# Documentation of the Work of the United Nations Development Programme NMUN Simulation\*



National Model United Nations Washington, DC 7 – 9 November 2025

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## **United Nations Development Programme (UNDP)**

#### **Committee Staff**

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### Agenda

- 1. Minimizing and Addressing the Impacts of Ocean Acidification
- 2. Youth Engagement in Sustainable Development Goals (SDGs)

### **Resolutions adopted by the Committee**

Code	Topic	Vote (For-Against-Abstain)
UNDP/1/1	Minimizing and Addressing the Impacts of Ocean Acidification	29 in favor, 0 against, 0 abstentions
UNDP/1/2	Minimizing and Addressing the Impacts of Ocean Acidification	29 in favor, 0 against, 0 abstentions
UNDP/1/3	Minimizing and Addressing the Impacts of Ocean Acidification	29 in favor, 0 against, 0 abstentions
UNDP/1/4	Minimizing and Addressing the Impacts of Ocean Acidification	29 in favor, 0 against, 0 abstentions

### **Summary Report**

The United Nations Development Programme held its annual session to consider the following agenda items:

- 1. Minimizing and Addressing the Impacts of Ocean Acidification
- 2. Youth Engagement in Sustainable Development Goals (SDGs)

The session was attended by representatives of 29 Member States.

On Friday, the committee adopted the agenda for I and II, beginning a discussion on the topic of "Minimizing and Addressing the Impacts of Ocean Acidification." By Saturday afternoon, the Dais had received a total of 6 proposals covering a wide range of subtopics, from protecting coral reefs and mangrove ecosystems to alleviating the negative impacts of ocean acidification to creating intrastate data exchange platforms to increase multilateral partnerships and information sharing. The tone of the committee was collaborative, extraordinarily diplomatic, and productive. Delegates stayed on topic and diligently produced high-quality working papers. After receiving their feedback, four groups began the merging process based on similar thematic elements of clauses.

On Sunday, 4 draft resolutions were approved by the Dais, none of which had amendments. The committee adopted four resolutions by acclamation following the voting procedure. The resolutions addressed a wide array of issues, including promoting sustainable aquaculture and eco-tourism, implementing innovative biotechnology to enhance environmental data collection and information sharing, strategies to economic incentivization regarding lowering import taxes related to maritime travel and sea goods, improving global waste management systems, and advancing blue-carbon ecosystem restoration alongside strengthened monitoring efforts, local capacity development, youth and Indigenous engagement, and sustainable funding mechanisms. After the debate on Topic I closed, the committee heard upwards of 10 speeches on Topic II before a motion to adjourn the meeting.

**Committee:** United Nations Development Programme

Topic: Minimizing and Addressing the Impact of Ocean Acidification

The United Nations Development Programme,

Deeply conscious that the United Nations Development Programme (UNDP) draws its purpose from Article 55 of the Charter of the United Nations, which establishes a vision to create stable conditions that are necessary for international well-being, peace, and development,

Highlighting that the UNDP promotes higher standards of living, supports the eradication of poverty and other economic and social disparities, and commits itself to the cultivation of a universal respect for human rights and fundamental freedoms it may leverage its abilities of advisement, data provision, and opportunity identification to foster partnerships at different stakeholder levels as they support and advise country-led efforts to achieve the Sustainable Development Goals (SDGs),

Recalling commitments outlined in Article 4(d) of the Paris Convention that specifically call for the promotion of sustainable management practices for vital carbon sinks such as the ocean. Also, parties in this agreement noted the importance of ensuring the integrity of all ecosystems, including oceans, and the protection of biodiversity around the world,

Alarmed by the increasing rate of ocean acidification around the world,

Acknowledging that the world's oceans absorb approximately one-quarter of anthropogenic CO2 emissions, which significantly increases the impact that ocean acidification has on local and international economies,

Referencing the INVEMAR (Institute of Marine and Coastal Research)'s estimation that by the end of the 21st century, there will be a decrease of 0.017 pH/decade in the Caribbean and 0.019 in the Pacific Oceans, or put simply, acidity is projected on a steady incline,

Reviewing SDG 14.3, which calls upon Member States to minimize and address the impacts of ocean acidification,

Having studied that blue-carbon programmes are successful, cost-effective, and manageable approaches to reducing carbon emissions and general environmental pollution,

Centering the communities most impacted by the harmful effects of ocean acidification, including coastal communities, Indigenous Peoples, artisanal fishers, and small-scale aquaculture workers, and increasing the resilience of ocean resources and the communities that depend on them,

Reaffirming commitment to the implementation of the 2030 Agenda instituted in General Assembly resolution A/RES/70/1 and supporting youth engagement in the Sustainable Development Goals through entry-level positions supported by regional and national youth councils in the restoration and protection of their own coastal communities and marine biomes,

Recognizing that kelp forests and mangrove forests are disappearing rapidly due to global warming, pollution, and overgrazing, yet have the potential to offer scalable and cost-effective solutions to enhance ocean resilience for the restoration and protection of coastal regions,

*Noting with concern* the urgent need for sustainable funding mechanisms, as the UN has drawn upon its reserve accounts 5 times since July 2019, borrowing approximately \$607 million in 2024,

Signaling the importance of finding financial support through various avenues, considering that the UNDP relies entirely on voluntary contributions from Member States,

Observing ongoing research conducted by the United States Environmental Protection Agency (EPA), by recognizing the United States as a crystalline example of ways to combat this multifaceted issue through programs such as the Ocean Acidification Research and Monitoring Program and the Climate Adaptation Science Centers.

