THE RAMSAR CONVENTION ON WETLANDS

54th Meeting of the Standing Committee

Gland, Switzerland, 23–27 April 2018

# SC54-Com.16 (21.13)

**Draft resolution on promoting the conservation and wise-use of intertidal wetlands and ecologically-associated habitats**

*Submitted by the Philippines*

**Action requested:**

• The Standing Committee is invited to review the attached Draft Resolution for consideration by the 13th meeting of the Conference of the Parties.

**Draft Resolution XIII.xx**

## Promoting the conservation and wise-use of intertidal wetlands and ecologically-associated habitats

### Mandate

1. RECALLING that the Conference of Parties has repeatedly addressed, *inter alia* through Resolutions listed in Annex 1, the pressing need to better promote the conservation and wiseuse of coastal wetlands, in particular intertidal wetlands[[1]](#footnote-1) which are areas of special importance yet highly vulnerable;

1. NOTING that Target 6 of Ramsar’s Strategic Plan 2016-21 seeks a significant increase in the areal extent of the Ramsar Site network in particular the inclusion of under-represented types of wetlands; and NOTING ALSO that both shellfish reefs and seagrass beds are under-represented wetlands;

1. AWARE that [all but one coastal country is] Parties[y] to the Convention on Biological Diversity (CBD) [and thus] have adopted the Strategic Plan for Biodiversity 2011–2020 and the Aichi Biodiversity Targets, of which Targets 5, 6, 11, 12, 14 and 15 are particularly relevant;

1. RECALLING United Nations Sustainable Development Goals (SDGs) of which Goals 2, 13, 14 and 15 are especially relevant;

1. DEEPLY CONCERNED that if urgent action is not taken to address the loss and degradation of intertidal wetlands and ecologically associated habitats, the ability to meet the Aichi

Biodiversity Targets and [SDGs will] [may] [be seriously impaired] [SDGs will be seriously affected] and species extinctions will be likely;

1. [NOTING] [RECALLING that] the Convention on Migratory Species UNEP/CMS/Resolution 12.25 *Promoting conservation of critical inter-tidal and other coastal habitats for migratory species* [which highlights the importance of intertidal and other coastal habitats for 64 species listed on Appendix I of that Convention; called on Parties, as a matter of urgency, to enhance significantly their efforts to conserve and promote the sustainable use of intertidal wetlands and other coastal habitats of importance for migratory species worldwide; and called also for synergistic and collaborative actions from coastal countries, multi-lateral environmental agreements (MEAs) and other relevant actors to work together to this end];

1. ACKNOWLEDGING [AND WELCOMING ALSO] the United Nations Framework Convention on Climate Change (UNFCCC) Paris Agreement, [and its publicly available Nationally Determined Contributions (NDC) to achieve the long-term goals of the Agreement, many of which include nature-based solutions such as protection of coastal wetlands for adaption and/or mitigation (“blue carbon”)] [of which the reference to the “importance of ensuring the integrity of all ecosystems, including oceans, and the protection of biodiversity” in the Preamble and Article 5.1 are particularly relevant, as many wetlands are both significant sinks and reservoirs of carbon];

1. FURTHER NOTING [that] *IUCN WCC-2016-Res-026* [“REQUESTS the Director General, Commissions and Members to consider, in conjunction with the Convention on the Conservation of Migratory Species and the Ramsar Convention on Wetlands, as appropriate, to develop national/regional management plans for migratory birds within ‘working coastal wetlands’ (i.e. those used for shellfisheries, aquaculture, fish ponds and salt pans) to benefit migratory bird populations and their habitats, which support numerous other species”];

### Importance

1. RECOGNISING that inter-tidal and other coastal wetlands and ecologically associated habitats are of very significant socio-economically and culturally, providing multiple and important ecosystem services [(which in the Yellow Sea is worth an estimated US$30 billion per year[[2]](#footnote-2)], benefitting not only to local dependent communities but a wider society, in mitigating effects of climate change through sequestration of carbon, and contributing also to adaptation by protecting against storm surges and sea level rise; [and their conservation and wise-use directly contributes to multiple SDGs as indicated in Annex 2];

1. YET NOTING that despite such international conservation attention and recognition, and national conservation programmes, intertidal habitats in most parts of the world remain subject to extreme pressures including from [land-claim for] development, pollution, and inappropriate and unsustainable uses, which removes or degrades the capacity of these habitats not only to support migratory and other species but also to maintain and sustain human communities dependent on the multiple ecosystem services such as their capacity for carbon sequestration (‘blue carbon’) and disaster risk reduction;

