



**United Nations
Environment Assembly of the
United Nations Environment
Programme**

UNEP/AHEG/2018/1/3

Distr.: General

8 May 2018

English only

**Ad hoc open-ended expert group
on marine litter and microplastics**

First meeting

Nairobi, 29–31 May 2018

Item 5 of the provisional agenda*

**National, regional and international response options,
including actions and innovative approaches, and
voluntary and legally binding governance strategies and
approaches**

**Discussion paper on national, regional and international
response options, including actions and innovative approaches,
and voluntary and legally binding governance strategies and
approaches**

Note by the secretariat

I. Introduction

1. Pursuant to United Nations Environment Assembly resolution 3/7 on marine litter and microplastics, the ad hoc open-ended expert group on marine litter and microplastics will further examine the barriers to and options for combating marine plastic litter and microplastics from all sources, especially land-based sources, based on the following programme of work:

- (a) To explore all barriers to combating marine litter and microplastics, including challenges related to resources in developing countries;
- (b) To identify the range of national, regional and international response options, including actions and innovative approaches, and voluntary and legally binding governance strategies and approaches;
- (c) To identify environmental, social and economic costs and benefits of different response options;
- (d) To examine the feasibility and effectiveness of different response options;
- (e) To identify potential options for continued work for consideration by the United Nations Environment Assembly.¹

2. The secretariat prepared the present note to provide the ad hoc open-ended expert group with relevant information for the discussion and identification of the range of national, regional and international response options, including actions and innovative approaches, and voluntary and legally

*UNEP/AHEG/2018/1/1.

¹ UNEP/EA.3/Res.7, para. 10 (d).

binding governance strategies and approaches. A summary of the potential responses described in the present note is presented in annex I.

3. Sections II to V of the present note are built on technical reports prepared by the United Nations Environment Programme, especially those entitled “Marine plastic debris and microplastics: global lessons and research to inspire action and guide policy change”² and “Combating marine plastic litter and microplastics: an assessment of the effectiveness of relevant international, regional and subregional governance strategies and approaches.”³

4. The first report was prepared in response to resolution 1/6,⁴ in which the United Nations Environment Assembly requested the Executive Director of the United Nations Environment Programme to, among other things, identify key sources of marine plastic debris and microplastics, as well as possible measures and best available techniques and environmental practices to prevent the accumulation and minimize the level of microplastics in the marine environment.

5. The second report was prepared in response to resolution 2/11,⁵ in which the Environment Assembly requested the Executive Director to undertake an assessment of the effectiveness of relevant international, regional and subregional governance strategies and approaches to combat marine plastic litter and microplastics. It presents three possible to further combat marine plastic litter and microplastics, including binding and non-binding approaches.

6. The submissions to the secretariat by member States and observers relevant to this note have been compiled and are presented in annex II, as received by the secretariat, without formal editing.

7. The ad hoc open-ended expert group is invited to consider the present note, along with relevant resolutions, decisions and reports on marine litter and microplastics, in order to identify possible national, regional and international response options to further combat marine plastic litter and microplastics.

II. Types of responses

8. For the purpose of discussion by the ad hoc open-ended expert group at its first meeting, response options at the national, regional and international levels have been classified according to the following four non-exclusive categories: legal and policy responses, technological responses, economic responses and educational and informational responses.

9. The following sections describe possible national, regional and international responses in the four categories, with examples. The intention was to provide indicative response options rather than an exhaustive list, in order to facilitate the deliberations of the ad hoc open-ended expert group. It should be noted that the response options are sometimes mutually supportive and could be implemented simultaneously at different spatial and temporal scales according to socioeconomic and environmental circumstances.

III. National responses

A. Legal and policy responses

10. Member States have taken different kinds of action to prevent and reduce marine litter. Some countries have adopted a framework law, while others have taken action on specific products such as non-recoverable and single-use plastic items. In order to address the issue in an integrated manner, it is advisable to coordinate with relevant sectoral agencies and consider a circular economy approach when taking policy action. The various types of national legislation presented below indicate some of the national legal and policy response options.⁶

² UNEP/AHEG/2018/INF/4.

³ UNEP/AHEG/2018/INF/3.

⁴ UNEP/EA.1/Res.6, para. 14.

⁵ UNEP/EA.2/Res.11, para. 20.

⁶ Further details can be found in: United Nations Environment Programme (2016). *Marine litter legislation: A toolkit for policymakers*. Available from <https://www.unenvironment.org/resources/report/marine-litter-legislation-toolkit-policymakers>.

1. Overarching national legislation and policies

11. Overarching national legislation can be enacted to coordinate actions to address marine litter. For example, Japan has enacted the Law for the Promotion of Marine Litter Disposal (2009), which led to the adoption of the Basic Policy for Comprehensively and Effectively Promoting Measures against Marine Litter (2010) and mandated the development of regional plans by the prefectural governments.

12. Other countries have included provisions relevant to marine litter within existing broader legislation. The Republic of Korea's Marine Environmental Management Act (2009) mandated the development of a marine litter management plan and defined the responsibilities of the State and local government.

13. Some countries have developed national action plans on marine litter. Indonesia, for example, has set a reduction target of 70 per cent by 2025. The identification of national priority actions, baseline values and reduction targets are recommended for national action plans. National plans can also incorporate a national marine litter assessment and monitoring programme. Quantitative indicators can be used to assess policy impacts, as well as progress towards the Sustainable Development Goal (SDG) targets, especially target 14.1, "by 2025, prevent and significantly reduce marine pollution of all kinds, particularly from land-based activities, including marine debris and nutrient pollution."

2. Laws governing the production and use of land-based materials causing marine litter

(a) Prohibiting, regulating and disincentivizing manufacturing

14. Several Governments have taken steps to prohibit or disincentivize the production of certain goods. Examples include requiring best management practices for companies that manufacture, handle and transport nurdles (such as in California, United States of America) and prohibiting the manufacture of plastic bags (such as in Bangladesh,⁷ China⁸ and Rwanda) and microbeads in personal care products (such as in Canada, the United Kingdom of Great Britain and Northern Ireland and the United States).

(b) Prohibiting, regulating and disincentivizing use at the retail level

15. An increasing number of Governments are passing laws regulating the use of plastic products at the national, subnational and local levels. It is the most common legal response and includes the following:

- (a) A ban on plastic bags
- (b) Regulation of plastic bag thickness
- (c) Bans on plastic stirrers, utensils and cups
- (d) Imposition of taxes and other levies
- (e) Banning of "biodegradable" plastic bags
- (f) Exemption or mandated use of biodegradable plastic bags
- (g) Bans on expanded polystyrene
- (h) Required or encouraged use of reusable products
- (i) Prohibition of smoking on beaches

(c) Extended producer responsibility

16. Extended producer responsibility is a "policy approach in which producers accept significant responsibility (financial and/or physical) for the treatment or disposal of post-consumer products".⁹ For example, in Estonia, the Packaging Act (2004) requires packaging manufacturers to bear some responsibility for the recovery of packaging waste. In British Columbia, Canada, producers that plan to distribute products must operate under an end-of-life management plan approved by the Ministry of

⁷ The ban applies to all polythene shopping bags.

⁸ China has banned the production, use and sale of ultrathin shopping bags less than 25 microns thick.

⁹ Organization for Economic Cooperation and Development (2001). *Extended Producer Responsibility: A Guidance Manual for Governments*. Paris. Available from <http://dx.doi.org/10.1787/9789264189867-en>.

Environment and Climate Change Strategy. The applicable regulation was initially limited to beer containers but over time was expanded to target additional products for recovery.¹⁰

(d) Import bans

17. Some member States have taken legal measures to prohibit the import of certain plastic items. For instance, Rwanda has banned the import of all polythene bags, as well as the manufacture and sale of such bags. Recently, China issued a ban on imports of plastic waste from other countries.

3. Managing waste disposal

18. Member States have also taken legislative action to improve waste management, generally targeting four categories of disposal: land-based waste disposal; land-based waste clean-up; abandoned, lost and discarded fishing gear; and litter from ships. The mainstreaming of environmentally sound integrated waste management and prevention strategies in national development strategies is also an option.

(a) Land-based waste disposal

19. Landfill locations and operating methods can be regulated at the national level. Under the New Zealand Resource Management Act (1991), for example, landfills cannot be developed near the coast without a permit. In many countries, landfill site selection must be supported by an environmental impact assessment. Some countries, such as Brazil and the Philippines, prohibit open dumping.

20. Disasters such as earthquakes, typhoons and tsunamis can result in a large increase in marine litter. Many Governments have therefore prepared disaster debris management plans to help prevent litter from entering waterways and facilitate its removal after disaster events.

21. To reduce the quantity of waste entering the ocean, national and local governments have implemented recycling and waste separation policies. Such policies could also request businesses to separate recyclable materials at source or subscribe to recycling services.

22. While reduction needs to be prioritized, environmentally sound incineration technologies, including waste-to-energy, can be used as a means of waste disposal. Japan, for example, has a Waste Management and Public Cleansing Law (2001) that provides incentives for facilities to use waste-to-energy methods.

(b) Land-based waste clean-up

23. Various Governments have established coastal clean-up programmes. Such programmes encourage community participation. Some are publicly funded. The Republic of Korea has a programme that provides a financial incentive for fishermen to bring litter back to port.

(c) Abandoned, lost and discarded fishing gear

24. Some Governments have regulations on abandoned, lost and discarded fishing gear. In St. Kitts and Nevis, for instance, the Marine Pollution Management Act (2002) prohibits fishing gear that has any plastics, including synthetic ropes, synthetic fishing nets and plastic garbage bags. Some other countries have strategies in their laws to minimize the loss of fishing gear, including creating biodegradable components or marking fishing gear and attaching it to structures to enable retrieval.

(d) Litter from ships

25. The International Convention for the Prevention of Pollution from Ships, 1973, as modified by the Protocol of 1978 relating thereto (MARPOL) sets international regulations relating to the protection of the marine environment. Annex V of the Convention lays out regulations relating to vessel-born waste and its disposal. The annex requires the establishment of adequate port reception facilities to manage waste from ships.

26. Many countries have adopted national legislation to implement MARPOL. Some national regulations are more stringent, going beyond the requirements of annex V. In Namibia, for example, waste other than biodegradable household waste or fish offal must be taken to port and properly disposed of. Although MARPOL does not impose penalties for non-compliance, some countries, such as the United States, have legislation to impose criminal penalties for illegal dumping in their waters.

¹⁰ Ocean Conservancy (2017). *The Next Wave: Investment Strategies for Plastic Free Seas*. Available from <https://oceanconservancy.org/wp-content/uploads/2017/05/the-next-wave.pdf>.