*Emphasizing* the need for international cooperation and an approach that resolves ocean acidification through a programme that stimulates research, builds educational capacity and legitimacy, focuses on ecosystem restoration, and centers communities most impacted by ocean acidification,

Guided by an approach founded on restoring marine ecosystem biodiversity that involves the local community and can be applied across nations of all kinds,

- Advises that existing Blue Carbon Initiative facilities support large-scale creation, restoration, and protection of kelp forests, mangroves, and related blue-carbon systems, the provision of technical assistance to Member States in designing, implementing, and monitoring blue-carbon projects aligned with national development plans and Nationally Determined Contributions, the promotion of equitable access to funding and technical support for developing countries, particularly Least Developed Countries (LDCs) and Small Island Developing States (SIDS), and the encouragement of the integration of blue-carbon strategies into broader climate, biodiversity, and coastal zone management policies;
- 2. Further suggests these Blue Carbon Initiative facilities organize, in collaboration with national and local authorities, the coordination of the implementation of restoration projects within affected communities and marine areas in order to alleviate damage to local environments and restore degraded coastal and marine ecosystems, empower impacted communities to lead and co-design effective, context-specific solutions, and ensure projects respect and integrate traditional and Indigenous knowledge, where applicable, and uphold environmental and social safeguards;
- 3. Invites Member States, in partnership with the private sector, Non-governmental Organizations and research institutions, to create global and regional partnerships that establish pilot kelp forest and mangrove restoration zones aimed at testing carbon sequestration, pH-buffering, and biodiversity, restore and protect essential ecosystems, such as mangroves and kelp forest, that naturally buffer the pH level, improve water quality and enhance habitat for marine species, and facilitate technology transfer and knowledge exchange regarding innovative restoration techniques, sustainable aquaculture practice, and community-based monitoring;
- 4. Supports the Global Mangrove Alliance Breakthrough as it works to halt mangrove loss, restore half of recent losses, double the protection of mangroves globally, and ensure sustainable long-term finance for all existing mangroves, and provides a framework for State and non-State actors alike to come together to achieve the target of securing over 15 million hectares of mangroves around the world by 2030;
- Welcomes the efforts of the International Partnership for Blue Carbon (IPBC) to increase international commitments to protect coastal Blue Carbon Ecosystems, improve national policies to protect coastal Blue Carbon Ecosystems, and accelerate on-the-ground implementation of Blue Carbon protection and restoration activities;
- Requests the UNDP cooperation with the Global Ocean Acidification Observing Network (GOA-ON) to expand and strengthen the GOA-ON's global ocean acidification monitoring efforts by;

- a. Supporting standardized data collection on seawater pH, carbon parameters, and blue carbon ecosystem based on the GOA-ON Data Management and Sharing Policy, along with open-access metadata templates and guidance in all official UN languages to facilitate the sharing of data and best practices,
- b. Providing grants for research, monitoring, and prevention of ocean acidification, including operation and maintenance costs, sensor replacement, training, and staffing in least developed countries (LDCs) and small island developing states (SIDS),
- Harmonizing field and laboratory methods in line with protocols developed by the Intergovernmental Oceanographic Commission of UNESCO (IOC-UNESCO) and the Global Ocean Acidification Observing Network (GOA-ON),
- d. Publishing leverages the capabilities of GOA-ON, the Global Environment Facility (GEF), and other relevant mechanisms to enhance coordination and avoid duplication of efforts;
- 7. *Establishes*, under UNDP, an adaptation of the project Pacific Early-Warning, with the possibility of replacing this model in other regions, which will:
  - a. Deploy low-cost ocean acidification and carbonate chemistry sensors on tide gauges, aquaculture facilities, and small-scale fishing vessels across participating nations,
  - Train national laboratories, universities, and coastal agencies in calibration, quality
    assurance, and data analysis, including the provision of scholarships and fellowships
    for students and early-career scientists from LDSs and SIDS,
  - c. Support the development and use of computer modeling tools to predict changes in the ocean's carbon cycle and their impact on marine organisms and ecosystems;
  - d. Collaborate with organizations such as National Estuary Programs and other estuarine and coastal initiatives to monitor changes in ocean chemistry and biological responses at the local scale;
- 8. Draws attention to the works of bodies such as the Intergovernmental Panel on Climate Change (IPCC) and the International Alliance to Combat Ocean Acidification (OA Alliance) that work to mitigate ocean acidification as a direct consequence of climate change and increase the resilience of ocean resources and the communities that depend on them to:
  - a. Prepare comprehensive and shareable assessment reports that include information about the state of scientific, technical, and socio-economic knowledge on climate change and its impacts that risk the livelihood of coastal communities, further the destruction of marine habitats, and endanger regional economies,
  - b. Ensure that such information is accessible and usable by national and local authorities, civil society, and community organizations, including through translated summaries and capacity-building workshops,
  - c. Support Member States in building and updating national and subnational ocean acidification action plans, including: integrating acidification aspects into mainstream climate, fisheries, and ocean management policies; identifying high-risk regions and vulnerable communities; prioritizing nature-based solutions and low-carbon development;