1. CONSCIOUS that the conservation, wise-use and restoration of intertidal and associated coastal wetlands poses particular practical problems, including the fact that they can fall within the jurisdiction of multiple national and local government agencies; that many straddle either international or internal national borders; their location at the terminus of catchments which can result in significant pollution inputs as well as significant reduction and disruption to [water and] sediment flows essential for ecosystem functioning due to water regulation structures such as upstream damming and flood defences, riverine inputs of sediment to deltas and other soft coastlines being of especially critical importance[, the dredging to deepen channels for navigation,[;]] the encroachment of invasive alien species such as shellfish, mangrove and Cordgrass (*Spartina*) species, and significant human populations resulting in intense development pressures derived from both land and sea, BUT ALSO NOTING good examples such as in the international Wadden Sea where such impediments have been addressed successfully;

1. NOTING the inherent ecological connectivity of coastal areas at various scales, notably through their support of migratory species such as waterbirds, turtles sea cows, dolphins and porpoises, and the role as source spawning areas for coastal fish stocks; AND ACKNOWLEDGING CMS Resolution [12.7] [12.XX] on ecological connectivity in this respect; [NOTING also the role of intertidal floodprints to central sediment dynamics in estuaries;]

### Losses and pressures

1. RECALLING that in 1999, COP 7 called on Parties and others in Resolution VII.21, to document and report on past losses of inter-tidal wetlands and to inventory those intertidal wetlands which remain and their conservation status, and NOTING that since then a wide range of published information has documented significant losses of extent around the world, [including 65% on the coasts of the Yellow Sea[[3]](#footnote-3)], and the [Arabian Coast], as well as losses of ecological functionality and deterioration in conservation status as for example, shown in the past and current losses of shellfish reefs and associated fisheries [in some cases over periods of centuries];

1. AWARE that projected sea-level rises are anticipated to result in significant further losses of intertidal wetlands especially where there is lack of [environmentally appropriate adaptation];

1. AWARE ALSO that the ecological character of intertidal wetlands can be influenced by loss of ecological linkages to surrounding areas, for example the loss of adjacent high tide roost sites which can significantly limit waterbird use of associated intertidal habitats;

### Solutions

1. RECALLING that Resolution VII.21 [requested Parties and others to formulate “alternative development strategies for remaining intertidal areas that assist in maintaining their ecological character”]; and CONSIDERING the need remains for guidance and models of good practise and management that would assist Parties in this respect;

1. FURTHER RECALLING that Recommendation 6.8 on *Strategic planning in coastal zones* [called for sound decision-making on the conservation and wise use of coastal wetlands and other key environmental components];

1. WELCOMING the steps taken by China, Republic of Korea and the Democratic Republic of Korea, since the adoption of IUCN WCC-2012-Res-028-EN *Conservation of the East Asian-Australasian Flyway and its threatened waterbirds, with particular reference to the Yellow Sea*, to conserve the coastal wetlands of the Yellow Sea, including through follow up of outcomes of national workshops held in China in 2014, Republic of Korea in 2016, Democratic Republic of Korea in 2017, with transboundary workshops in 2016 and 2017, and WELCOMING the steps of the Yellow Sea nations towards World Heritage Site nomination of their coastal wetlands, including working via a transboundary Yellow Sea Task Force;

1. [FURTHER WELCOMING the UNFCCC Paris Agreement ratification in November 2016 and its publicly available Nationally Determined Contributions (NDC) to achieve the long-term goals of the Agreement, many of which include nature-based solutions such as protection of coastal wetlands for adaptation and/or mitigation (“blue carbon”)];

1. NOTING the vital need to conserve and to manage sustainably ‘working coastal wetlands[[4]](#footnote-4)‘ - those inter-tidal and ecologically associated coastal wetlands the sustainable use of which provides crucial socio-economic support to local communities - and that these managed areas can be of integral importance to the maintenance of the ecological character of intertidal wetland ecosystems, especially for waterbirds and other wetland biodiversity; [and STRESSING the importance of working in the framework of integrated water basin;]