27. The regulation of waste from cruise ships is a major concern in some countries. Under the Fisheries Act, Grenada prohibited the discharge of waste harmful to marine organisms in the designated marine protected areas.

4. Artificial reefs

28. Several countries have adopted legislation regulating artificial reefs, including anti-dumping provisions, as the reefs could become dumping grounds for polluted or unsuitable materials. Such regulations could be included in environmental and marine protection laws. Consideration could also be given to the possible impact of artificial reefs on ecosystem functioning.

5. Voluntary measures

29. The above sections described various binding measures. Regulations can be supplemented and enhanced by voluntary measures, both in the public and private sectors. Private companies in Japan, Mexico, Portugal, Spain and the United States, for instance, have undertaken voluntary nurdle management efforts. Some companies in the cosmetic industry have voluntarily phased out the use of microbeads in their products to prevent the outflow of microbeads to the aquatic environment. Voluntary certification and labelling schemes could also be considered.

30. Private and public entities could also voluntarily develop plastic management strategies to reduce their plastic footprint, such as green procurement policies to reduce the consumption of single-use and non-recoverable plastic items.

B. Technological responses

31. Technology and innovation can offer potential solutions to marine litter. Hundreds of novel technologies and equipment are currently being tested across the world. Among other things, the redesign of plastic items, including packaging, is important for the reduction of plastic materials that cannot be readily recycled or reused. “Design for the environment” is one approach that aims to reduce the environmental and human health impacts of products, processes and services, taking into consideration their entire life-cycle. A conservative estimate showed that negative externalities from plastic packaging reach \$40 billion per year.¹¹ To address this issue, some companies have already undertaken to make their plastic packaging fully recyclable.

32. Research and development of alternative materials that are degradable in the environmental conditions of oceans is also a potential response option. Researchers have been testing different materials, such as milk, eggs, natural fibres and organic waste, to produce alternatives to plastic polymers. Economies of scale are needed to make these alternative materials economically viable.

33. Waste management could also be improved through technological developments. From collection to landfill operations, new technologies have been tested to enhance the effectiveness of waste management. For example, mobile applications have been developed to improve waste collection and facilitate recycling in different parts of the world.

34. Private companies continue to develop new recycling technologies to improve plastic recycling. New technologies may allow recycling of polymers that were traditionally not recyclable. Waste-to-energy technologies can also be used to convert plastic waste that cannot be directly recycled to energy when deemed appropriate based on an analysis on socioeconomic and environmental costs and benefits.

35. The conversion of dump sites to sanitary landfills could also prevent inadequately covered plastic waste from being blown off into rivers and oceans. Various engineering solutions are available for such conversions.

36. Microbeads, including those contained in personal care products, are sometimes released into the aquatic environment. Depending on the existence and efficacy of wastewater treatment facilities, the quantities released can be significant. The improvement of wastewater treatment could thus be considered as a means of capturing microplastics before they enter the aquatic environment. The appropriate disposal of sludge containing microbeads may require additional efforts, however.

¹¹ United Nations Environment Programme (2014). *Valuing Plastic: The Business Case for Measuring, Managing and Disclosing Plastic Use in the Consumer Goods Industry*. Available from <http://wedocs.unep.org/bitstream/handle/20.500.11822/9238/-Valuing%20plastic%3a%20the%20business%20case%20for%20measuring%2c%20managing%20and%20disclosing%20plastic%20use%20in%20the%20consumer%20goods%20industry-2014Valuing%20plasticsF.pdf?sequence=8&isAllowed=y>.

37. Washing of textiles and clothing can release synthetic fibres to wastewater streams. Some engineering solutions have been developed to equip washing machines with filters to capture these microfibres. The appropriate disposal of the microfibres captured in the filters should also be considered to prevent them from entering the oceans.

38. While prevention is more cost effective than removal,¹² several methods have been tested for removing large plastic items from rivers and harbours. Litter booms can be set up to remove plastic waste floating in rivers and prevent it from flowing into the marine environment. In Guatemala, municipalities have installed litter booms made of used plastic bottles, allowing low-cost removal of plastics from the rivers. These booms could also be used to help monitor marine litter flux.

39. Various other technologies are used to locate and remove litter from the oceans. The plastic items collected from oceans and beaches have been used to produce new products, such as shoes, bracelets and carpets.¹³

40. Last but not least, monitoring and assessment are crucial to understanding the status of the problem and the effectiveness of interventions. Various technologies, such as remote sensing, satellite images and drones, could be used to improve monitoring for the purpose of prioritizing action to tackle marine litter.

C. Economic responses

41. Economic incentives can be used to encourage a desired behaviour. They can also be designed to shift the current linear economy towards a more circular economy to minimize waste throughout material flows.

42. Many Governments have employed economic incentives such as taxes, levies and fines¹⁴ to reduce the production and consumption of plastic items. Some Governments have implemented take-back and deposit-refund schemes for plastic items such as bottles. These schemes provide economic incentives for recycling.

43. Increased investment in marine litter management options, such as for improved waste management, wastewater treatment, research and innovation,¹⁵ could be helpful in accelerating the development of new solutions. National Governments could set up a fund to address marine litter, funded in part by a tax on certain types of plastic products.

D. Educational and informational responses

44. Education and awareness-raising are fundamental to changing public perceptions, attitudes and behaviour. A broad range of national and local educational and capacity development programmes and awareness-raising campaigns have been implemented. Such programmes can involve such activities as clean-ups,¹⁶ the engagement of citizens for the monitoring of beach litter and the rescue of marine organisms affected by litter or adoption of local beaches. They may also involve the training of teachers and training of trainers.

45. Multi-stakeholder workshops, events and information-sharing sessions have been organized to share best practices for addressing marine litter. Art and music such as paintings, installations, photography and videos can be used to draw public attention. Mobile applications, such as “Beat the Microbead”, have also been developed to raise awareness.¹⁷

46. Awareness-raising activities can also be carried out at the entity level. Public and private entities can develop plastic management strategies to reduce consumption of single-use and non-recoverable plastics in their operations. In Germany, plastic manufacturers and the chemicals industry have launched an initiative called “Zero Pellet Loss”¹⁸ to raise employee awareness on how to manage pellets properly and prevent pellet losses.

¹² UNEP/AHEG/2018/1/4.

¹³ In Kenya, for example, flip flops are collected to produce new artworks.

¹⁴ See section III.A.

¹⁵ See UNEP/AHEG/2018/1/INF/4, chapt. 13, for further discussion on key research needs.

¹⁶ In Israel, for example, the Clean Coast Index has been used to rank the cleanliness of beaches. The rankings are used in decision-making on budgetary assistance to be provided.

¹⁷ See <http://www.beatthemicrobead.org/>.

¹⁸ See <http://www.rkw-group.com/company/sustainability/activities/zero-pellet-loss-initiative.html>.

IV. Regional response options

47. Regional cooperation is crucial to addressing marine litter, as oceans are ecologically connected and no country can manage the ocean in isolation. Regional approaches enable coordinated action among countries, as well as sharing of the best management practices applicable to the specific regional environmental and socioeconomic context.

A. Legal and policy responses

48. Since the establishment of the Regional Seas Programme in 1973, the United Nations Environment Programme has taken a regional approach to addressing environmental degradation of the marine and coastal environment. More than 143 member States participate in one or more of the 18 Regional Seas programmes. A total of 14 of the Regional Seas Programmes are underpinned by legally binding conventions, and nine regions have adopted protocols specific to land-based activities or land-based sources of pollution. Six regions¹⁹ have regional action plans on marine litter, while seven others²⁰ are currently developing new regional action plans on marine litter pursuant to requests by the United Nations Environment Assembly.²¹

49. The regional fisheries bodies are a mechanism through which States or organizations that are party to an international fishery agreement or arrangement work together towards the conservation, management and/or development of fisheries. They have played a crucial role in the implementation of the Code of Conduct for Responsible Fisheries, which, among other things, encourages the prevention of damage to or loss of fishing gear. Draft guidelines on the marking of fishing gear²² are currently being prepared to support the development and application of a fishing gear marking system to help the regional fisheries bodies address the issue of abandoned, lost and discarded fishing gear.

50. Other political groups, such as the Group of Seven (G7) and the Group of 20 (G-20) have also developed action plans. The 2015 G7 Action Plan to Combat Marine Litter was followed by the G-20 Action Plan on Marine Litter in 2017, which in turn led to the establishment of the global network of the committed to facilitate the implementation of the plan.

51. Regional policy coordination on marine litter and microplastics has also played a role in combating marine litter. The European Union, for example, has the Marine Strategy Framework Directive, a legally binding instrument under which each member State is required to develop a strategy for its marine water by 2013 based on a plan of action set out in the directive. In addition, the recently adopted European Strategy for Plastics in a Circular Economy (2018)²³ aims to transform the way plastic products are designed, used, produced and recycled in the region. In South-East Asia, the Association of Southeast Asian Nations (ASEAN) Conference on Reducing Marine Debris in the ASEAN Region held in 2017 was attended by more than 200 entities, including member States, development partners, international organizations, the private sector and civil society, and produced a recommendation on the development of a regional agreement on sustainable management of marine debris pollution.

52. There have been many projects supporting the implementation of policy instruments at the regional and national levels. Both bilateral donors and multilateral donors, such as the Global Environment Facility, have funded regional projects targeting land-based sources of pollution, including marine litter, which can serve as demonstration projects for various solutions.

B. Technological responses

53. Technical interventions can take place at both the regional and the national levels. For example, the Secretariat of the Pacific Regional Environment Programme has been working on regional solid waste management projects to improve waste management in the Pacific islands.

54. Research on innovative solutions to marine litter can also be supported by regional funds such as Horizon 2020, a European Union research and innovation programme.

¹⁹ Baltic Sea, East Asian Seas (under revision), Mediterranean, North-East Atlantic, North-West Pacific and Wider Caribbean. The Regional Plan on Marine Litter Management in the Mediterranean is a legally binding instrument.

²⁰ Black Sea, North-East Pacific, Pacific, Regional Organization for the Protection of the Marine Environment (ROPME) Sea Area, Red Sea and the Gulf of Eden, East Africa, South Asian Seas.

²¹ See UNEP/EA.1/Res.6, para. 11; UNEP/EA.2/Res.11, para. 14; UNEP/EA.3/Res.7, para. 4.

²² TCMFG/2018/3.

²³ Available from <http://ec.europa.eu/environment/circular-economy/pdf/plastics-strategy-brochure.pdf>.

