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## **Subsidiary Body for Scientific and Technological Advice**

### **Fifty-ninth session**

United Arab Emirates, 30 November to 6 December 2023

Item 4(a) of the provisional agenda

**Warsaw International Mechanism for Loss and Damage  
associated with Climate Change Impacts**

**Report of the Executive Committee of the Warsaw**

**International Mechanism for Loss and Damage**

**associated with Climate Change Impacts**

## **Subsidiary Body for Implementation**

### **Fifty-ninth session**

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Item 13(a) of the provisional agenda

**Warsaw International Mechanism for Loss and  
Damage associated with Climate Change Impacts  
Report of the Executive Committee of the Warsaw**

**International Mechanism for Loss and Damage  
associated with Climate Change Impacts**

## **Report of the Executive Committee of the Warsaw International Mechanism for Loss and Damage associated with Climate Change Impacts**

### **Addendum**

#### *Summary*

This report contains a summary of seven progress reports received between 20 September 2022 and 11 September 2023 pursuant to the provisions of decision 2/CMA.2 (noted in decision 2/CP.25) relevant to the Santiago network for averting, minimizing and addressing loss and damage associated with the adverse effects of climate change. The progress reports show that technical assistance was provided in the areas of risk mapping, assessments and analysis; early warning systems; anticipatory action; risk finance, insurance schemes and contingency measures; policy frameworks and plans; and infrastructure resilience and rehabilitation.



## Abbreviations and acronyms

CMA	Conference of the Parties serving as the meeting of the Parties to the Paris Agreement
CREWS	Climate Risk and Early Warning Systems
FAO	Food and Agriculture Organization of the United Nations
GCF	Green Climate Fund
IOM	International Organization for Migration
NDC	nationally determined contribution
OCHA	Office for the Coordination of Humanitarian Affairs
SDG	Sustainable Development Goal
UNDRR	United Nations Office for Disaster Risk Reduction
UNOPS	United Nations Office for Project Services
WIM	Warsaw International Mechanism for Loss and Damage associated with Climate Change Impacts
WMO	World Meteorological Organization

## **I. Introduction**

### **A. Mandate**

1. CMA 2 established, as part of the WIM, the Santiago network for averting, minimizing and addressing loss and damage associated with the adverse effects of climate change to catalyse technical assistance for implementing relevant approaches at the local, national and regional level in developing countries that are particularly vulnerable to the adverse effects of climate change.<sup>1</sup> CMA 2 invited relevant organizations, bodies, networks and experts engaged in providing this technical assistance to report on their progress to the WIM Executive Committee<sup>2</sup> and requested the Committee to include relevant information in its annual reports.<sup>3</sup>

### **B. Scope of the report**

2. This report summarizes the information contained in the seven progress reports submitted between 20 September 2022 and 11 September 2023 in response to decision 2/CMA.2, paragraph 44.<sup>4</sup>

## **II. Summary of progress reports**

### **A. Overview**

3. Progress reports were received from FAO, IOM, OCHA, UNDRR, UNOPS, WMO on behalf of CREWS and WTW.

4. The reports contain information on planned and implemented initiatives and activities under a wide range of thematic areas aimed at providing technical assistance to developing countries for averting, minimizing and addressing loss and damage associated with the adverse effects of climate change.

5. In terms of developing countries to which technical assistance was provided, all seven reports contain information on countries (in the form of a comprehensive list, number of countries supported or selected examples) where the reported technical assistance was provided, is being provided or is planned. The assistance was provided at all levels: global, regional, national, subnational and community.

6. With regard to the involvement of and collaboration among stakeholders at the local, subnational, national, regional and international level, most reports include details of partnerships and stakeholder participation in the provision of reported technical assistance, including with regard to the participation of local governments, civil society actors and affected communities.