- Highly recommends prioritizing the involvement of local communities most impacted by OA through;
  - a. Strengthening the education of the youth and everyday citizens on both the short and long-term effects of ocean acidification to enable a greater number of coastal and landlocked communities to efficiently aid in the restoration of today, and the protection of tomorrow,
  - b. Ensuring that communication materials are culturally appropriate and available in local languages wherever possible;
- 10. Further recommends that national governments, in collaboration with the UNDP and relevant partners, support national capacities to respond to ocean acidification in their local communities affected by;
  - a. Creating regional and national councils or working groups that incorporate youth engagement in finding resolutions and opening the door to entry-level eco-focused jobs,
  - Funding global grants and mentorship programs that encourage community-led solutions to local challenges associated with ocean acidification, as these communities are best equipped to respond to the challenges that they face in their daily lives
  - c. Encouraging the participation of women, Indigenous People, and marginalized groups in leadership and decision-making roles related to marine resource management;
- 11. *Calls for* the integration of safeguards and resilience criteria into all projects supported under this resolution, including:
  - a. Conducting environmental and social impact assessments for large-scale restoration or infrastructure projects;
  - b. Ensuring that blue-carbon initiatives do not negatively affect food security, land tenure, or customary resource rights;
  - c. Promoting benefits such as disaster risk reduction, sustainable livelihoods, and biodiversity conservation;
- 12. *Encourages* global funding through initiatives from other UN bodies, NGOs, and all member states with the economic capacity to continue contributing to programs that promote sustainable development;
- 13. *Invites* Member States, international and regional financial institutions, and other stakeholders to contribute financially and technically to the implementation of this resolution through mechanisms such as:
  - a. The UNDP Regular Budget and voluntary contributions;
  - b. Restructured utilization and targeted deployment of the UN Volunteers programme to support ocean-related projects;
  - c. Climate-related funds, including but not limited to the Green Climate Fund and the United Nations Capital Development Fund, where eligible;
  - d. Ocean-focused funds such as the Global Fund for Coral Reefs, the Rapid Response and Assistance mechanisms of relevant institutions, and other dedicated facilities;

- e. Partnerships with organizations including the OA Alliance, the National Oceanic and Atmospheric Administration (NOAA), analogous national agencies, and other UN entities with relevant mandates;
- 14. Further implores Member States' contributions to fund and support this resolution, which would ensure effective implementation of immediate and future actions from international organizations, member states, local organizations, and other financing groups, such as the usage of the Regular Budget and Voluntary Contributions, and the restructured utilization of the UN Volunteers program;
- 15. Asks that the utilization of various funds directed toward the resolution of climate initiatives related to the topic of ocean acidification, specifically those that focused on long-term climate goals such as The Green Climate Fund and the United Nations Capital Development Fund; Funds that target the effects of climate change on the oceans of the world such as the Global Fund for Coral Reefs and The Rapid Assistance Fund from the World Resources Institute; Additionally, the organizations such as the OA Alliance and UN member states, and the National Oceanic and Atmospheric Administration;
- 16. Calls upon all Member States and relevant stakeholders to cooperate in a spirit of solidarity to ensure that actions to address ocean acidification contribute to equitable and sustainable development for present and future generations.

Committee: United Nations Development Programme

**Topic:** Minimizing and Addressing the Impacts of Ocean Acidification

The United Nations Development Programme,

Alarmed by the rising levels of carbon dioxide (CO2) and the decreasing pH levels of our oceans,

*Emphasizing* the role of minimizing the effects that ocean acidification plays in achieving Sustainable Development Goals (SDG) 13, Climate Action, 14, Life Below Water, and 15, Life on Land.

Having considered the urgency of our planet's ecosystem deteriorating,

Approving of the action plan and efforts put forward by the Paris Agreement, which over 194 Member States agreed to adopt,

Acknowledges that ocean acidification affects both Coastal Countries and landlocked countries that lack the financial and technological capacity as well as resources, affecting the full implementation of climate and environmental programs,

Recognizing the Progressive Ocean and Carbon Minimization Initiative (POCMI) as a first-of-its-kind effort under the United Nations Development Programme (UNDP) to advance scalable carbon-neutral technologies, and noting its similarity to the Carbon to Sea Initiative in promoting ocean alkalinity enhancement to address acidification,

Taking into account that 83% of the global carbon cycle is circulated through the ocean,

Keeping in mind that storm water and nutrient run off threaten fresh water sources, posing risks to agriculture and livelihoods,

Conscious of the role that mangroves, wetlands, and salt marshes have in minimizing ocean acidification as essential natural carbon sinks,

*Deeply disturbed* by deforestation, air pollution, and waste management issues that continue to strain local ecosystems, including the destruction of marine life,

Alarmed that mangroves are being lost at a rate of 2% per year,

Guided by the work of non-government organizations (NGOs), such as Wetlands International and Wildcoast, to minimize the effects of ocean acidification within regional frameworks,

Concerned with the threat that ocean acidification poses to housing and significant regional food systems,

Aware that 71.7% of all CO2 emissions from the European Union (EU) are a result of road transportation,

Taking note that 80% of the world's electricity comes from fossil fuels,

Considering the incentive of tax credits modeled by other Member States' tax credits for electric vehicles,

Taking into account that electric vehicles only make up 20% of all vehicles,

Recalling the efforts made through research and monitoring the ocean's chemistry in Europe, the Caribbean, and the Western Indian Ocean by the International Alliance to Combat Ocean Acidification (OA) for the purpose of lowering CO2 emissions and promoting scientific understanding.

Guided by the European Marine Observation and Data Network (EMOD-Net) in collecting and providing access to marine data,

*Understanding* that least developed countries (LDCs) and small island developing states (SIDS) require more access to climate financing through collaboration with international institutions to create more inclusive domestic solutions to ocean acidification.

Appreciating the continued contributions of the International Monetary Fund (IMF) and World Bank (WB) toward capacity building, crisis response, and climate finance,

Noting with appreciation past partnerships between member states and the International Criminal Police Organization (INTERPOL) to implement a domestic monitoring network for gene editing resources and ensuring the safe marine release of bioengineered organisms for marine adaptation initiatives.