C. Economic responses

55. Regional economic communities can play a role in coordinating actions on the regional economic agenda. Regional development banks could provide investment to address marine litter, such as by improving waste management facilities in developing countries. Other regional funding mechanisms could also support research and development on solutions to marine litter.

D. Educational and informational responses

56. Information and lessons learned can be shared at the regional level. In order to facilitate the sharing of regionally specific information on marine litter, the United Nations Environment Programme has supported the creation of regional nodes of the Global Partnership on Marine Litter in the North-West Pacific, the Wider Caribbean and the Pacific regions. A new regional node for the Mediterranean is to be launched soon. In the North-West Pacific region, for example, annual regional conferences on marine litter have been organized to strengthen inter-regional cooperation among the four participating countries. In addition, regional educational and capacity-building programmes, awareness campaigns, conferences, training sessions and other such events are useful for joining efforts to combat marine litter through regional cooperation.

V. International response options

A. Legal and policy responses

57. Pursuant to resolution 2/11,⁵ the United Nations Environment Programme has prepared an assessment of the effectiveness of relevant international, regional and subregional governance strategies and approaches.³ The assessment identifies existing gaps in governance strategies and approaches and presents three response options to facilitate future discussions:

- (a) Option 1: Maintaining the status quo;
- (b) Option 2: Review and revise existing framework to address marine plastic litter and microplastics, add components to address industry; and
- (c) Option 3: A new global architecture with a multi-layered governance approach.

58. The present section builds on the assessment to facilitate the deliberations of the ad hoc open-ended expert group. Annex III to the present note provides a summary of the three options and the possible implementation methods presented in the assessment. The summary is presented without formal editing.

1. Binding measures

59. Maintaining the status quo, as proposed in option 1, could involve strengthening the implementation of existing instruments, including those under the Regional Seas programmes and relevant multilateral environmental agreements, to accelerate global efforts to address the problem of marine litter. As such, member States that have not yet done so should be encouraged to ratify the relevant international instruments, including:

- (a) The United Nations Convention on the Law of the Sea;
- (b) The Agreement for the Implementation of the Provisions of the United Nations Convention on the Law of the Sea of 10 December 1982 relating to the Conservation and Management of Straddling Fish Stocks and Highly Migratory Fish Stocks;
- (c) The Convention on the Prevention of Marine Pollution by Dumping of Wastes and Other Matter 1972 and its 1996 protocol;
- (d) Annex V of the International Convention for the Prevention of Pollution from Ships;
- (e) The Convention on Biological Diversity;
- (f) The Convention on the Conservation of Migratory Species of Wild Animals;
- (g) The Stockholm Convention on Persistent Organic Pollutants;
- (h) The Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and Their Disposal;
- (i) Regional instruments, including the Regional Seas Conventions and Action Plans.

60. As presented in option 2, existing international agreements could also be amended to mandate an existing international body to coordinate the efforts of various institutions to address marine litter.

61. As presented in option 3, an alternative is to establish new global binding mechanism to further address marine litter and microplastics. Any such mechanism should not duplicate efforts under existing instruments, however. It could take a similar approach to the Paris Agreement under the United Nations Framework Convention on Climate Change, where member States make nationally determined commitments to achieve the overall reduction target. It could also focus on specific aspects of the issue, such as microplastics or labelling and certification schemes. It should be noted that this option does not preclude the response measures presented in options 1 and 2.

2. Voluntary responses including partnerships

62. International voluntary measures can help address the issue. The Global Partnership on Marine Litter, for instance, is a multi-stakeholder partnership that engages more than 100 partners to implement the Honolulu Strategy.²⁴ Similarly, the Global Ghost Gear Initiative is a multi-stakeholder partnership established to tackle the problem of lost and abandoned fishing gear.

63. The Global Programme of Action for the Protection of the Marine Environment from Land-based Activities is an intergovernmental mechanism for addressing marine pollution in an integrated manner. It focuses on nine source categories, including litter, and brings together diverse stakeholders to implement the programme.

64. Industry associations and individual companies can also adopt voluntary standards, labelling schemes, industry guidelines and codes of conduct. Industry standards on such things as recyclability and biodegradability can be coordinated internationally, such as through the International Organization for Standardization.

65. As presented in option 2, an international voluntary coordination mechanism could also be considered to improve the coordination of various initiatives. An existing mechanism could take up such a mandate. Coordination activities could include actions such as building linkages among the relevant global, regional and national instruments and coordinating industry-led solutions and commitments.

B. Technological responses

66. Enhanced international coordination and collaboration on research and development would help improve the understanding of the pathways and impact of marine litter and potential solutions to the problem. For example, further research could be conducted on the risks associated with human intake of microplastics via the consumption of marine species. International cooperation could be beneficial in this regard.

C. Economic responses

67. Multilateral and bilateral development banks already assist developing countries in waste-related efforts such as improving waste management and wastewater treatment facilities. However, additional investments could be considered to implement commercially viable waste management services, including recycling, especially in regions where waste leakage to the oceans is high.²⁵

68. Improved coordination of research funding could be considered, including for life-cycle assessments of alternatives to plastic and existing plastic products and polymers of particular concern. Enhanced coordination would reduce the duplication of efforts and maximize the use of available funds.

69. A new global funding mechanism, as presented in option 3, could also be considered to support the implementation of a new global measure to address marine litter. Member States may wish to consider using tax income, such as from levies on plastic products, to replenish such a fund. In addition to supporting implementation of response actions, the fund could be used for remediation in countries where marine litter accumulates, particularly small island developing States.

²⁴ Available from https://marinedebris.noaa.gov/sites/default/files/publications-files/Honolulu_Strategy.pdf.

²⁵ Jambeck and others (2015). Plastic waste inputs from land into the ocean. *Science*, Vol. 347, No. 6223, pp. 768–771. Available from https://wedocs.unep.org/bitstream/handle/20.500.11822/17969/Plastic_waste_inputs_from_land_into_the_ocean.pdf?sequence=1.

D. Educational and informational responses

70. Internationally coordinated efforts to raise awareness are an integral part of the solutions to marine litter and microplastics. Thus, the United Nations Environment Programme has launched a five-year global CleanSeas campaign²⁶ in response to a request by the Environment Assembly.²⁷ Educational materials, including videos and infographics, have been prepared to support the implementation of the campaign at the regional, national and local levels.

71. Online courses could be used to train citizens. The United Nations Environment Programme has produced a massive open online course on marine litter in English and Spanish, which to date has been taken by more than 10,000 individuals across the world.

72. International conferences and events such as the International Marine Debris Conference can also contribute to the sharing of lessons learned and new collaborative work in different parts of the world, with information and data collected at these conferences and events shared through databases and websites such as at the Marine Litter Network website of the Global Partnership on Marine Litter.²⁸

VI. Recommendations and suggested action

73. The above presentation of indicative response actions at the national, regional and international levels shows that action can be taken at all levels to address marine litter and microplastics. Coordinated action would help maximize the use of available resources and avoid duplication of efforts.

74. The ad hoc open-ended expert group is invited to consider the present note, as well as relevant reports, decisions and resolutions, during its deliberations at its first meeting to further identify the range of national, regional and international response options, including actions and innovative approaches, and voluntary and legally binding governance strategies and approaches.

²⁶ <http://cleanseas.org/>.

²⁷ UNEP/EA.2/Res.11, para. 22.

²⁸ <http://marinelitternetwork.com/>.

Annex I

Summary of response options at the national, regional and international levels

	National	Regional	International
Legal and policy responses	<p>Setting overarching national legislation and policies</p> <ul style="list-style-type: none"> • Adopt overarching national legislation • Include provisions relevant to marine litter in existing broader legislation • Develop national action plans on marine litter and microplastics or bring marine litter into existing national plans <p>Laws governing the production and use of land-based materials causing marine litter</p> <ul style="list-style-type: none"> • Prohibiting, regulating and disincentivizing manufacturing <ul style="list-style-type: none"> ○ Prohibit or regulate the manufacture of nurdles (pre-production plastic) ○ Prohibit or regulate the manufacture of plastic bags ○ Prohibit or regulate the manufacture of microplastics (microbeads) • Prohibiting and disincentivizing use at the retail level <ul style="list-style-type: none"> ○ Ban plastic bags ○ Regulate bag thickness ○ Ban plastic stirrers, utensils and cups ○ Introduce taxes and other levies ○ Ban “biodegradable” plastic products ○ Ban expanded polystyrene (foam) ○ Require or encourage the use of reusable products ○ Create cigarette-free beaches • Extended producer responsibility • Trade and import bans <p>Managing waste disposal into the marine environment</p> <ul style="list-style-type: none"> • Land-based waste disposal requirements <ul style="list-style-type: none"> ○ Landfill siting and operation ○ Planning and disaster preparedness ○ Mandatory recycling and separation ○ Incineration • Land-based waste clean-up • Regulation of abandoned, lost and discarded fishing gear • Regulation of marine litter from ships 	<ul style="list-style-type: none"> • Enhancing the implementation of regional instruments <ul style="list-style-type: none"> ○ Regional Seas Programmes ○ Regional fisheries bodies • Regional action plans on marine litter • Regional policy coordination • Regional projects 	<p>Binding measures</p> <ul style="list-style-type: none"> • Improve implementation of legal instruments • Amend existing international agreements to better address marine litter • Establish a new global binding mechanisms <p>Voluntary responses, including partnerships</p> <ul style="list-style-type: none"> • Multi-stakeholder partnerships • Industry associations and groups to set standards, labelling schemes and codes of conduct • New international voluntary coordination mechanism

	National	Regional	International
	<ul style="list-style-type: none"> ○ International Convention for the Prevention of Pollution from Ships, 1973, as modified by the Protocol of 1978 relating thereto (MARPOL) ○ National legislation implementing MARPOL ○ Cruise ship waste ○ Penalties for violations of provisions against dumping garbage into the marine environment ● Regulation of artificial reefs <p>Enforcement of existing laws and regulations</p> <p>Voluntary measures</p> <ul style="list-style-type: none"> ● Voluntary plastic management strategies at public and private institutions ● Green and sustainable procurement policies ● Certification and labelling schemes 		
Technological responses	<ul style="list-style-type: none"> ● Redesign of plastic products and packaging ● Research and development on alternatives to plastic ● Improved waste management and wastewater treatment facilities and technologies, including recycling technologies ● Technologies to capture microfibres ● Litter capture and removal in rivers and harbours ● Removal of litter from mid-ocean ● Use of marine plastic litter for products ● Use of technologies such as mobile applications and satellite images for marine litter monitoring and assessment 	<ul style="list-style-type: none"> ● Regional cooperation on waste management ● Regional cooperation on research and development, potentially supported by a regional fund 	<ul style="list-style-type: none"> ● Coordinated research and development
Economic responses	<ul style="list-style-type: none"> ● Use of economic incentives in policy measures, such as taxes, levies and fines ● Take-back and deposit-refund schemes ● Investment in waste management and wastewater technologies, including alternative and low-cost options ● Investment in innovation, research and development 	<ul style="list-style-type: none"> ● Regional cooperation on investment, such as in waste management and wastewater facilities 	<ul style="list-style-type: none"> ● Further investment to support improvement of waste management and wastewater treatment ● Improved coordination of funding for research on alternatives to plastic and product redesign ● New global funding mechanism to coordinate initiatives to address marine litter
Educational and informational responses	<ul style="list-style-type: none"> ● National and local educational programmes and campaigns ● Awareness-raising in both the private and public sectors 	<ul style="list-style-type: none"> ● Sharing of information, lessons learned and best practices at the regional level ● Regional awareness campaign, capacity development programmes 	<ul style="list-style-type: none"> ● Global awareness-raising campaigns ● Massive open online courses on marine litter ● Improved information sharing

