assertion of jurisdictional primacy offshore by the Commonwealth in the late 1960s and early 1970s led to The Seas and Submerged Lands case 1975, in the High Court which upheld Commonwealth jurisdiction from low water mark. Resolution of this jurisdictional conflict did not address ongoing political issues. The negotiation of the OCS, a curiously named political accommodation concluded in 1979 and centred on an agreement to return offshore jurisdiction to the status quo prior to the Seas and Submerged Lands case, i.e. jurisdiction offshore giving the states responsibilities for three nautical miles and the Commonwealth for this boundary to edge of national jurisdiction. This was accomplished by developing “complementary” commonwealth and state legislation – the Coastal Waters (State Powers) and Coastal Waters (State Title) Acts 1980.

The OCS’s legislative design was such that Commonwealth and states Coastal Waters (State Powers/ Titles legislation) complemented each other and established an areas of state jurisdiction three nautical mile offshore from a baseline – in most cases the low water mark, but in some areas closing lines across bays moved the baseline many miles offshore, for example, Spencer Gulf, Gulf St Vincent and Kangaroo Island in South Australia, and in Storm Bay in south east Tasmania.

The intricate legislative design included the granting of state title to the seabed below state water effectively ensuring that any attempt to revoke of the OCS by the Commonwealth would require payment to the state(s) under section 51 xxxvi of the Australian Constitution dealing with acquisition of state territory by the Commonwealth on ‘just terms.

The future for MSP in Australia needs to work within the OCS to provide a “whole of EEZ” focus.

4.2. Marine Spatial Planning in Australia

Joanna Vince and Marcus Haward

The Great Barrier Reef Marine Park (GBRMP) was one of the first examples of effective MSP in Australia, especially due to its pioneering zoning and sustainable management arrangements (McAteer et al. 2022). However, MSP has evolved in the Australian context as a policy and management tool, going beyond a zoning tool for MPAs. Australia’s Oceans Policy (AOP) which was released in 1998 aimed to achieve ‘full’ integration across sectors dealing with oceans issues; vertical jurisdictional integration between state, territory and Commonwealth governments; and horizontal, ‘whole of government’ processes across Commonwealth departments.

Central to this aim was an ecosystem-based management approach to MSP through regional marine planning. After 6 years of implementation, only one regional marine plan was completed in the Southeast of Australia (Haward and Vince, 2009; Smith et al., 2017; Vince et al., 2015).

A 5-year review of the policy’s implementation process, and a change in Ministers, resulted in less focus on integration and RMPs. The lack of an Oceans Act underpinning the AOP was the one of the most contentious aspects of the policy’s implementation. The Offshore Constitutional Settlement (OCS) remained the legislative framework for the policy and reinforced a sectoral approach which made integrated efforts difficult to manage (Vince et al., 2015; Vince, 2018; Smith et al., 2017).

The MSP process was later given a legislative anchor through the Environmental Protection Biodiversity Conservation Act (EPBC Act) (1999) through the creation of new Marine Bioregional Plans. However, the MSP focus was based more on environmental protection rather than a fully integrated approach (Smith et al. 2017; Vince 2018). Management Plans for the Marine Parks within each MBP still exist and are functioning, although with limited purpose under the EPBC Act. It is also important to note that aim for a holistic policy approach was lost when states were excluded and the AOP became a Commonwealth policy. By excluding state jurisdiction (the low water point to 3 nautical miles offshore) and the coastal zone the MSP process was unable to effectively integrate many of the important environmental, social and cultural aspects into MSP.

The MBPs did not utilise MSP in its fullest and their narrow focus on marine protection resulted in the AOPs demise. However, since the AOP there has been some progress with MSP in Australia but on a smaller scale. The Victorian state Marine and Coastal Policy includes a Marine Spatial Planning Framework to guide the planning and management of the Policy and Marine and Coastal Act (2018). The MSP framework takes an ecosystem-based approach to manage the marine ecosystem and its multiple uses (Victorian Government, 2022). Coastal impacts, climate change and population growth are incorporated into the MSP framework, and these are important issues that the AOP was unable to address.

4.3. Consideration of legislative frameworks

Anna Lewis

There are existing legislative frameworks to consider in a future MSP process that relate to sector-specific frameworks and environmental approvals.

4.3.1. Current sector-specific frameworks

Many of the current and emerging industries²³ in Commonwealth waters have legislative and regulatory frameworks governing their licencing and permitting processes.

For example, fisheries policy is drafted by DAFF, and regulated by AFMA, shipping policy is drafted by DITRDC and regulated by AMSA, and the newly created offshore electricity policy is drafted by DISR and regulated by NOPSEMA. These processes are essentially sector-based. There is no national overarching, planning legislation that achieves integration between the various sectors in Commonwealth waters.

Current planning frameworks and processes have been developed at different times (different decades), with varying timeframes for planning, varying levels of consultation and varying focuses for consultation. As such, the mechanism by which sectors must give regard to other users when applying for approval on use and the extent of consultation required, is varied. For example, in the case of offshore oil and gas, requirement for consultation and consideration of other users are provided within the Act and regulations, while there are no or limited specific consultation requirements for tourism or shipping, respectively.