7. Some reports contain information on challenges experienced in providing technical assistance, which predominantly relate to limited funding for providing technical assistance, limiting eligibility criteria for some financial mechanisms and lengthy time frames for accessing support, and to enhancing access to available sources of climate finance, noting the importance of sustainable and predictable finance for averting, minimizing and addressing loss and damage. The reports also mention data gaps; methodological challenges, including in the context of isolating climate change as a driver of human mobility; limited capacities

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<sup>1</sup> Decision 2/CMA.2, para. 43.

<sup>2</sup> Decision 2/CMA.2, paras. 44–45.

<sup>3</sup> The information to be provided is elaborated in decision 19/CMA.3, para. 6.

<sup>4</sup> The reports are available at <https://unfccc.int/wim-excom/SNreports2023>.

of national and subnational stakeholders for determining capacity-building needs; and institutional challenges in the context of strengthening early warning systems.

8. All reports contain information on ways in which developing countries that are interested in benefiting from the technical assistance described in the reports may access the technical assistance available to them. All reports promote a needs-based approach informed by the countries seeking support, highlighting the importance of developing countries contacting the relevant organization, body or network to express interest in receiving technical assistance. The reports from IOM, UNDRR, UNOPS, WMO on behalf of CREWS and WTW include details of relevant contact persons or contact offices that can support countries requesting technical assistance.

## **B. Thematic information on types of technical assistance provided**

9. The technical assistance described or implied in the progress reports can be clustered under the six areas presented in this section. The table below summarizes the relevant information from the progress reports submitted, by organization.

### **1. Risk mapping, assessments and analysis**

10. The progress reports contain information on technical assistance provided through a range of activities and initiatives related to risk mapping and assessment, including relevant data generation, information-sharing and analysis for risk-informed decision-making and impact forecasting.

11. FAO provided details on guidance and hands-on training developed for institutionalizing its methodology for damage and loss assessment in agriculture within national loss and damage information systems, with the aim, inter alia, of enhancing national capacities to monitor and analyse progress under indicator C-2 of the Sendai Framework for Disaster Risk Reduction 2015–2030 and SDG indicator 1.5.2.

12. IOM reported on technical assistance provided for assessing loss and damage in the context of human mobility, including support for generating and compiling related data, performing multi-hazard risk assessments and mapping information on hazards and vulnerabilities in the context of displacement and migration, with a view to supporting the mainstreaming of information on human mobility in climate change adaptation and disaster risk reduction programming.

13. UNDRR provides technical assistance aimed at enhancing access to data on climate risks and facilitating use of those data for analysis and decision-making. For example, it provided support for applying the relevant methods and tools and developing risk profiles. DesInventar,<sup>5</sup> a disaster information management system hosted by UNDRR and supported by partners, facilitates the systematic collection of data on loss and damage events caused by both small- and large-scale disasters associated with natural hazards. The system was in use by 110 countries as at 8 September 2023.

### **2. Early warning systems**

14. The progress reports contain information on technical assistance provided on a wide range of interventions related to early warning systems, from technical and operational support to the dissemination of early warning information at appropriate levels.

15. The CREWS initiative provides analytical and advisory services, capacity-building and operational support for producing weather and hydrological forecasts, generating climate risk information, developing tools for impact-based forecasting, strengthening early warning communication technology, including its use, and enhancing preparedness and response plans. It provided support to more than 70 least developed countries and small island developing States, including through its Accelerated Support Window, a financing mechanism set up to enable rapid response to countries' requests for assistance, and the

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<sup>5</sup> See [www.DesInventar.net](http://www.DesInventar.net).

Simplified Approval Process—CREWS Scaling-up Framework for accelerating access to GCF funds under certain circumstances.

### **3. Anticipatory action**

16. The progress reports contain information on technical assistance provided in relation to implementing anticipatory action approaches.