1. CONSCIOUS that actions and investments [of economic actors and businesses, including dredging, ports, shipping and other transportation, insurance, and oil, gas and other energy sectors], have the scope both for very damaging impacts on inter-tidal wetlands but [may] also [– if decisions are appropriately targeted – to] positively contribute to their conservation and wiseuse, and that pro-active positive engagement [with these interest groups] is critical at all scales;

### Site designation

1. RECALLING that Resolution VII.21 COP 7 [urged Contracting Parties “to identify and designate as Wetlands of International Importance a greater number and area of intertidal wetlands, especially tidal flats, giving priority to those sites which are important to indigenous people and local communities, and those holding globally threatened wetland species”], BUT NOTING that whilst many Ramsar Sites contain inter-tidal wetlands, global coverage is both highly incomplete and discontinuous with relatively few [such] Ramsar Sites [such as those in Africa, Asia, South America and Oceania, and the East Asian - Australasian Flyway (EAAF) where less than 5% of intertidal areas of most countries are Ramsar Sites or other protected areas];

1. [AWARE that although Resolution VII.21 called on Parties to designate remaining inter-tidal wetlands of international importance, the Conference of the Parties has no procedure to track and report on the progressive development of the Ramsar List with respect to specific wetland types, for example such as saltmarshes; and CONSCIOUS that routinely including such wetlandspecific analyses in the triennial *State of the Worlds Wetlands and their Services to people* [(*SOWWS*)] [Global Wetlands Outlook (GWO)] would provide the COP with a high-level overview of relevant progress];

1. NOTING the recent positive experiences of both transboundary and linked World Heritage Site

(WHS) designation for intertidal wetlands, notably the Wadden Sea Flyway Initiative linking the Wadden Sea WHS (The Netherlands, Germany and Denmark), and Banc d’Arguin WHS (Mauritania) and supporting the nomination of the Bijagos (Guinea-Bissau), AND AWARE of the potential for similar initiatives for designation of other major coastal wetlands in the Yellow Sea (People’s Republic of China and Republic of Korea);

### Restoration

1. RECALLING that Resolution XII.13 on *wetlands and disaster risk reduction*, referring also to CBD Decision XII/19 on ecosystem conservation and restoration, [“welcome[d] initiatives that support the conservation and restoration of coastal wetlands, including options to build a

‘Caring for Coasts’ initiative as part of a global movement to restore coastal wetlands, and encourage[d] Contracting Parties to consider engaging in the development and implementation of the proposed initiative”];

1. CONSIDERING there remains a need for guidance on effective methods of restoration that fully re-establishes ecological functions of degraded or lost intertidal and other coastal wetlands;

### Engagement with other initiatives and conservation frameworks

1. NOTING the [interest] [concern] of many other MEAs and international conservation initiatives, [including those listed in Annex 3], regarding the conservation and wise-use of inter-tidal wetlands, and AWARE of the [scope and] benefits of closer collaboration on this cross-cutting issue of mutual [interest] [concern] within multiple [entities’] mandates;

1. WELCOMING the Arctic Council’s Arctic Migratory Bird Initiative (AMBI), established in 2015, [to] which [Ramsar can make contribution through its Parties’ conservation of intertidal wetlands, which are vital to] [prioritises support from Arctic Council member and observer countries for intertidal wetland conservation for key] arctic breeding waterbirds along the world’s flyways;

1. [NOTING the conservation work by the partners of the Western Hemisphere Shorebird Reserve Network (WHRSN) to conserve critical intertidal habitats for shorebirds throughout the Americas;]
2. [ACKNOWLEDGING the development of the Atlantic Flyway Shorebird Initiative Business Plan, and the Pacific Americas Shorebird Conservation Strategy which prioritize strategies and actions for the conservation of key intertidal habitats in the West Atlantic and East Pacific flyways;]

### Profile and changing attitudes to coastal wetlands (public engagement)

[29.] [31.] NOTING that there can be very low levels of public appreciation of the values and services provided by inter-tidal and associated wetlands, YET AWARE of many successful initiatives that have engaged civil society, and have built effective and strong support from civil society for the conservation, restoration and wise-use of these habitats;

THE CONFERENCE OF THE CONTRACTING PARTIES

### Coordination with other initiatives and conservation frameworks

1. [REQUESTS the Secretariat to explore actively with other relevant multilateral environmental agreements[[5]](#footnote-5), funding permitting, the possibility to set up a global ‘Coastal Forum’, to facilitate the protection, management and restoration of these ecosystems by raising the profile of intertidal wetland and associated coastal habitats conservation and wise-use within relevant programmes of work, sharing experience and knowledge on solutions related to the conservation and management of these ecosystems, and encouraging stakeholders to support such an initiative;]