Before approval for use can be granted for a given sector, applications are often subjected to a multi-stage licencing and permitting process:

the licencing stage or overarching titling stage²⁴, and an activity-specific permitting stage or authorisation stage²⁵.

Each licencing and permitting stage require, to varying degrees, decision makers to consider the rights and practices of other marine users, or the impacts that other marine users may have on the matter under decision. Consultation to understand those rights and practices and the impacts on, and by the sector in question, is undertaken.

Some sectors currently do not have legislation that allow them to operate in Commonwealth waters. For example, offshore aquaculture in Commonwealth waters is limited to research activities only (e.g., Tasmania's Living Marine Resources Management Amendment (Aquaculture Research) Bill 2021).

4.3.2. Current cross-sector frameworks

There are a range of overarching, issues-focussed legislation that encompass all sectors to ensure that they consider the impacts of their activities on the relevant issue (DISER, 2022).

These include environmental protection and biodiversity conservation (EPBC Act), Sea dumping (EP(SD) Act 198141.) cultural and Aboriginal heritage (UCH Act 20183 ATSIHP Act 198440. and EPBC Act 1999), and Native Title (Native Title Act 1993).

²³ Subordinate legislation pertaining to offshore energy development is yet to be drafted (e.g., Offshore Electricity Infrastructure Act 2021).

²⁴ The licencing stage or overarching titling stage is where a broad area required for the activity is defined and expectations are set in relation to the need to conduct the activity in that area.

²⁵ An activity-specific permitting stage or authorisation stage is where the specific activity is defined, and expectations are set in relation to how to conduct the activity and the detailed risks and/or impacts of the specific activity are considered.

It is important to understand the current legislative framework so that stakeholders have common ground by which to identify opportunities and issues for a holistic, integrated planning approach to ocean management. A holistic planning framework is not intended to replace single sector planning processes. Rather, it aims to provide a pathway to support high-level government cooperation, coordination, and integration between single sector planning processes.

4.4.1. Future opportunities for MSP in Australia

Joanna Vince and Marcus Haward

Australia’s commitment to manage its oceans and coastal areas has seen governments develop a range of national and state actions, support regional and international commitments, and take active roles in key bodies such as the United Nations Open-ended Informal Consultative Process on Oceans and the Law of the Sea (UNICPOLOS), The UN Decade for Oceans Science for Sustainable Development, and well as taking part in negotiations on an Agreement under the United Nations Convention on the Law of the Sea on the Conservation and Sustainable Use of Marine Biological Diversity of Areas Beyond National Jurisdiction.

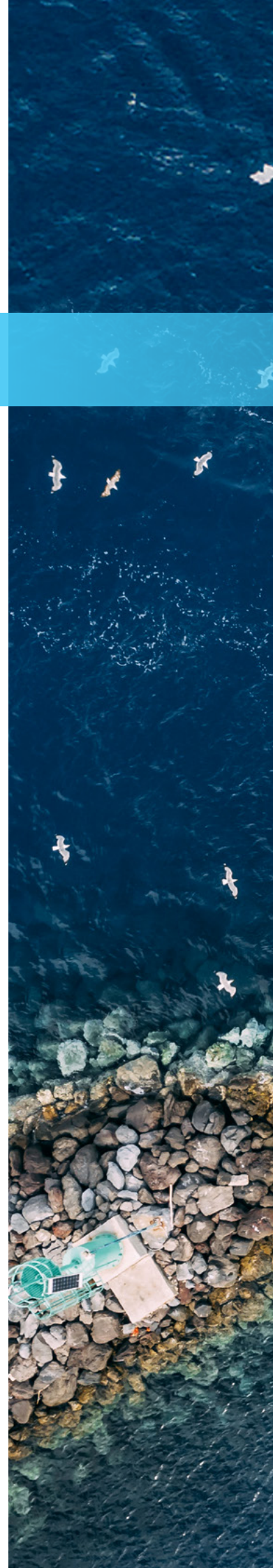
A key driver for Australia’s on-going work in marine spatial planning will be participation in the High Level Panel for a Sustainable Ocean Economy, a 14 country initiative led by Norway established in 2018. Panel membership is made up of the Heads of each of the 14 cooperating governments.

The Oceans Panel members have committed to “a goal to achieve 100% sustainable ocean management of areas within national jurisdiction by 2025, guided by Sustainable Ocean Plans, and to support a global target to protect 30% of the ocean by 2030 – which a growing body of science indicates will drive ocean replenishment”.

The heads of governments also “commit to bold transformations towards a sustainable ocean economy where environmental protection and conservation, and economic production and prosperity, go hand in hand” (High Level Panel for a Sustainable Ocean Economy, 2020).

Australia’s maritime and coastal domain is more than twice the area of its territorial land mass, the third largest such domain in the world with significant diversity from the tropics to the sub-Antarctic and Antarctic. Australia’s maritime domain a range of bio-geographical regions; environmentally significant areas such as the GBR and sub-Antarctic world heritage areas, but also supporting a range of resource uses and uses.

Australia’s oceans domain also borders with neighbouring states, with oceans policy and management actions linking to a range of strategic issues and interests. The “whole of EEZ” focus to sustainable oceans management, together with the principles elaborated in the High Level Transformations commitments provides a future direction for Marine Spatial Planning in Australia.



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