Annex II

Compilation of submitted inputs from member States and observers to the ad hoc open-ended expert group relevant to this note (as of 18 April 2018)^a

Member States/ observer organizations	Summary of the submission	Link
Israel	<p>As a member state of the Barcelona Convention, Israel is committed to the Regional Plan on Marine Litter Management. According to this plan, which is part of a broader plan to reduce sea pollution from land-based sources (NAP), Member States are required to take a long list of actions to minimize the extent of the marine waste phenomenon, its harmful effects on the marine environment and on the coastal population.</p> <p>As a coastal state, Israel is strongly dependent on a healthy marine environment and the invaluable ecosystem services it provides. Israel is facing the environmental challenges accompanying fast population increase, decreasing land space and economic growth. In this context, Israel recognizes the severe threat posed by marine litter, particularly microbeads and single-use plastics. In recent years, Israel has implemented various measures to reduce its national plastic footprint, and future measures are planned.</p> <p>- Plastic Bag Law</p> <p>The law came into effect on January 1st, 2017, and addresses the above-average consumption of plastic bags in Israel. This law, which is aimed at motivating Israelis to use environmentally-friendly reusable bags, has banned the distribution of "very thin" plastic bags (with a width of less than 20 microns) at major supermarkets chains. In addition, these supermarkets must now charge a tax of at least NIS 0.10 for bags with a width between 20-50 microns. Supermarkets are required to submit quarterly reports to the Ministry, detailing the number of bags sold. The money paid for plastic bag purchase is transferred to the Ministry's Maintenance of Cleanliness Fund, to be used to fund related environmental projects including better treatment of waste and recycling, preventing air pollution and raising public awareness. Results of the first year of enforcement of the law indicate a very effective outcome. There has been a reduction of approx. 80% in the number of plastic bags purchased in the major supermarkets chains. During the implementation of the law, a national public awareness campaign was launched and free reusable bags were distributed to every household.</p> <p>- Clean Coast Program</p> <p>This is a multi-layered approach to dealing with waste left on the beaches or washed ashore. This program is partially funded by the Ministry of Environmental Protection. The budget for the Clean Coast program has been increased threefold to over 2 million USD and a goal has been set for 2018 to have 60% of Israel's beaches clean 70% of the time.</p> <p>At the heart of the program are routine cleanup activities by local authorities responsible for the beaches and volunteers; enforcement measures against polluters and authorities that fail to comply with their obligations; information and public media campaigns and educational efforts by NGOs and communities. The Clean Coast program is carried out together with the Israel Nature and Parks Authority and with the involvement of other stakeholders and has cooperated, among others with the Blue Flag Eco-Label and local NGOs such as EcoOcean and the Israel Society for the Protection of Nature, which provides assistance in monitoring marine plastic.</p>	https://papersmart.unon.org/resolution/uploads/position_paper_israel.pdf

^a The secretariat made minor changes to the format of the submission in order to fit it into a table.

Member States/ observer organizations	Summary of the submission	Link
	<p>Furthermore, the program includes educational activities in Israel's schools and other information and publicity campaigns. The program has continuously succeeded in meeting its stated waste reduction targets, progress toward which is measured in regular intervals by the Clean Coast Index (CCI).</p> <p>- Clean Coast Index</p> <p>The Clean Coast program is an ongoing and results-oriented effort. Therefore inspections and measurements are carried out every two weeks by the Ministry of Environmental Protection at 66 beaches along Israel's coastline. The data collected from these inspections is published as The Clean Coast Index (CCI) and beaches are ranked at one to five levels from "very clean" to "extremely dirty" and the ranking may affect the budgetary assistance provided. The CCI methodology was developed in Israel specifically for this program and has been cited in studies by UNEP and other bodies as an effective means to contend with this challenge.</p> <p>- "Adopt a Beach" and marine litter monitoring pilots</p> <p>The main Objectives set by UNEP's Integrated Monitoring and Assessment Program (IMAP) for marine litter are to identify spatial and temporal trends in marine and coastal litter in our area, to identify anomalous behaviors and to identify pollution sources and risks, in order to reduce or eliminate them in the future. These will assist us in assessments of the potential ecological impacts, and potential human health impacts. Moreover this monitoring will provide a baseline for environmental impact risk assessment of future developments.</p> <p>The Israeli monitoring plan for litter was built based on the IMAP guidelines. The program includes various domains, which requires the collaboration of governmental bodies, NGO's, and science groups. The Israeli plan for litter monitoring currently includes beach litter monitoring, floating stream litter monitoring, seafloor litter monitoring, micro-litter monitoring of surface water and micro-litter monitoring of sediments.</p> <p>A citizen-science component has been pointed out by previous marine litter studies as highly effective in raising awareness of the public to marine litter and to marine monitoring in general. The monitoring work is carried out by volunteers- divers from "Mishmar Hayam" (Sea Guard) and students from School of Marine Sciences, Ruppin Academic Center. Therefore, a citizen-science component was added to the marine litter monitoring pilot. This component is funded by UNEP as part of the "Adopt a Beach" project.</p> <p>The future plan is that surveys will be carried out every 3 months, to gather seasonal variations of the marine litter in the monitored beach. Production of materials required for the "Adopt a Beach" project, such as posters or pamphlets, will be determined after the first year of the project.</p> <p>- National Plan for the Reduction at Source of Municipal Solid Waste</p> <p>MoEP will engage in preparing a National Plan for Waste Minimization during 2018 and it will include actions for reducing the consumption of various waste streams, including plastics such as bottles, packaging, plastic bags and disposable products such as cups and cutlery.</p>	
Japan	<p>Possible response options and their cost should be examined in accordance with the development of monitoring methodologies mentioned above, and with the accumulation of scientific knowledge and their evaluation which include an inventory of emission sources. Responses should address each emission source in an effective and feasible manner. Resource efficiencies including efficient resource uses and sustainable materials and waste management would be one of key and major components of the response options, while scientific knowledge should be further enhanced.</p>	https://papersmart.unon.org/resolution/uploads/position_paper_japan.pdf

Member States/ observer organizations	Summary of the submission	Link
The Netherlands	<ul style="list-style-type: none"> • In response to the letter of 22 march 2018 of the Executive Director, inviting UN Member States to submit their views on: the major barriers to combatting marine litter and microplastics, potential national, regional and international response options and associated environmental, social and economic costs and the feasibility and effectiveness of different response options, we would like to share the following: <ul style="list-style-type: none"> ○ The Netherlands would like to note that following previous UNEA meetings, several reports have been developed by UN Environment Programme addressing the issues of Marine Litter and Microplastics, including the report “Combating marine plastic litter an microplastics”, as prepared for UNEA-3. ○ These reports include a wealth of information relevant to the work of the Ad Hoc Open Ended Expert Group. ○ We also would like to note that other reports are available, e.g. through the regional seas programmes, addressing the options mentioned, including on economic and social effects of marine litter and microplastics. ○ It is our view that it is up to UN Environment Programme to analyse these and other relevant studies and information available, as a basis for the background documents addressing the issues highlighted in the Programme of Work for the Ad Hoc Open Ended Expert Group, rather than based on the views or positions of MS at this stage. ○ In light of that, you will find at the end of this document an overview of studies and information that is publicly available, that we believe could include relevant information to be taken into account, when developing the background papers to inform the discussions at the Ad Hoc Open Ended Expert Group. ○ Furthermore, we would like to highlight paragraph 7b) of the UNEA-3 resolution, requesting UN Environment to provide advice on the prioritizing of activities upon request based on best available scientific knowledge, and the most environmentally sound and cost-effective measures to prevent and reduce marine litter and microplastics, according to resolutions 1/6 and 2/11 and the present resolution (3/7). We believe it would be informative for the Expert Group to receive an overview of key activities identified so far. 	https://papersmart.unon.org/resolution/uploads/position_paper_netherlands.pdf
New Zealand	<p>In New Zealand’s view, robust policy, legislative and regulatory frameworks are important to manage waste effectively and holistically. In New Zealand, the Waste Minimisation Act 2008, Resource Management Act 1991 and the Exclusive Economic Zone Act 2012 ensure that central and local government work effectively to manage wastes, including in the marine environment, and ensure New Zealand meets relevant international obligations.</p> <p>The New Zealand Government is currently focused on a broad, coordinated approach to address the issue of plastic litter in the marine environment nationally. Work has already begun with the banning of microbeads, investing in on-shore recycling of PET plastics, improving data on litter composition on our shores, and exploring options for phasing out single-use plastic shopping bags.</p> <p>New Zealand attaches considerable importance to the role that responsible regional agencies play in waste and pollution management activity. In the Pacific, for example, the Secretariat of the Pacific Regional Environment Programme leads collaborative efforts on the Cleaner Pacific Strategy. Responsible regional bodies should be involved in new response options.</p> <p>There are a number of existing global initiatives on marine litter, including the Clean Seas for a Cleaner Pacific, the UNEP Clean Seas Campaign, and the Global Partnership on Marine Litter. New Zealand welcomes action through these mechanisms, including where they promote action that can be accelerated at local levels. We encourage the UN and other international initiatives to take a holistic approach and to coordinate their proposed activities to avoid duplication and diluted effectiveness.</p> <p>New Zealand would also encourage responses to focus on the source of marine litter and microplastics and working with relevant industries to take a circular design approach to materials and products.</p>	https://papersmart.unon.org/resolution/uploads/position_paper_newzealand.pdf