Acknowledging UNDP's existing partnership with INTERPOL to prevent environmental crime through the safe implementation of marine adaptation initiatives and gene editing resource networks,

- 1. *Proposes* the construction of POCMI under the purview of the UNDP with the voluntary support of Member States which is designed to implement new, scalable, and trackable technologies, in order to:
  - a. Encourage the creation of the UNDP Data Exchange Platform (UDEP), a global open data network that would make accessible and shareable information uploaded to mirrored EMOD-Nets, facilitating collaboration and data-sharing among nations;
  - Support the multilateral partnership through existing regional organizations to increase the involvement of landlocked states in data collection, to provide information such as wind movement and inland seas;
- 2. Supporting the development of a network mirroring the EMOD-Net under the UNDP to monitor pH levels by regional organizations such as the African Union (AU) and the Association of South East Asian Nations (ASEAN), among multilateral partners to support data sharing and collection processes such as:
  - a. Implementing alkaline readers through POCMI in each ocean by 2040;
  - b. Incentivizing improvement and implementation of the readers through the encouragement of lowering import taxes on businesses and goods related to maritime travel and sea goods;
- 3. *Promoting* data dissemination among policymakers in government and NGOs to engage local communities through consultation to work on adopting effective best practices to mitigate and adapt to ocean acidification via:
  - a. Engaging through local forums created by UNDP involving local government officials, NGOs, and Member States to discuss concerns of community members and encourage the development of policy by governments and NGOs based on best practices and community concerns to mitigate the effects of ocean acidification;
  - b. Providing consistent and continuous updates to communities about the effects of

- ocean acidification through the development of a social media campaign in coordination with existing groups such as the Ocean Conservancy and National Oceanic and Atmospheric Administration;
- c. Informing policymakers in government and NGOs with up-to-date data from the proposed UDEP to help guide policymaking in relation to ocean acidification, through seminars and meetings with scientists, and promote the sharing of findings on local marine ecosystems between member states to create transparency in research, due to the rapidly changing information on ocean acidification;
- 4. Supports the development of a public education and awareness campaign with the United Nations Department of Global Communications (UNDGC) to promote conservation and responsible energy uses via:
  - a. Publishes quarterly reports and updates on UN databases regarding progress on ocean acidification as aligned with SDGs 14 and 15;
  - b. Considering cross-border cooperation through programs, such as the Central Asia Water and Energy Program (CAWEP), to continue shared goals and data sharing amongst regions;
- 5. Suggests UNDP partner with NGOs such as INTERPOL to create, implement, and monitor a global ocean acidification biotechnology monitoring network to ensure the safe utilization of genetic resources for mitigating the effects of ocean acidification, mirroring the Nigerian National Biosafety and Security Agency's (NBMA) past initiatives;
- 6. *Implementing* security measures to protect technology collecting and platforms hosting data which could indicate violations of Member States' environmental protection laws by criminal actors and improve the accuracy of published information:
  - a. Working with the United Nations Department of Safety and Security (UNDSS) to provide cybersecurity to POCMI and EMOD-NET Alkaline readers and ensure correct reading and transmission of data, as well as provide protection to the proposed UDEP;
  - b. Increasing collaboration with universities and other research institutions to peer review research on ocean acidification;
- 7. Encourages restoration and protection of coastal vegetation such as mangroves, kelp, and salt marshes through:
  - a. Partnering with NGOs such as Wetlands International and Wildcoast to collaborate on capacity building workshops with local communities and Member State governments, drawing inspiration from projects such as Wetlands International's current mangrove restoration;
  - b. Asking for a partnership with Mangrove Alliance for Climate (MAC) to research and educate through the local, national, regional climate change program, and the restoration of mangrove trees through the Blue Carbon Initiatives program;
  - c. Requesting a partnership and offering support to the NGO, Wildcoast, specifically in their work with local communities to offer protection of existing coastal wetlands and mangroves in some Member States, and expanding this work to other Member States;

- 8. *Invites* Member States to adopt measurable commitments, including a 20% reduction in national CO2 emissions by 2035 via:
  - a. Requesting the partnership with NGOs, Renewable World and Gigawatt Global's initiative to help develop more renewable energy by helping them expand to other Member States, specifically developing Member States, to help build more solar, tidal, and wind energy projects aimed at replacing coal and diesel-based power generation;
  - b. Encouraging more developed Member States to move towards renewable and nuclear energy modeling other Member States with lower carbon emissions;
  - c. Encouraging Member States to motivate the usage of electric vehicles that utilize low carbon energy through tax credits, for electric vehicle users and taxing diesel and gasoline vehicles more heavily;
- 9. Recommends the UNDP to utilize key initiatives of the Paris Agreement Article 6 Carbon Market framework, specifically section 6.2, to upscale climate financing such as Economic Diversification Grants (EDGs), debt-for-nature swaps, and blue bonds with a focus on benefiting LDCs and SIDS to build the capacity of the global south to implement more sustainable development solutions to reduce carbon emissions, the root cause of ocean acidification;
- 10. Suggests the UNDP partner with other UN bodies such as the IMF and the WB to continue public-private partnerships (PPPs) such as Carbon Payments for Development (CP4D) to encourage collaborative climate financing in the private sector to:
  - a. Educate actors in the private sector on developing initiatives to minimize the impacts of ocean acidification through tailored workshops through regional corporate organizations aimed at building private sector capacity to implement initiatives that minimize carbon emissions;
  - b. Support the sustainable and voluntary development of inland water and ocean acidification data infrastructure for private actors in developing countries through regional monitoring networks like the Global Ocean Acidification Network (GOA-ON) and the Ocean Carbon and Acidification Data Systems (OCADS);
- 11. Promotes increased Member State participation in the OA to endorse regional cooperation towards mutually beneficial ocean preservation projects and policy implementation, including:
  - a. Recommending all members to grant nature legal rights, such as Rights of Nature Constitutional Court Ruling and Practice Customary International law;
  - Recognizing ecosystems (rivers, forests, coral reefs) as legal persons with the right to exist, flourish and regenerate, under Constitutional Court Ruling or legal frameworks allowing these natural entities to be protected or represented in Courts by Guardians or Trustees;
- 12. *Endorses* the call that Member States adopt legislation regulating the type of plastics and fertilizers utilized by the private sector on coastal fronts, as well as developing infrastructure in developing countries, with the goal of implementing financial incentives towards the