1. [ENCOURAGES UNFCCC Parties to consider the inclusion of their coastal ecosystems, including relevant Ramsar sites, in their Nationally Determined Contributions for climate mitigation as well as promoting their role within ecosystem-based adaptation;]

### Site designation

1. URGES Contracting Parties, in [line] [support of] [with] Target 6 of Ramsar’s Strategic Plan 2016-2024, to designate [urgently remaining] inter-tidal wetlands of international importance, [as appropriate] especially but not exclusively, in coastal regions suffering high on-going rates of inter-tidal wetland loss, notably in Asia paying particular attention to those qualifying sites that are part of critical site networks of migratory species, and INVITES Contracting Parties that are range states to [the] East

Asian - Australasian Flyway Partnership to designate critically important coastal sites for migratory waterbirds to the EAAF Site Network;

1. [REQUESTS the Secretariat and STRP to summarise the extent of new inter-tidal wetland Ramsar Site designations for succeeding COPs as far as possible placing this in historical contexts, and to routinely report this information in [*SOWWS*] [GWO];]

1. [INVITES] [URGES] [ENCOURAGE] Contracting Parties with appropriate[ly qualifying] intertidal sites to consider them for nomination as World Heritage Sites as well as Ramsar Sites], including as serial transboundary sites as appropriate, [as a means to] [and thus for waterbirds and other migratory species] potentially form[ing] ecologically connected site networks with other key sites, [building on the approach of the Wadden Sea Flyway Initiative; coastal sites in each flyway with the highest ecosystem service value, including importance for supporting migratory waterbirds, protected via World Heritage and/or the Ramsar Convention Global (including exchange of experience between sites)] [protected through Ramsar Convention];

1. [36.] [ENCOURAGES Contracting Parties to [seek] [ensure] that intertidal Ramsar Site boundaries include the entire ecosystem of importance to migratory waterbirds and other dependent species, including inland roost and feeding sites; and [URGES] [INVITES] Parties to review and extend boundaries of relevant Sites to this end as appropriate];

### Management

36. [37.] [REQUESTS the [Scientific Council] [STRP], funding permitting, to seek input from the scientific subsidiary bodies of other multi-lateral environment agreements, to establish a multi-stakeholder Working Group, under the proposed Coastal Forum, to develop global guidance on the conservation, wise use and management of sustainable ‘Working Coastal Habitats’, in particular elaborating strategies and models for economic development, that maintain the ecological character and functionality of such habitats to the benefit of local communities and migratory species, and to submit this draft guidance for consideration at Ramsar COP 14;]

### Other solutions

1. [38.] [ENCOURAGES Parties to recognize fully the international importance of their intertidal and associated coastal wetlands for biodiversity and ecosystem services, halting further approval of intertidal mudflat conversion [(reclamation)] at priority sites for biodiversity, irrespective of protection status, until a full assessment of the economics of ecological services and identification of biodiversity needs can be completed] [until a full assessment is completed];

1. [39.] URGES Parties to [ensure they follow, to the greatest extent practicable,] [fully implement] Ramsar’s Guidelines for avoiding, mitigating and compensating for wetland losses (Resolution XI.9) [with respect to decision-making for any] [when considering] development impacting on intertidal and other coastal wetlands;

1. [40.] ALSO [ENCOURAGES Contracting Parties] [URGES], in [support of] [line with Target 4 of the Strategic Plan for Migratory Species 2015-2023 and] Target 6 of Ramsar’s Strategic Plan 2016-2024, to withdraw or modify any perverse incentives to convert intertidal or other coastal wetland habitats, and additionally, to implement sustainable coastal engineered measures for climate adaptation, coastal defence and risk reduction, [in line with innovative nature-based solutions including “Building with Nature” principles, that ensure maintenance and restoration of mudflats, sand banks, barrier islands and other critical habitat such as mangroves, saltmarshes and seagrass beds];

1. [41.] [ENCOURAGES Parties to develop pilot schemes to demonstrate flyway-scale [benefits to] [Net Positive Impact of] critically important areas including offsetting approaches that involve corporations and governments];