Member States/ observer organizations	Summary of the submission	Link
Norway	<ul style="list-style-type: none"> • The UNEA-3 report identifies that the current response is insufficient and that we need to strengthen our ambitions to promote more efficient frameworks for action on the ground. The report identifies a good starting point for further discussions. We encourage all delegations to make themselves familiar with the content and the options identified in the UNEA-3 report • Norway believes that we should focus the discussions of the Expert Group on the international governance structures to find a sustainable and efficient long-term solution to combat marine litter. • As a follow-up to the UNEA-3 study on international governance structures, we recognize that there is a clear need to develop a holistic global response and to strengthen global commitments. We support the development of a new global architecture with a multilayered governance approach. A permanent and dedicated structure provides a number of benefits that should be highlighted and brought forward for discussion. • For instance, a global permanent and dedicated structure would provide a framework for implementation. Such a framework could should include regular global meeting place at government level, allow for a long-term perspective in planning, resource mobilization and ensure the effective use and dissemination of available and existing resources based on data from the member states, allow for expert advice and knowledge sharing and support national policy-making. • Such a structure would provide a more systematic implementation of the principles agreed in the UNEA resolutions on marine litter. • The UNEA-3 resolution underlined that waste management should be given the highest priority. There is a special need to focus on how to best prevent the discharge of litter into the oceans from land-based sources. United Nations Environmental has a clear mandate to address the interlinkages between land-based sources and pollution to the marine environment. • Sea-based sources have different regimes in place, where the shortcomings in the response might depend on a different set of challenges such as lack of effective implementation, enforcement or capacity than gaps in the global framework. We should however keep in mind that the measures to address marine litter from sea-based sources are also part of a holistic response. • On the issue of microplastics, we appreciate the growing recognition that the nature of the problem is linked. However, effective measures to reduce microplastics from such as wear and tear and primary microplastics in products may differ from microplastics stemming from marine litter. This particular challenge should be addressed in the discussion. 	https://papersmart.unon.org/resolution/uploads/position_paper_norway.pdf
Poland	<p>As shown earlier, marine litter is a global phenomenon and in order to reduce it, actions have to be taken globally using the competences and knowledge of leading regions (European Union, USA). It is impossible for us to estimate any costs related to such actions, it seems however appropriate that European and American experts and scientists would need to join forces with local networks of relevant stakeholders and adapt means and measures to local conditions, standards and culture.</p>	https://papersmart.unon.org/resolution/uploads/position_paper_poland.pdf
Slovakia	<p>All countries and other stakeholders should be involved in addressed this issue, endeavoring to reduce the unnecessary use of plastic, take responsibility and considering the relevant the environmental, social and economic and geographical circumstances.</p>	https://papersmart.unon.org/resolution/uploads/position_paper_slovakia.pdf

Member States/ observer organizations	Summary of the submission	Link
Intergovernmental organizations		
Secretariat of the Cartagena Convention / Caribbean Environment Programme	<ol style="list-style-type: none"> 1. Development and implementation of waste to energy investments; 2. Enhancing, Replicating and/or Upscaling community/local marine litter projects; 3. Improved engagement of plastic industry as well as major users of plastic to identify and implement appropriate alternatives to single-use plastic but also to other packaging material like Styrofoam; 4. Conduct a national cost-benefit analysis to estimate the costs associated with marine litter and the benefits of taking action against marine litter in order to identify the most cost-effective approaches for addressing marine litter in coastal environments. The analysis should include the cost of inaction; 5. Policy, legislation and practices review and recommendations to establish enabling conditions for addressing plastics in the waste stream; 	https://papersmart.unon.org/resolution/uploads/position_paper_caribbean_environment_programme.pdf
Secretariat of the Barcelona Convention/ Mediterranean Action Plan	<p>There are different options that can be considered in view of strengthening responses to combat marine litter and microplastics, ranging from maintaining the existing status quo and strengthening its implementation, revising and strengthening the existing frameworks, encouraging more coordination among different sectors and initiatives and establishing partnerships with (plastic) industry. All these efforts need to be supported by clear awareness and education campaigns and support to knowledge generation to fill the gaps to effectively target the actions. Marine litter needs to become socially unacceptable.</p> <p>Global action is essential to trigger concrete and coordinated actions at all levels and across relevant sectors, for instance addressing global production and trade of plastics. However, the purpose of this position paper is to provide some highlights on the importance of the regional dimension and the necessity to continue valuing and politically supporting the Regional Seas work on marine litter in the most effective way. This is considered by the present paper as a most appropriate level for action, since relevant legal and policy instruments are already in place in most of the regions, and past experience has demonstrated the added value of regional frameworks in supporting the development and implementation of well-coordinated national actions.</p> <p>The current framework and the momentum of the Regional Seas Conventions and Programmes in combatting marine litter should be maintained and further strengthened.</p> <p>From the various Regional Action Plans on Marine Litter that are in place around the globe (i.e. Wider Caribbean, North-East Atlantic, Baltic Sea, Mediterranean Sea, ROPME Sea, East Asian Seas, North West Pacific, Pacific), the UN Environment Mediterranean Action Plan – Barcelona Convention is the only Regional Sea that has adopted the Regional Plan for the Management of Marine Litter in the Mediterranean, here in after referred to as the Mediterranean Regional Plan, as a legally binding instrument. It has further developed the Land based Sources and Activities Protocol and several provisions of the other Protocols of the Barcelona Convention. The Mediterranean Regional Plan contains a concrete set of measures to combat marine litter from different sources addressing also prevention of marine litter at source and including some general provisions related to plastic and microplastic, with timetables for implementation. The prevention actions of Mediterranean Regional Plan are complemented by the suggested actions of the Regional Action Plan on Sustainable Consumption and Production in the Mediterranean.</p> <p>There are differences between the Regional Seas’ approaches which differentiate also the level of effectiveness of measures. Approaches to prevent/reduce marine litter, used in the framework of different Regional Seas, should be harmonized to the extent possible and as appropriate, in view of strengthening regional legal and policy frameworks for marine litter management, providing for coordinated and coherent responses. Regional Seas that don’t dispose legally binding instruments for marine litter management, could be based on best practices form other Regional Seas Conventions. The Mediterranean Regional Plan provides a good and advanced model and could serve as a model for replications in other regions.</p>	https://papersmart.unon.org/resolution/uploads/position_paper_map_barcelona_convention.pdf

Member States/ observer organizations	Summary of the submission	Link
	<p>Best practices and lessons learned on marine litter management among Regional Seas should be further exchanged. UN Environment GPA is and should continue playing an important role in further promoting such a cooperation and exchange. The ongoing practice of development, in close collaboration with the Regional Seas, of international guidelines/standards addressing specific features of marine litter management, including microplastics, is a step in the right direction that would also support further harmonization of work under the Regional Seas and Programmes, and national efforts.</p> <p>The implementation of established regional instruments should be regularly assessed against regional objectives and strengthened, when needed.</p> <p>Inter sectorial coordination is key to define the best measures to combat marine litter and ensure effective implementation, to strengthen synergies and to maximize results. In the Mediterranean, a Regional Cooperation Platform on Marine Litter was established in 2016 at the initiative of UN Environment/MAP aiming to provide coordinated support to the implementation of the Mediterranean Regional Plan and to be a forum for consultation, exchange of good practices, and solutions seeking. It is implemented through the establishment, on a voluntary and an equal footing basis, of an open-ended group of over 20 major Mediterranean and international actors including private plastic industry with mandates and activities contributing to the environmentally sound management of marine litter in the Mediterranean. Furthermore, UN Environment/MAP participates in other regional fora, confirming its commitment to build extensive and inclusive partnerships. The replication of such a coordination intersectoral mechanism to other regions is recommended. Following best practices applied at the regional and global levels, inter sectorial coordination should be strengthened also at the national level, bringing together stakeholders from different sectors, relevant to marine litter management, including waste and wastewater management, conservation, fisheries, industry, tourism etc. in view of defining common strategies and actions.</p> <p>At the national level, marine litter and microplastics management should be integrated into the national plans and strategies with clear targets, measures and indicators. In the Mediterranean, the Contracting Parties were strongly encouraged to streamline marine litter measures in the updated National Action Plans adopted in the framework of the Land Based Sources and Activities Protocol of the Barcelona Convention in line with obligations of the Regional Plan on Marine Litter Management, taking into consideration the socioeconomic dimension, giving higher priority to actions aiming at preventing at source rather than limited to marine litter reduction and or removal measures, as well as ecosystem based management with the overall objective of achieving/maintaining Good Environmental Status (GES). UN Environment/MAP supports the Contracting Parties to implement the Marine Litter Regional Plan through the implementation of a number of measures envisaged in the updated above-mentioned NAPs.</p> <p>Approaching marine litter management from the economic and cost benefit points of view is very important. In this respect, another new element to be strengthened is related to the internalization of environmental and social costs of production. As in other forms of pollution, costs are usually externalized and finally borne by the environment. The response to these externalities would require strengthened legislation to put on the producers the full cost of their activities, including damage and remediation costs, in line with polluter pays and extended producers responsibility principles. In addition, the benefits of ecosystem restoration, compared to loss of ecosystem services, should be further assessed and considered as potential engine of economic growth and source of green employment.</p> <p>Further action is required towards long-term marine litter prevention strategies and measures, especially regarding marine plastic litter and microplastics aiming at promoting value chain approach and building circularity into production process and supply chain. Main efforts should be placed in avoiding superfluous packaging and disposable items and thus promoting reusable and durable goods, which in turn would imply economic benefits. Globally, 95% of plastic packaging material value, or USD 80-120 billion annually is lost to the economy after a short use. The achievement of higher levels of plastic recycling requires improvement of plastic design and production, addressing the needs of recycling or reuse at a very early stage, following an integrated life cycle approach. It is further required to strengthen cooperation among all key players of the full value chain including industry,</p>	