reduction of private sector pollution.

**Committee:** United Nations Development Programme

**Topic:** Minimizing and Addressing the Impacts of Ocean Acidification

The United Nations Development Programme,

Realizing ocean acidification is driven by carbon emissions and is transforming seawater chemistry 10 times faster than we've seen in the past 50 million years,

Fully aware that addressing ocean acidification requires holistic policy integration to bridge climate, energy, and marine resource management within a unified global framework,

Reaffirming the Paris Agreement (2015) and the United Nations Development Programme (UNDP)'s Ocean Promise (2022), which encourage the protection of marine biodiversity and the strengthening of coastal economies through collective action to limit global temperatures from rising by 1.5°C,

Recalling the 2030 Agenda for Sustainable Development, particularly the Sustainable Development Goals (SDGs) Climate Action (SDG 13), Life Below Water (SDG 14), and Decent Work (SDG 8), calling for urgent action to combat ocean acidification, which disproportionately influences coastal livelihoods of millions worldwide,

Addressing the rise in ocean acidification as evidenced by the Intergovernmental Panel on Climate Change (IPCC) reports indicating an increase in ocean acidity by nearly 30% as the ocean continues to act as a carbon sink for increasing greenhouse gas (GHG) emissions,

Noting with appreciation ongoing international research collaborations in carbon recycling and hydrogen based fuels, including efforts by the International Renewable Energy Agency (IRENA) and the Clean Energy Ministerial,

Acknowledging the potential of syngas technology as a promoter of circular economies and as a transitional energy source that can reduce CO<sub>2</sub> emissions by converting biomass, organic waste, or captured carbon into usable clean fuel,

Having considered the expansion of renewable energy technologies, especially solar energy, which is abundant in the developing countries, as in the Decade of Ocean Science for Sustainable Development 2030,

*Understanding* that while previous frameworks and networks, such as the Global Ocean Acidification Observing Network (GOA-ON), have been particularly instrumental in data collection, they have had deficiencies in monitoring and data sharing networks,

Recognizing with enthusiasm the potential for present-day advances in technological development in aiding and assisting with the redress of ocean acidification and anthropogenic climate change, with specific emphasis on technologies developed by NGOs,

Taking into consideration the critical need for skill development, employment opportunities, and scientific research to support the transition toward sustainable and resilient blue economies, in alignment with frameworks such as the UNDP Ocean Promise,

*Mindful of* the growing importance of Blue Bonds and Blue Economy Investment Frameworks exemplified by successful regional initiatives such as the Pacific Blue Credit Exchange in fostering collective resilience, innovation, and sustainable growth in the global market,

Alarmed by the insufficient financial and technical support dedicated to developing sustainable models that mitigate ocean acidification's disproportionate impact on Least Developed Countries (LDCs) and Small Island Developing States (SIDS), where coastal livelihoods and food security are deeply dependent on healthy marine ecosystems,

Viewing with appreciation the progress made by existing regional and state-level environmental credit transfer systems, including the National Emissions Certificate Act and the European Union Emissions Trading System (EU ETS), as well as the Cap and Trade Program, which collectively demonstrate effective market-based mechanisms for reducing global carbon emissions and promoting cleaner industry practices,

Taking into account existing ocean acidification monitoring programs, most especially those of the Baltic Sea Acidification Mitigation Program, the National Ocean Acidification Monitoring Network, the National Institute of Fisheries and Science, and the Research Network of Marine-Coastal Stressors in the Community of Latin American and Caribbean States (CELAC), in providing information and regional data on acidification rates and statistics,

Welcoming the successes of policy coordination and research institutes, including those of the Stockholm International Water Institute (SIWI) and the efforts of educational institutions in raising awareness within the general public and national governments about the issue of ocean acidification,

- 1. Requests Member States to report their progress on Blue Economy implementation at the UN High-Level Political Forum (HLPF) and UN Ocean Conference, ensuring alignment with:
  - a. The 2030 Agenda for Sustainable Development;
  - b. The Paris Agreement's Nationally Determined Contributions (NDCs);
  - c. The Global Biodiversity Framework and 2030 Decade of Ocean Science for Sustainable Development;
  - d. Regional ocean governance frameworks such as the Pacific Islands Regional Ocean Policy and the European Union (EU) Blue Economy Strategy;
- 2. Strongly urges all Member States to remember the role plastic pollution plays in ocean acidification and work to ameliorate this problem by:
  - a. Continuing to cooperate with and help the Ocean Cleanup Project to meet their goal of removing 90% of floating ocean plastics by 2040;
  - b. Considering the adoption of national policies that discourage the widespread use of disposable plastics;
  - c. Continuing to negotiate a legally binding Treaty to End Plastic Pollution and committing to finishing this Treaty by the end of 2026;
  - d. Organizing and funding (via the World Bank) large scale clean up operations to remove waste from oceanic and coastal environments most affected by pollution;
- 3. Calls for further action towards programs that focus on the protection and restoration of coral reefs to restore the impact that ocean acidification has had on marine ecosystems by supporting the Commonwealth Blue Charter program, focusing on the Action Groups for Ocean Acidification, Coral Reef Protection and Restoration, and Ocean and Climate Change;