1. [42.] [URGES Parties and INVITES non-Parties to ensure that coastal sediment needs from riverine inputs are maintained through the appropriate regulation of outflows from dams or other water regulation structures through the implementation of the Convention’s guidance on environmental flows (Resolutions VIII.1 and X.19);]

1. [ENCOURAGES the publication, [especially with conservationevidence.com] of practical experience of coastal conservation interventions in order to enlarge scientific understanding;]

1. [44.] ENCOURAGES Parties to employ coastal and marine spatial planning tools, as appropriate, to better manage conflicts in a multi-use coastal area and to promote conservation objectives in the intertidal and coastal zones and other sectoral development programmes;

### Restoration

1. [45.] [URGES Parties and STRP, funding permitting, to support and engage in the establishment, under the Coastal Forum, of a global initiative to promote restoration of coastal wetlands and other relevant habitats as called for by Resolution XII.13and CBD Decision XII.19;]

1. [46.] [URGES] [CALLS] on Parties in areas where coastal erosion and/or rises in sea-level is resulting in losses of inter-tidal wetlands, and where feasible, to implement programmes of managed retreat of coastal defences, thus both restoring inter-tidal habitats and creating more sustainable coastal defences and hence contributing to disaster risk reduction; [and URGES a presumption in favour of beneficial use of dredged sediments for coastal wetland restoration and that any administrative barriers to this end be addressed];

### Changing attitudes to coastal wetlands

1. [47.] [STRONGLY] ENCOURAGES [Parties as appropriate to consider] the development of programmes and initiatives including, for example, festivals associated with the arrival of migratory species, eco-tourism initiatives including those linked to gastronomic appreciation of sustainable seafood, and encouragement of responsible public access to tidal flats that communicate the importance of intertidal wetlands and associated habitats to the public, policy-makers and other stakeholders (including relevant sectors of the business community), and urges the sharing of such experience, for example through the Coastal Forum];

1. [48.] [REQUESTS that the draft Strategic Plan due for consideration at COP 14 gives due [consideration] [emphasis] to the conservation and wise-use needs of intertidal and other coastal wetlands]; and

### Monitoring progress

48. [49.] [CALLS ON Parties and STRP to report progress in implementing this Resolution, including assessments of the efficacy of measures taken, to each meeting of the Conference of the Parties including through their National Reports.]

**[Annex 1]**

## Previous Resolutions especially relevant to the conservation and wise-wise use of intertidal wetlands

|  |  |
| --- | --- |
| Recommendation VI.8 | Strategic planning in coastal zones |
| Resolution VII.21 | Enhancing the conservation and wise use of intertidal wetlands |
| Resolution VIII.4 | Principles and guidelines for incorporating wetland issues into Integrated Coastal Zone Management (ICZM) |
| ResolutionVIII.32 | Conservation, integrated management, and sustainable use of mangrove ecosystems and their resources |
| Resolution X.22 | Promoting international cooperation for the conservation of waterbird flyways |
| Resolution XII.13 | Wetlands and disaster risk reduction |

## [Annex 2]

**Summary of ecosystem services provided by intertidal wetlands and associated habitats and their contribution to the Sustainable Development Goals.**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | Inter  tidal flats | Bivalve reefs | Seagrass beds | Mangroves | Saltmarshes | Associated inland  ‘  working coastal  wetlands  ’ |
| **ECOSYSTEM SERVICES** |  |  |  |  |  |  |
| Food security |  |  |  |  |  |  |
| Coastal protection and disaster risk reduction |  |  |  |  |  |  |
| Biodiversity support (including migratory species) |  |  |  |  |  |  |
| Carbon storage and sequestration (‘blue carbon’) |  |  |  |  |  |  |
| Cultural importance |  |  |  |  |  |  |
| Pollution control/water quality |  |  |  |  |  |  |
| Tourism/recreation |  |  |  |  |  |  |
| **SUSTAINABLE DEVELOPMENT GOALS** |  |  |  |  |  |  |
| Goal 2. End hunger, achieve food security and improved nutrition and promote sustainable agriculture |  |  |  |  |  |  |
| Goal 13. Take urgent action to combat climate change and its impacts |  |  |  |  |  |  |
| Goal 14. Conserve and sustainably use the oceans, seas and marine resources |  |  |  |  |  |  |
| Goal 15. Sustainably manage forests, combat desertification, halt and reverse land degradation, halt biodiversity loss |  |  |  |  |  |  |

**[Annex 3]**

## International initiatives that have the capacity to assist with the conservation and wiseuse of inter-tidal and coastal wetlands