Member States/ observer organizations	Summary of the submission	Link
	<p>manufacturers, converters and waste management companies in view of developing viable markets and increased demand for recyclable and renewable plastics. However, poor waste management schemes, particularly in the Southern Mediterranean, may hamper appropriate collection and therefore continuous efforts should be placed in enhancing these schemes to effectively increase recycling rates. The use of alternative materials/plastic, the adoption of servicing models (Product-service systems) should be further assessed in terms of environmental and socioeconomic benefits and impacts.</p> <p>In this regard, strengthening the support to eco-innovation, facilitating the creation of new green businesses are key aspect to discover feasible tailor-made solutions that could be scaled-up nationally, regionally or globally. Existing industries should also adapt their business approach to contribute to the reduction of Marine Litter.</p> <p>The shift towards sustainable consumption patterns is also key to effectively prevent marine litter and microplastics generation. Hence the importance of making responsible and affordable options available at wide scale to the extent possible as well as providing for informed consumers choice. Education and awareness raising campaigns at all levels and strengthened partnership with the private sector should be regarded as enabling conditions.</p> <p>Considering the different levels of action, there is a need to further streamline relevant global and regional processes aiming at the same objectives, and strengthen the vertical links between actions at global, regional and national levels in view of maximizing synergies. The established collaboration between the Regional Seas Conventions of G7 countries, under the leadership of Italy as 2017 President of the G7, aiming at mainstreaming the work on marine litter of the Regional Sea Programmes and other regional organizations (i.e. fisheries) and the G7 Action Plan to Combat Marine Litter to maximize synergies in the achievement of the marine litter global commitments is a good example. This can serve as a best practice to be replicated in the framework of other processes and initiatives, e.g. the G20 for the implementation of the G20 Action Plan on Marine Litter, and the GPA Manila Declaration. Another good example is the cooperation established between UN Environment Mediterranean Action Plan - Barcelona Convention and Basel, Stockholm and Rotterdam Conventions and their Regional Centres to promote best practices with regards to marine litter management.</p>	
Regional Organization for the Conservation of the Environment of the Red Sea and Gulf of Aden (PERSGA)	<ul style="list-style-type: none"> • Supporting developing countries to prepare and implement on-ground actions to combat marine litter; • Enhancing capacity building; • Developing regional projects aiming to protect the marine environment from litter, including micro-plastics; • Initiating an international non-binding legal program on marine litter; • Proposing an international legal instrument for protection of marine environment from litter; • The need for National Action Plans illustrating how countries will comprehensively prevent and remove marine litter; • Improve collaboration among adjacent countries to manage marine litter, including sharing of ideas and resources; • There is a need for various response options to be experimentally evaluated to determine their effectiveness and cost. The most effective approaches can then be trialed and tested in other countries; and • The need for: <ul style="list-style-type: none"> – better understanding of the training or capacity needs for some countries to effectively combat marine litter; and – simple and cost effective approaches to survey and monitor microplastics in the marine environment, including beach sediments. 	https://papersmart.unon.org/resolution/uploads/position_paper_persga.pdf

Member States/ observer organizations	Summary of the submission	Link
Regional Organization for the Protection of the Marine Environment (ROPME)	<ul style="list-style-type: none"> ▪ Organizing beach and underwater clean-up campaigns ▪ Investment in waste management and recycling technologies ▪ Issuing necessary bylaws that limit or decrease of single use plastics ▪ Creating incentives for multiple use of plastic products and encouraging consumers to cut down on single-use plastics. ▪ Increasing efforts aiming to raise awareness about the problem of marine plastics and the importance of keeping the seas clean of waste. ▪ Issuing guidelines and providing necessary facilities for segregation of recyclable plastic products and other debris and standardization of packing in order to make its recycling feasible. ▪ Expand the use of biodegradable alternatives or non-plastic material 	https://papersmart.unon.org/resolution/uploads/position_paper_map_barcelona_convention.pdf
Secretariat of the Basel, Rotterdam and Stockholm Conventions	<p>6. The Conference of the Parties to the Basel Convention also included activities related to marine plastic litter and microplastics in the work programme of the Open-ended Working Group for the biennium 2018–2019 set out in the annex to decision BC-13/17. The activities, subject to the availability of resources, were as follows:</p> <p>(a) To consider relevant options available under the Convention to further address marine plastic litter and microplastics, taking into account, inter alia, the assessment requested by the United Nations Environment Assembly of the United Nations Environment Programme in its resolution 2/11, any relevant resolution by the Environment Assembly at its forthcoming third session and existing guidance documents and activities under the Basel Convention that address issues related to marine plastic litter and microplastics; and</p> <p>(b) To develop a proposal for possible further action, within the scope of the Convention and avoiding duplication with activities relating to the matter in other forums, for consideration by the Conference of the Parties at its fourteenth meeting.</p> <p>7. Following the meeting, the Secretariat has initiated activities related to marine plastic litter and microplastics. The Secretariat has compiled information on initiatives related to marine plastic litter and microplastics relevant to the Basel Convention and has made it available on the website of the Convention (http://www.basel.int/tabid/6068/Default.aspx) and has continued to participate in the activities of the Global Partnership on Marine Litter of the United Nations Environment Programme including in its webinars.</p>	https://papersmart.unon.org/resolution/uploads/position_paper_brs_secretariat.pdf

Member States/ observer organizations	Summary of the submission	Link
Major Groups and Stakeholders		
African Foundation	<ul style="list-style-type: none"> ▪ Development and implementation of wide and deep awareness-raising programme of activities on the effects and impacts of marine litter and microplastics at local, national and regional levels. ▪ Cyclical review or assessment of the effectiveness of relevant regional and national strategies and approaches to combating marine litter and microplastics. ▪ Adoption and establishment of effective and efficient regulatory systems to combating marine litter at national and regional levels. ▪ Facilitation and strengthening of inclusive participation and engagement of all relevant actors and stakeholders, including industries operators to combat marine litter and microplastics at local, national, regional and international levels. ▪ Development and implementation by members states of measures which discourage and ban unnecessary utilization of microplastics and nanoplastics. ▪ Promotion of green entrepreneurship and green industries development at regional, national and local/rural levels. Actors and stakeholders should promote and engage to support the emergency and development of green enterprises which contribute to combating marine litter and microplastics, and to facilitate and assist also industries to transit towards green industries. Including facilitate green entrepreneurs and green enterprises to access capital/finance. ▪ Resources should be mobilized at all levels, including at international, regional, national and local levels. And access to available existing resources should be facilitated by all actors, including donors, investors, fund managers and advisors. ▪ Members states and all actors should support the establishment and strengthening of fundamental values of modern society, including democracy, rule of law, justice, respect for human rights, peace ...etc. 	https://papersmart.unon.org/resolution/uploads/position_paper_african_foundation.pdf
Empower	<p>There are two basic types of instruments at the international level, in terms of their connection with regional or national instruments. The first comprises those which are explicitly transposed into regional or national ones, usually in the form of regional agreements or national legislations. Similar texts can also be found in the instruments at the regional or national level UNEP/IOC Guidelines on Surveying and Monitoring of Marine Litter, United Nations Convention on the Law of the Sea (UNCLOS).</p> <p>The UNEP developed, in cooperation with the intergovernmental Oceanographic Commission (IOC), guidelines on surveying and monitoring of marine litter in order to provide a long-term platform for scientific monitoring.</p> <p>International Instruments:</p> <ol style="list-style-type: none"> 1. UNCLOS 2. Annex V of MARPOL 73/78 3. London Protocol 4. IMO's Action Plan on tackling the inadequacy of PRFs 5. UNEP Regional Sea Programme 6. UNEP/IOC Guidelines on surveying and monitoring of marine litter 7. UNEP Guidelines on the use of market-based and economic instruments 8. UNEP/FAO Abandoned, lost or otherwise discarded fishing gear 	https://papersmart.unon.org/resolution/uploads/position_paper_empower_india.pdf

Member States/ observer organizations	Summary of the submission	Link										
	<p>9. Honolulu Strategy</p> <p>10. UNEP Global Partnership of Marine Litter</p> <p>Management schemes addressing marine litter</p> <table border="1" data-bbox="461 320 1718 683"> <thead> <tr> <th data-bbox="461 320 763 360">Types</th> <th data-bbox="772 320 1718 360">Examples of measures</th> </tr> </thead> <tbody> <tr> <td data-bbox="461 363 763 443">Preventive</td> <td data-bbox="772 363 1718 443">Source reduction (e.g. eco design), waste reuse and recycling, waste converted to energy, port reception facilities, gear marking, debris contained at points of entry into receiving waters, various land-based waste management initiatives.</td> </tr> <tr> <td data-bbox="461 446 763 595">Mitigating</td> <td data-bbox="772 446 1718 595">Various debris disposal and dumping regulations, i.e. waste discharged outside certain distances from land, wastes not containing harmful substances to the marine environment allowed for discharge, prohibition of waste discharge into ecologically sensitive areas, prohibition of the disposal of certain types of garbage into seas.</td> </tr> <tr> <td data-bbox="461 598 763 651">Removing</td> <td data-bbox="772 598 1718 651">Beach and seafloor cleanup activities, derelict fishing gear retrieval programs, marine debris monitoring.</td> </tr> <tr> <td data-bbox="461 654 763 683">Behavior-changing</td> <td data-bbox="772 654 1718 683">Educational campaigns, economic/incentive tools.</td> </tr> </tbody> </table> <p>3.1. Limits of existing instruments in addressing plastic marine litter:</p> <p>A number of limitations in existing international instruments in addressing marine litter, including their insufficient scope with respect to the main sources of plastic pollution, exemptions and lack of enforcement standards. For instance, UNCLOS acknowledges the existence of land based sources but simply requests that countries address the problem through domestic means. MARPOL Annex V exempts accidental loss of disposal of plastic resulting from damage to the ship or its equipment, as well as ships <400 GT, a category to which most of the fishing vessels belong, from recording garbage discharge operations in Garbage Record Books (GRBs). The lack of enforcement standards can be found in the terms used in the legal instruments. UNCLOS, for instance, requires only that nations “shall endeavor” to use the “best practical means” to reduce marine pollution “in accordance” with their capabilities.</p> <p>3.2. Deficiencies in the legislation and a lack of implementation and enforcement of regulations and management measures:</p> <p>The implementation and enforcement of regulations and management measures at national levels is a key component to combat marine litter. However, a number of cases below show that international initiatives have not yet been transposed into national management schemes; or where they have, there is a lack of enforcement, insufficient implementation, insufficient penalties to deter violators, or a lack of clarity in legislation leaving room for interpretation. All these represent major obstacles to the effective control of marine litter.</p> <p>3.3. Poor cooperation and insufficient participation of states in international/regional initiatives:</p> <p>Despite the fact that numerous international and regional initiatives already exist and provide a platform for cooperation and coordination of marine debris issues, a few cases indicate that cooperative action on marine litter has lagged behind, or the participation of states in these initiatives was insufficient. This would leave a loophole in the global/regional efforts, given the fact that marine debris is a trans boundary issue.</p>	Types	Examples of measures	Preventive	Source reduction (e.g. eco design), waste reuse and recycling, waste converted to energy, port reception facilities, gear marking, debris contained at points of entry into receiving waters, various land-based waste management initiatives.	Mitigating	Various debris disposal and dumping regulations, i.e. waste discharged outside certain distances from land, wastes not containing harmful substances to the marine environment allowed for discharge, prohibition of waste discharge into ecologically sensitive areas, prohibition of the disposal of certain types of garbage into seas.	Removing	Beach and seafloor cleanup activities, derelict fishing gear retrieval programs, marine debris monitoring.	Behavior-changing	Educational campaigns, economic/incentive tools.	
Types	Examples of measures											
Preventive	Source reduction (e.g. eco design), waste reuse and recycling, waste converted to energy, port reception facilities, gear marking, debris contained at points of entry into receiving waters, various land-based waste management initiatives.											
Mitigating	Various debris disposal and dumping regulations, i.e. waste discharged outside certain distances from land, wastes not containing harmful substances to the marine environment allowed for discharge, prohibition of waste discharge into ecologically sensitive areas, prohibition of the disposal of certain types of garbage into seas.											
Removing	Beach and seafloor cleanup activities, derelict fishing gear retrieval programs, marine debris monitoring.											
Behavior-changing	Educational campaigns, economic/incentive tools.											