- 4. Solemnly affirms expanding on the International Partnership for Blue Carbon through collaboration with willing member states to develop and protect coral reef and mangrove ecosystems to mitigate causes of ocean acidification;
- 5. Encourages member states to continue their commitment to the Paris Agreement (2015) and the Ocean Promise (2022), which brings together multiple actors to craft creative solutions to conserve ocean environments and establish a global sustainable blue economy, aligning with SDG 14, through:
  - a. The formation of a CO2 Advisory Council with a target goal of reducing carbon emissions by 20% by 2030;
  - b. An update to existing Nationally Determined Contributions (NDC) for aggressive goals
    in reducing greenhouse gas emissions beyond those initially agreed in the Paris
    Agreement, without constraining the flexibility of developing Member States;
  - c. Mobilize financial resources, such as the Green Climate Fund, to advance SDG 14 and developing nations;
  - 6. Calls upon Member States to integrate carbon reduction clauses into national environmental legislation, ensuring measurable decreases in CO2 emissions consistent with NDCs:
- 7. Endorses zero-carbon emissions domestically to lessen shipping emissions, expand renewable energy at ports, and protect blue carbon ecosystems like mangroves, seagrasses, and salt marshes;
- 8. Supports Member States' initiatives to send annual shipping emission reports to the United Nations Framework Convention on Climate Change (UNFCCC) to be reviewed, as well as make efforts to research existing ways and means Member States can implement renewable energy, within their financial limits;
- Also calls for the development of a Syngas Technology Roadmap (STR) that provides Member States with technical guidance and regional consultations coordinated by the United Nations Industrial Development Organization (UNIDO) and IRENA in partnership with development banks and member states;
- 10. Expresses hope to minimize the impact of carbon intensity through integration of Carbon Capture and Storage (CCS) to ensure net negative emissions and deployment of renewable-powered gasification (solar, wind, or geothermal) to minimize lifecycle carbon intensity;
- 11. Suggests pilot syngas demonstration projects for developing and Small Island Developing States (SIDS) supported by technology transfer and training workshops by this committee and partner universities;
- 12. Advises Member States to establish national advisory committees with participation from NGOs, academic institutions, and private enterprises to verify emission reductions and energy efficiency benchmarks;
  - a. Monitoring industrial energy use, building performance standards, and renewable integration metrics, modeled after initiatives like the International Energy Agency's Energy Efficiency Policy Toolkit;
  - b. Arranging frequent updates to energy resources to assist with new information

and technology to ease the transition towards renewable energy;

- c. Establishing appropriate cost-effectiveness tests for a portfolio of programs to reflect the long-term benefits of energy efficiency;
- 13. Further requests transparency through annual reporting to the United Nations Environmental Programme Finance Initiative (UNEP FI) on proposed blue bonds, aligning with the UN Sustainable Development Goals, particularly SDG 13 and SDG 14;
- 14. Recommends this committee establish the Global Ocean Acidification Monitoring Expansion Experts Group (GOAMEG) to build upon the GOA-ON and regional projects, such as the Building Capacity in Ocean Acidification Monitoring in the Gulf of Guinea initiative, by adding a monitoring network, which will include:
  - a. Subject matter experts to study, discuss, and provide recommendations for the expansion of ocean acidification monitoring networks to under-resourced regions;
  - b. A special focus on Dissolved Inorganic Carbon (DIC);
  - c. Integrating monitoring systems of pH, carbon chemistry, and ecosystem health;
  - d. Designate and manage Marine Protected Areas (MPAs) in acidification "hotspots";
- 15. *Urges* this committee to collaborate with national governments, education systems, and marine research institutions to develop and expand biotechnology in coastal countries;
- 16. Calls for this committee to conduct additional technical studies in collaboration with national governments, especially Member States with vulnerable coastlines, to develop new ocean acidification monitoring programs to generate additional data on regional ocean acidification developments;
- 17. *Insists on* adapting and establishing the frameworks created by NGOs in partnership with Member States to establish new technology that combines existing deacidification and desalination technology to lower the cost of entry and create more worthwhile incentives for LDCs in addressing ocean acidification;
- 18. *Invites* Member States and regional organizations to establish more robust environmental credit trading systems targeted at reducing carbon emissions by large firms over a set case-by-case threshold to be determined by GOAMEG to:
  - a. Link Blue Bonds and Carbon Credits under a joint accountability framework, ensuring measurable reductions in global CO<sub>2</sub> and ocean acidification;
  - b. Serve as a global repository of verified blue carbon credits and bond-funded project results;
- 19. Further invites financing sustainable aquaculture, eco-tourism, biotechnology, and coral restoration using Blue Bonds and private-sector engagement through the UNDP Blue Finance Framework by:

- a. Promoting partnerships with research institutions to ensure the benefits of blue economy projects for other coastal nations and encouraging educational programs for developing countries, so that they can expand technologies capable of reducing CO2;
- b. Calling for monitoring these investments, ensuring alignment with the Sustainable Development Goals (SDGs) and the objectives of the Decade of Ocean Science for Sustainable Development (2021-2030);
- c. Strongly affirming General Assembly 5 to implement a Global Ocean Fund, working in collaboration with the UN's One Ocean Finance, that would help LDCs mitigate the effects of ocean acidification;
- d. Reminding Member States and regional organizations regarding the United Nations Framework Convention on Climate Change (UNFCC) 1992, which encourages developed nations to;
- e. Assuming responsibility for producing the majority of GHG emissions and subsequently allocating monetary aid for Least Developed Countries (LDCs) and Small Island Developing States (SIDS), which are disproportionately affected by ocean acidification;
- 20. *Emphasizes* Blue Bonds to be structured in alignment with Environmental, Social, and Governance standards under the EU Taxonomy for Sustainable Finance and the UN Sustainable Blue Economy Finance Principles, ensuring:
  - a. Accountability through third-party verification and annual sustainability reporting;
    - b. Inclusion of coastal community benefits like job creation, youth entrepreneurship, and education in marine conservation;
    - c. Prioritization of projects that yield dual benefits for climate mitigation and ocean health;
    - d. Prevention of "greenwashing" by requiring measurable impact indicators for all funded projects;
  - e. Provision of guidelines for transparency, impact assessment, and equitable investment;
- 21. Trusts the UNEP and United Nations Environmental Assembly (UNEA), by drawing upon expertise from within the Coastal Zone Management System (CZMS), to broaden partnerships with private universities and colleges, as well as public, state-funded universities and colleges alongside national governments, to implement education programs:
  - a. Similar to those offered by the University of Bergen and the Western Norway University of Applied Sciences;
  - b. On ocean science, marine life, sustainable harvesting, and policymaking;
  - c. To equip future generations with expert knowledge to contribute to sustainable ocean based solutions;
  - d. And the establishment of Blue Economy Training Centers in partnership with maritime universities to educate youth on sustainable fisheries, renewable energy, and marine

innovation;

- 22. Welcomes this committee to expand youth civic engagement through volunteer events and lectures that promote water acidification solutions and raise awareness with collaboration from universities;
- 23. Further recommends the creation of a Global Ocean Literacy Platform (GOLP), coordinated by UNESCO's Intergovernmental Oceanographic Commission (IOC), to facilitate open access to scientific data, educational materials, and multilingual resources on ocean acidification for schools, universities, and research institutions worldwide;
- 24. Further encourages this committee to establish the Global Ocean Acidification Monitoring Expansion Experts Group (GOAMEG) to build upon the GOA-ON initiative by adding a monitoring network that will include subject matter experts and Member States to:
  - a. Study, discuss, and provide recommendations for the expansion of ocean acidification monitoring;
  - b. Add networks to under-resourced regions, with a special focus on Dissolved Inorganic Carbon (DIC);
  - c. Build capacity in ocean acidification monitoring through expanded interagency task forces and data partnerships among regional monitoring networks;
- 25. *Trusts* this committee to conduct additional technical studies in collaboration with national governments and regional research hubs and marine institutes, especially with Member States with vulnerable coastlines, to create new ocean acidification monitoring programs for additional data on regional ocean acidification developments for:
  - a. Collaboration with national governments and marine research institutions to develop and expand biotechnology in coastal countries;
  - b. The hosting of annual Ocean Science Youth Forums, allowing students and early career researchers to present findings, exchange ideas, and engage directly with policymakers to bridge the gap between scientific research and policy implementation;
  - 26. Stresses the importance of educational programmes and public campaigns such as the Youth for Blue Oceans Initiative, Back to Blue, and the Ocean Acidification Program's International Day of Action aimed to increase the understanding of the environmental and socio-economic impacts of acidification, as well as to foster sustainable fisheries development and consumption practices;
- 27. *Encouraging* educational programmes and public campaigns aimed at increasing the understanding of the environmental and socio-economic impacts of acidification, as well as to foster sustainable fisheries development and consumption practices;
- 28. Advocates for initiatives in developing countries to strengthen local knowledge and institutional frameworks, so capacity building programmes in the Global South to assure an inclusive ecological transition;
- 29. Authorizes crucial partnerships between European institutions and countries in the developing Global South to exchange innovative technologies and best practices to enhance ocean conditions;

30. Reminds Member States to collaborate with international media, technology companies, and scientific organizations through social media educational programs similar to UNEP's Earth School, which teaches teachers and children about the natural world and information sharing programs to develop interactive digital tools, documentaries, and virtual learning modules illustrating the social, economic, and environmental impacts of ocean acidification.

**Committee:** The United Nations Development Program

**Topic:** Minimizing and Addressing the Impacts of Ocean Acidification

#### The United Nations Development Programme

Noting the Intergovernmental Panel on Climate Change's study on greenhouse gas emissions from waste, which suggests that potent greenhouse gas, methane, emitted from landfills and wastewater, accounts for approximately 18 per cent of human-caused methane emissions globally and about three per cent of total greenhouse gases,

Noting further the global lowering of the ocean's pH levels caused by mass absorption of  $CO_2$ , also known as ocean acidification, with the Intergovernmental Panel on Climate Change projecting a further pH decline of 0.3 to 0.4 units by 2100 if current  $CO_2$  emissions persist,

Conscious of the effect of many types of waste on the chemical composition of our oceans, including but not limited to nutrient-rich waste like fertilizer, organic waste, and sewage, chemical and industrial waste, and microplastics,

Seeking to minimize the amount of plastic, organic, and chemical waste, industrial discharge, and fertilizer runoff that reaches the ocean,

*Underlining* the United Nations Environmental Programme's figure that the waste sector makes up 20% of all anthropogenic methane emissions,

Believing that significant management of waste, such as recycling and conscientious disposal of garbage, can significantly decrease CO<sub>2</sub> emissions and limit the further decline of the ocean's pH,

*Taking into account* the Recycling Partnership's study that waste management education leads to a 50% in participation.