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | North  America | Neotropics | Europe | Africa | Asia | Oceania |
| Ramsar Site designation |  |  |  |  |  |  |
| World Heritage Site designation |  |  |  |  |  |  |
| Caring for Coasts |  |  |  |  |  |  |
| Western Hemisphere Shorebird Reserve Network |  |  |  |  |  |  |
| African-Eurasian Waterbird Agreement |  |  |  |  |  |  |
| East Asian-Australasian Flyway Partnership |  |  |  |  |  |  |
| Wadden Sea Flyway Initiative |  |  |  |  |  |  |
| Arctic Migratory Bird Initiative (Arctic Council) |  |  |  |  |  |  |
| European Union Directives and Regulations |  |  |  |  |  |  |
| *Potential* Coastal Forum |  |  |  |  |  |  |

**OTHER POSSIBLE ANNEXES**

**[Annex X]**

## Summary of extent of intertidal wetlands (ITW), their losses and designation as Ramsar Sites

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| Ramsar Region | Est  imated total  extent of ITW  s  (2017) | No. Ramsar Sites  6    with ITW    at COP7 | Are  a of Ramsar Sites  containing ITW    at  COP7  7 | No. Ramsar Sites  with ITW    at COP13 | Area Ramsar Sites  containing    ITW    at  COP13  2 | Approximate  proportion of ITW    designated | Sub  -  regional  assessme  nts of ITW    extent or losses |
| North America |  |  |  |  |  |  |  |
| Neotropics |  |  |  |  |  |  |  |
| Europe |  |  |  |  |  |  | EU28 ii |
| Africa |  |  |  |  |  |  |  |
| [E Asia] |  |  |  |  |  |  | Yellow  Sea i |
| [W Asia] |  |  |  |  |  |  | [Arabian Coast] |
| Oceania |  |  |  |  |  |  |  |

Sources:

i. MacKinnon, J., Verkuil, Y.I. & Murray, N. 2012. *IUCN situation analysis on East and Southeast Asian intertidal habitats, with particular reference to the Yellow Sea (including the Bohai Sea).* Occasional Paper of the IUCN Species Survival Commission No. 47. IUCN, Gland, Switzerland and Cambridge, UK. Available at: <https://portals.iucn.org/library/efiles/documents/SSC-OP-047.pdf>

**[Annex x]**

## Globally Threatened species associated with intertidal and coastal wetlands. Source: IUCN Red List, 2017

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | Near Threatened | Vulnerable | Endangered | Critically  Endangered |
| Fish |  |  |  |  |
| Turtles |  |  |  |  |
| Birds |  |  |  |  |
| Mammals |  |  |  |  |

6

Ramsar wetland classification types: G (Saline or brackish water – intertidal - flats (mud, sand or salt) and Ga (Saline or brackish water - intertidal - bivalve (shellfish) reefs

7

Note that area statistics over-inflate ITW extent by the inclusion of other habitat types contained with many Ramsar Sites. It is currently not possible to derive a total for the extent of inter-tidal wetlands alone within Ramsar Sites.

1. Intertidal wetlands and ecologically associated habitats include inter-tidal flats, seagrass beds, mangroves, bivalve (shellfish) reefs, and associated coastal habitats ecologically linked to these areas, for example saltpans/salinas, fishponds, area used for aquaculture and mariculture, sewage works, and other habitats used by coastal waterbirds for feeding and roosting. [↑](#footnote-ref-1)
2. MacKinnon, Verkuil, & Murray (2012) [↑](#footnote-ref-2)
3. [ Murray, N. J., Clemens, R. S., Phinn, S. R., Possingham, H. P., & Fuller, R.A. (2014). Tracking the rapid loss of tidal wetlands in the Yellow Sea. *Frontiers in ecology and the environment*, *12*, 267–272.

   https://doi.org/10.1890/130260 ] [↑](#footnote-ref-3)
4. *inter alia* including shellfisheries, polychaete harvesting, mariculture (for example for seaweed), aquaculture, fishponds, saltpans/salinas, and sewage works [↑](#footnote-ref-4)
5. [ potentially including but not restricted to CBD, the CMS Family, the East Asian - Australasian Flyway Partnership, the Arctic Council’s AMBI, governments, the private sector, relevant international and national non-governmental organizations, experts and stakeholders] [↑](#footnote-ref-5)