Member States/ observer organizations	Summary of the submission	Link
	<p>3.4. Insufficient data on marine litter:</p> <p>Despite the existing schemes against marine litter, our current knowledge of the quantities and the degradation of litter in the marine environment and its potential physical and chemical impacts on marine life are scarce. Our knowledge gaps in terms of the biological consequences of micro plastics exposure, economic and social impacts of marine debris have been reported. These gaps hinder the ability to prioritize mitigation efforts and to assess the effectiveness of implementation measures.</p> <p>Recommendations:</p> <p>a) Development of a new international instrument to tackle the marine litter:</p> <p>It is the need of hour to urge the global community to develop a new multilateral agreement similar to the Montreal Protocol on Substances that Deplete the Ozone Layer. A set of elements were proposed to be included in such an agreement, including regulation of disposal of plastic litter from both ocean- and land-based sources, incorporating tracking, monitoring, reporting and enforcement standards and mechanisms, banning the most common or deleterious types of plastic litter, calling for a phase-out of all plastics that are not recycled at a rate of 75 % or higher by a certain date.</p> <p>b) Enhancing participation and cooperation of states in international/regional initiatives:</p> <p>The trans boundary nature of marine litter underlines that the problem is global in scale and international in impact. In this regard, national measures alone are insufficient to control marine debris, and international/regional cooperation is required. An empirical long-term litter monitoring study in the Southern Ocean showed that ocean-based litter monitoring needs to be integrated at an international or regional level. A wide range of international/regional initiatives on marine litter (such as UNEP RSP, GPA and GPML and various regional sea instruments)</p> <p>have established a platform for concerned states to engage in cooperation; participation and cooperation should be enhanced and strengthened both in terms of the number of participating states and the substantiality of cooperation.</p> <p>This would promote a dialogue among states on good practices in marine litter management and allow for substantial coordination and cooperation in research and developing and implementing more effective and practical management measures, such as the standardization of litter monitoring methods, the technologies for solid waste management, the waste notification system and the fee system for ship-generated waste.</p> <p>Moreover, this would help less wealthy countries to advance solid waste and sewage management through technical and financial assistance and training provided by more experienced countries and international organizations</p> <p>c) Strengthening management measures on fishing vessels:</p> <p>Although many studies suggest that fisheries are an important source of marine litter, most fishing vessels are exempt from the discharge regulations of Annex V of MARPOL 73/78 because of their low tonnage. In addition to the previous recommendations to amend Annex V to narrow exceptions, I propose two approaches based on the area where fishing vessels operate. For vessels, which work solely in national waters, management measures at national levels should be specifically devised and strengthened.</p>	
<p>Human Environmental Association for Development</p>	<p>Marine pollution has no borders nor limits, if a country coast and water is polluted, all twenty-one Mediterranean countries will pay for it. Hence a regional approach is necessary. HEAD took the initiative years ago and launched a yearly marine pollution campaign at the beginning of each summer, before hitting the Lebanese beaches.</p> <p>This year as usual, during the environmental week on May 27th, HEAD will execute 2 main objectives; awareness and on the ground cleaning of Byblos casa coast. Moreover, this year HEAD is awarded a special high support from UN Environment, “Ex-Director of Regional Representative on West Asia Dr. Iyad Abumoghli” such support is very motivating to our community, as well as the</p>	<p>https://papersmart.unon.org/resolution/uploads/position_paper_head.pdf</p>

Member States/ observer organizations	Summary of the submission	Link
	<p>engagement of the public sector, municipalities, private sector, partners, media, NGOs such as Red Cross, civil defense, schools, universities and scouts. HEAD made sure to have different sectors on board for efficient awareness with four objectives:</p> <ul style="list-style-type: none"> • Send a message to the world that the Lebanese citizens are against the establishment of coastal dump-sites along the Lebanese littoral. • Promote and motivate citizens' engagement in: <ul style="list-style-type: none"> ○ Buying less in order to dispose less in the dumpsites ○ Becoming members with companies and NGOs specialized in recycling and composting ○ Taking part in cleaning campaigns executed by the civil society ○ Being responsible while enjoying their time at the beach or at any other outdoor location ○ Being mindful of the harm that can be caused by marine litter and microplastics • Adopt and support sustainable tourism • Help municipalities to monopolize development 	
International Council of Chemical Associations	<p>Solutions to the global issue of marine litter, and more specifically plastic marine litter, must be viewed in the context of the United Nation's Sustainable Development Goals (SDGs) and the 2030 Agenda for Sustainable Development. Proposed solutions should be evaluated for their effects on the SDGs.</p> <p>Improving waste management is clearly the solution that achieves the most progress towards SDGs as noted in our response to question #2.</p> <p>Great care should be taken with some proposals to reduce plastic use that are likely to adversely impact progress towards several SDG's. This is especially relevant for food packaging, which improves food security and reduces food waste. According to the United Nation's Food and Agriculture Organization (FAO), one third of all food produced never reaches the consumer's table⁶. FAO further states that this food waste results in a greenhouse gas impact of 4.4 GtCO₂, which would rank third in terms of total greenhouse gas emissions behind only China and the United States. Reducing food waste through improved handling, logistics, and packaging of food is essential to reducing food waste and the associated greenhouse gas emissions. The role of plastic packaging in reducing food waste is an important component to be considered.</p> <p>The Virtuous Circle project⁷ is a good example of how technology innovation and single use plastics can help to address the SDGs and in particular SDG 2 (Zero Hunger), SDG 12 (Responsible Consumption and Production), and SDG 17 (Partnerships for the Goals). A mapping of the Virtuous Circle project to the SDGs provides one of many examples in which plastic and plastic packaging help to achieve the 2030 Agenda for Sustainable Development.</p> <p>As an overall guide to determining the natural capital cost of plastics and alternatives to plastics, UNEP commissioned a report in 2014 by TruCost. Valuing Plastic⁸ looked at the natural capital cost of plastic. In 2016, TruCost updated the 2014 report to include the present natural capital cost of plastic, as well as the natural capital cost of alternatives to plastic. The 2016 report, <i>Plastics and Sustainability: A Valuation of Environmental Benefits, Costs, and Opportunities for Continuous Improvement</i>⁹ found an increased natural capital cost of plastic, as well as a cost of alternatives to plastic of 3.8 times.</p> <p>The report also found that the overall environmental cost of plastic could be reduced by increasing the use of lower-carbon electricity in plastics production, adopting lower-emission transport modes, developing even more efficient plastic packaging, and increasing recycling and energy conversion of post-use plastics to help curb ocean litter and conserve resources.</p>	https://papersmart.unon.org/resolution/uploads/position_paper_i_cca.pdf

Member States/ observer organizations	Summary of the submission	Link
	Replacing plastics with alternatives, however, would have significant negative environmental impacts, including on several of the SDGs especially SDG 2 (Zero Hunger), SDG 3 (Good Health and Well-Being), SDG 6 (Clean Water and Sanitation), SDG 12 (Responsible Consumption and Production), and SDG 13 (Climate Action).	
The Women's Major group and NGO Major group, and undersigned organizations offer	<p>In the report <i>Combating Marine Plastic Litter and Microplastics: An Assessment of the Effectiveness of Relevant International, Regional and Subregional Governance Strategies and Approaches</i>, UN Environment provides a comprehensive review of existing frameworks and gaps as well as covering the potential legal and policy response options and their effectiveness, finding that “the existing global and regional legal landscape for addressing marine plastic litter and microplastics is fragmented and uneven” and to “address both the upstream and downstream impacts... would require a high level of coordination and expansion of the scope of these different instruments,” complicated by the “different levels of ratification.”^{xxiv} It concludes that “[n]o global agreement exists to specifically prevent marine plastic litter and microplastics or provide a comprehensive approach to managing the lifecycle of plastics.”^{xxv}</p> <p>Majors gaps identified in the report further include:</p> <ul style="list-style-type: none"> • No global institution with the mandate to coordinate current efforts and manage the issue upstream from the extraction of raw materials, design and use phases of plastic polymers and additives to final treatment and disposal; • A lack of harmonized binding standards at the global level for the mitigation of pollution by plastic waste, particularly from land-based sources; • A lack of global standards for national monitoring and reporting on consumption, use, final treatment and trade of plastic waste; • A lack of global industry standards for environmental controls and quality specifications of plastics; • Little recognition at the international policy level of the potential risks to human health, particularly from micro- and nanoplastics, and the application of the precautionary principle and of freedom of information in this regard; • Geographic gaps in the coverage of existing agreements, particularly on the high seas, but also with regard to internal waters and watersheds; • Gaps in the development of legally binding instruments in key regions to manage marine pollution originating from land;^{xxvi} • A fragmented approach at the regional level to waste management, including wastewater treatment. This fragmented approach extends to the national level in many countries; • Lack of data in some regions on the sources and the extent of plastics and microplastics in the marine environment, in organisms and on the associated health and ecosystem risks; • Poor application of due diligence and the polluter pays principle within the various sectors of the plastics industry; • Poor/inadequate design of products to meet air and water quality standards in order to reduce emission of microplastics from wear and tear during use of the product, as well as evaluating compliance with such standards when conducting lifecycle and environmental impact assessments; • A failure to establish sustainable and profitable end-markets for all end-of-life plastics; • A lack of effective compliance and enforcement mechanisms; • No global liability and compensation mechanism for pollution by plastic.^{xxvii} 	https://papersmart.unon.org/resolution/uploads/position_paper_joint_ngo_submission_rev1.pdf