*Drawing on* General Assembly resolution 76/205 on Protection of global climate for present and future generations of humankind, General Assembly resolution 77/161 on Promoting zero-waste initiatives to advance the 2030 Agenda for Sustainable Development, and General Assembly resolution 76/202 on Promoting sustainable consumption and production patterns for the implementation of the 2030 Agenda for Sustainable Development,

Guided by the Sustainable Goals for Development, particularly SDG Goal 12 (Ensuring sustainable consumption and production patterns), and SDG Goal 14 (Conservation and sustainable use of the oceans, seas, and marine resources),

Concerned by the significant disparities in infrastructure development between developed and developing states, which significantly contribute to pollution and greenhouse gas emissions,

*Gravely concerned with* the current standard for garbage disposal at a civilian level in developing countries, as "over 90% of Africa's waste is disposed of at uncontrolled dumpsites and landfills, which are often followed by open burning".

*Taking into consideration* that rural towns outside of city limits might not have access to mass incineration centers initially, keeping them from participating in proper trash handling,

Acknowledging that a typical passenger vehicle emits about 4.6 metric tons of carbon dioxide per year

Acknowledging that "vehicle electrification is a key strategy for climate action. Transportation accounts for 28% of greenhouse gas emissions, and we need to reduce those to limit future climate impacts such as flooding, wildfires, and drought events...",

Aware of the fact that by 2030, the total number of recoverable materials from end-of-use solar panels worldwide is \$450 million, enough to fund 60 million panels, but these panels could be used in recycling efforts instead of ending up in a landfill,

*Recognizing* that storm water and nutrients run off threaten fresh water sources, posing risks to agriculture and livelihoods,

*Drawing attention to* a 2024 study by Science Direct, which proves that habitat suitability increased and a positive decrease in CO2 emission mitigation occurred during COVID-19 lockdowns, hinting at the appropriate focus on present action rather than absorption focus,

- 1. Calls on the UNDP to establish and implement a Bridging Access to Sustainable Infrastructure and Clean Energy, or BASIC, program, which shall encompass the following:
  - a. Assist in developing and implementing specific waste management policies and waste disposal systems, such as:
    - i. Specific and methodical refuse sorting to the best of a Member State's ability, and their support for their individual civilians to participate in these efforts,
    - ii. Prioritizing the building of mass incineration centers and other sustainable waste disposal systems in cities within developing countries based on their present technological and physical infrastructure,
    - iii. The additional investment in designated trash collecting systems for rural towns and villages, such as involving pick-up trucks and other means,
    - iv. The incorporation of carbon capture technology and storage through geological formations to mitigate the carbon dioxide emitted, along with other harmful pollutants, into the atmosphere, blocking further damage;
  - b. Assisting and making recommendations in the creation of a waste management education program, with this education program encompassing the following:
    - Educating individuals about the issues that contribute to ocean acidification, including:
      - 1. Breakdown of plastic materials and organic waste
      - 2. Fertilizer run off from agriculture
      - 3. And the disposal of sewage into waterways
    - Providing sustainable solutions to these issues, such as sorting trash, creating compost from food waste, and reducing the use of plastic whenever possible,
    - iii. Utilize funding from this waste management education program to provide and distribute soil testing kits, recycling bins, and compost containers for individual civilians;
  - c. Assist in the establishment and development of a coalition for clean infrastructure initiative that would:
    - i. Encompass the establishment of an organization that could combine and expand upon the efforts of organizations and initiatives, such as the Greener Cities Partnership, International Coalition for Sustainable Infrastructure,

Coalition for Disaster Resilient Infrastructure, and other similar organizations,

- ii. Accept the expertise, technology, and resources of developing states, their institutions, and other relevant stakeholders, and task it to developing states, regional organizations, and local governments in developing clean infrastructure, with the consent of both parties,
- iii. Be funded by a combination of voluntary Member State contributions, funding from the UNDP, and donations from NGOs, including but not limited to the Bill and Melinda Gates Foundation, World Resources Institute, the Shell Foundation, and others,
- d. Be funded and overseen by the UNDP with contributions from participating member-states;
- 2. Recommends that Member States, through the Clean Infrastructure Initiative, increase or develop solar-powered electric transportation and infrastructure in developing states, through such programs as:
  - a. Integrating solar-powered transport into broader climate adaptation frameworks that can adapt to environmental changes, particularly for communities vulnerable to energy poverty, and can lead to ocean acidification issues,
  - The recycling of solar panels, which not only conserves valuable resources but also reduces landfill use, thereby promoting both environmental sustainability and circular economy practices,
  - The rewarding of companies and individuals by Member States who take the initiative to recycle clean energy technologies, particularly solar panels at the end of their life, through financial mechanisms such as blue bonds, tax incentives, and preferential access to sustainability-linked financing;
- 3. Endorses the UNDP's partnership with NGOs that focus on preventing ocean acidification and help to provide technology like the GOA-ON to facilitate cheap and widespread tracking of global ocean acidification;
- 4. *Encourages* member states to implement stricter regulations on the use of harmful fertilizers in coastal communities to prevent pollution in local waterways.