Member States/ observer organizations	Summary of the submission	Link
	<p>The authors of the report further noted that the problem is currently escalating, and that adequate information is available to take urgent and concerted actions now. As a result, the expert group that developed this comprehensive report recommends the development of a more holistic global approach to move beyond the business-as-usual scenario and reverse the current trend of increasing volumes of plastic in the environment. In the author’s review of the potential legal and policy response options and their effectiveness, they note that “There is value in developing a new global architecture for the regulation of marine plastic litter and microplastics. This long-lasting and transboundary pollutant is not addressed under a single legally binding international instrument, but is weakly distributed amongst many”.^{xxviii} Such an approach “not only provides long-term legislative security at the national level, but also provides a level playing field and security for industry if all competitors are subject to the same regulations” ... and could provide “a global liability and compensation mechanism for pollution by plastic”.^{xxix} The undersigned organizations support this approach, in particular with a view to addressing the critical issue of marine plastic pollution.^{xxx}</p> <p>In that respect, we further believe the OEEG should give significant attention to examining the feasibility and effectiveness of a new legally binding global governance framework to manage the full lifecycle of plastics in order to prevent plastic pollution in the marine and other environments and to support the goals outlined in the 2030 Agenda for Sustainable Development. This framework should aim to address plastic production and consumption levels, drive national and regional action plans and programs toward a common objective, collaborating with existing multilateral agreements where appropriate, while otherwise filling the significant gaps in coverage that have been identified by UN Environment and others that have looked at this issue.^{xxxi} This new framework should be subject to periodic review mechanisms to monitor progress and enable learning, and should include a financial mechanism. The Framework could also promote the adoption of global quality standards on design and labelling with restrictions on certain polymers, additives and uses. We further believe that this should be overseen by the establishment of a new global body specific to the issue of plastics and plastic pollution more generally, without losing focus on the severe impacts on the marine environment, one that coordinates the current efforts by various institutions and harmonize approaches.^{xxxii}</p> <p>Moreover, we believe the following principles should guide identification and examination of the feasibility and effectiveness of response options, and should inform the design of any future framework:</p> <ul style="list-style-type: none"> • Health and planetary boundary. That our lifestyles and economy fit within the environment limits of the planet. That the lifecycle of the materials and products we use, from extraction and production, to end use, recycling, composting and disposal, sustain the health of the people and the planet. That the system we build and materials we use slow climate change, and reduce toxic exposure rather than accelerate them. • Prevention and precaution. That we prevent irreversible harm and transboundary pollution that arises for example through the toxic impacts of poorly sorted waste and unrecyclable plastics exports or the circulation of plastic waste through air and ocean currents. It requires to address the question at the source by limiting the use of single-use plastics and the production of plastics overall. • Equity, Equality and Environmental Justice. That human rights to life, health and to a healthy environment are upheld for all women, men, children and next generations. The longevity of plastic waste affects intergenerational equity and the transboundary nature of plastics impacts communities far from their point of production or consumption. • Waste Hierarchy and Technical Options. That waste is reduced, first and foremost. That where plastic products and packages are necessary, they are re-used, repaired, or failing that, recycled. That toxic substances are eliminated from their production. That no new incinerators are constructed, and renewable energy incentives are eliminated for burning plastics and waste, including gasification, pyrolysis, cement kilns, and other burn “waste-to-energy” facilities. False “solutions” that rely on incineration should not be disguised as recycling. 	

Member States/ observer organizations	Summary of the submission	Link
	<ul style="list-style-type: none"> • Multi-Stakeholder Participation. That supports full participation of all stakeholders and that strong community action and partnerships among citizens, workers, government, sector experts and supportive business leaders guide decisions about present and future material design, manufacturing and waste management in a transparent and equal manner. • Just Transition. Recognising there are implications for employment in a reduction in plastics production and use, there must be a commitment to a Just Transition for <i>all</i> affected workers. This should include a commitment at company, industry and governmental levels to the necessary retraining and economic investment to ensure alternative, sustainable jobs for those workers affected upstream in oil, gas and petrochemical industries and downstream throughout the plastics life cycle, including recycling and waste management. • Extended Producer Responsibility and polluter pays principle. That producers take responsibility for the full lifecycle costs and impacts of their products and packaging, and are redesigning and innovating better materials and systems. • Informed Choices of Safer Alternatives to Plastics. Research and innovative solutions as alternatives to plastics should be promoted, encouraged, and supported within the context of Sustainable Consumption and Production Pattern. 	
Plastic Soup Foundation	<ul style="list-style-type: none"> • Member States should be made responsible for their land-based contribution of plastics into the open seas, since rivers are the main source of marine litter. Clear reduction targets should be set, which can also be realised in a regional setting. • Furthermore, global trade in plastic waste should be restricted. • The international community should assist any country asking for support with implementing regulations to mitigate plastic pollution. • Environmental costs should be systematically integrated in the price of any plastic product. • Among the response options we like to mention a universal ban on (intentionally added) microplastics in consumer products, such as cosmetics. • Single-use plastics should be avoided as much as possible, like the light weight plastic bags (cf. The Montreal Mechanism). • The most problematic plastics should be phased out, being the plastics that cannot be recycled and are too toxic because of additives used. • There should be an international mechanism to regulate the investments in new plastic production facilities. • The responsibility of producers should be extended for the end-of-pipeline phase of their products, for instance by imposing deposit-schemes. • Finally, a fund for research and development should be established targeting the most problematic sources of plastic pollution, like the release of microfibers from synthetic textiles when washing. 	https://papersmart.unon.org/resolution/uploads/position_paper_psf.pdf
Tebtebba: Indigenous Peoples International Centre for Policy Research and Advocacy	<p>3.1 Where feasible, no use of plastics should be imposed. Like plastics bags to put in what to buy in the market and groceries are banned and is very doable which encourage people to use re-usable bags -. Local to national</p> <p>3.2 To farm out research endeavor for alternative biodegradable packaging materials if these are already done, production and use of biodegradable packaging materials should be mandated for all concerned, i.e. manufacturers, end users. Re-usable containers/packaging materials should be promoted. Like, changing plastics as container for drinks should be replaced by bottles. Bottles if broken can now be grinded and mixed with cement. –</p>	https://papersmart.unon.org/resolution/uploads/position_paper_tebtebba.pdf

Member States/ observer organizations	Summary of the submission	Link
	<p>3.3 There was time when there were no plastics or Styrofoam. Like in my home town, about forty years ago, people use banana stems and bamboo cups and coconut shells as bowls even during ceremonies where many people gather to eat together but now plastics and styro foams are being used. There is a need to create awareness on the problems related to plastic litters that will move people into action to revive their resource efficiency culture or to do their own solution, to such a problem.</p>	
<p>TERRE Policy Centre</p>	<ul style="list-style-type: none"> • At national, regional or at international level there should be a permanent ban on plastic manufacturing and its use. • On the bases of harmful results generated due to plastic waste, plastic should be categorised in distinct categories and only the plastic which can be recyclable, and reusable should be allowing to manufacture and use. • Plastic manufacture and use should be control at state and region level by making such policies to avoid the manufacturing of harmful plastics for the environment. • Global trade in plastic waste should be restricted. • Marketing policies can be revised to control the selling of plastic product. • To control, avoid and mitigate the use of plastic international treaty can make decision on different environmental policies. • As the plastic has made its strong position in the market just because it is user friendly and in term of cost it is very cheap customer prefers to buy it. If the cost of plastic product increase by adding the environmental taxes or the environment maintenance charges it will directly affect the customer pocket and by this the plastic purchase will be avoided in the market which can be easy to control. • As the climate change and other environment issues are discussed at international level during COP and Montreal Protocol to take the further step towards it control in term of financial, collaboration, technical and innovation. In the same manner international treaty can design the program to combat with marine litter and microplastic issues. • Research program and innovation should be made to control it. • Proper awareness amongst the people at society level by individual and government body will helpful to reduce the plastic demand at individual level. 	<p>https://papersmart.unon.org/resolution/uploads/position_paper_terec.pdf</p>

Annex III

Summary of options for improved governance strategies and approaches to combat marine plastic litter and microplastics (UNEP/AHEG/2018/1/INF/3)

	Option 1: Maintaining the status quo	Option 2: Revise and strengthen existing framework, add components to address industry	Option 3: A new global architecture with multilayered governance approach
Global umbrella mechanism	Not recommended	Yes – Voluntary	Yes – Binding (combination of legally binding and voluntary measures)
Potential implementation methods	<ul style="list-style-type: none"> Strengthen the implementation of existing instruments, including the Regional Seas programmes and relevant multilateral environmental agreements. Monitor developments under the Basel Convention that aim to further address marine plastic litter and microplastics within the scope of the Convention. 	<ul style="list-style-type: none"> Expand the mandate of an existing international body to include the coordination of existing institutions in the field of marine plastic related action. The coordination shall include: <ul style="list-style-type: none"> Building linkages between relevant instruments, e.g., the Basel Convention. Harmonizing international legal instruments and approaches in Regional Seas programmes. Promoting the implementation of the sustainable development goals, specifically SDG14. Encouraging and coordinate industry-led solutions and commitments. Strengthen and add measures specific to marine plastic litter and microplastics in Regional Seas programmes and other applicable instruments Revise e.g., the Honolulu Strategy to encourage improved implementation at the national level and agree on indicators of success. Adopt a voluntary agreement on marine plastic litter incorporating at least the following measures: <ul style="list-style-type: none"> Standardize global, regional and national reporting on production, consumption and final treatment of plastics and additives. Introduce voluntary national reduction targets. Develop/improve global industry guidelines, (e.g., for the management of polymers and additives; adoption of global labelling and certification schemes). 	<ul style="list-style-type: none"> Establish a new international legally binding architecture. In parallel, launch option 2 to take action in the interim and gain experiences that support the development of the legally binding architecture. <p><i>The legally binding architecture could be implemented in two phases:</i></p> <ul style="list-style-type: none"> Phase I: Develop voluntary measures, including: <ul style="list-style-type: none"> Introduction of self-determined national reduction targets. Development/improvement of industry-led design standards that promote recovery and recycling. Phase II: Develop a binding agreement, to include: <ul style="list-style-type: none"> Ratification/accession procedures to confirm commitment by States. An obligation to set self-determined national reduction targets. Develop and maintain national inventories on production, consumption, final treatment and trade of plastics and additives. Fixed timelines to review and improve national reduction targets. A duty to cooperate to determine global technical standards to ensure minimum environmental and quality controls by industry. A duty to cooperate to determine global industry standards for reporting, labelling and certification. Measures to regulate international trade in non-hazardous plastic waste. Compliance measures (monitoring and reporting). Legal basis set for mechanisms for: liability and compensation, funding and information sharing. Consideration of the needs of developing countries and regional differences (e.g., exemptions and extensions).