17. IOM and OCHA both provided support under frameworks for anticipatory action financed by the Central Emergency Response Fund. In addition, OCHA provided support for facilitating and scaling up coordinated anticipatory action to minimize and address the impacts of climate-related disasters, generating evidence for the benefits of such action and supporting vulnerable communities at imminent risk from climate-related disasters. Support is also provided through a pilot programme in collaboration with the African Risk Capacity Group for developing anticipatory insurance policies to mitigate projected crop loss due to drought in Malawi and Zambia, which has resulted in reduced premiums and quicker payouts against pre-agreed risk mitigation and response plans.

### **4. Risk finance, insurance schemes and contingency measures**

18. The progress reports contain information on technical assistance provided in relation to innovative risk financing solutions and forecast-based financing.

19. WTW provided technical assistance for the development of pre-arranged, trigger-based disaster risk finance, including parametric risk transfer solutions (insurance), risk pooling, shock-responsive social protection schemes, risk-informed sovereign financing strategies and climate-resilient debt clauses. Support is also available for the development of disaster risk financing solutions with specific use cases, such as ecosystem resilience and restoration, anticipatory action, rapid response in humanitarian crises and critical infrastructure restoration.

### **5. Policy frameworks and plans**

20. Organizations reported on technical assistance provided to countries for developing policy frameworks and processes relevant to averting, minimizing and addressing loss and damage, and developing plans in relation to reducing disaster risk. IOM provided policy support aimed at enabling countries to integrate consideration of migration into environmental policies, climate change adaptation strategies and disaster risk governance frameworks and to take environmental considerations into account in comprehensive migration management policies. Support was also provided to countries for strengthening national and local approaches to addressing migration governance and evacuation planning, assisting displaced persons, finding durable solutions and planned relocations as part of climate adaptation and disaster management planning processes.

21. UNDRR provided support for integrating adaptation goals into disaster risk reduction plans and disaster risk reduction into national adaptation planning processes, as well as targeted technical assistance pertaining to accessing risk finance, de-risking investments and increasing infrastructure resilience. These activities are complemented by hosting disaster databases on loss and damage and producing knowledge products, such as global and regional assessment reports.

### **6. Infrastructure resilience and rehabilitation**

22. The progress reports contain information on technical assistance provided in relation to post-disaster rehabilitation of infrastructure and improving the climate resilience of infrastructure. UNOPS provided support for planning, developing, managing and implementing infrastructure projects that build resilience, including in the context of post-disaster recovery. Examples include rehabilitation of infrastructure, such as bridges, roads and river defence systems, damaged as a result of a disaster due to natural hazards, and support for developing technical specifications and norms in the context of building resilience to shocks.

## Summary of progress reports on technical assistance provided to developing countries under the Santiago network between 20 September 2022 and 11 September 2023

<i>Submitter</i>	<i>Technical assistance provided</i>	<i>Developing countries to which technical assistance is provided</i>	<i>Involvement of and collaboration among stakeholders</i>	<i>Ways in which developing countries can access technical assistance</i>	<i>Additional support available, as contained in the report</i>
FAO	<p>Support for enhancing knowledge and understanding of comprehensive disaster and climate risk management approaches in the agriculture sector</p> <p>Support for institutionalizing the FAO methodology for damage and loss assessment for agriculture within national loss and damage information systems</p> <p>Support through its Climate Risk Toolbox, aimed at facilitating climate-sensitive project design, the identification of climate risk hotspots and analysis of major climate hazards and interlinkages with socioeconomic variables and agroecological systems</p>	More than 40 developing countries	Support provided, for example, through partnerships such as the Capacity for Disaster Reduction Initiative, the Global El Niño/Southern Oscillation Analysis Cell and the NDC Partnership	Through the relevant FAO offices and modalities such as the FAO Trust Fund, Technical Cooperation Programme and Special Fund for Emergency and Rehabilitation Activities	<p>Support for formulating agriculture, forestry and other land use components in NDCs and achieving related targets</p> <p>Support for developing and revising disaster risk reduction strategies in the agriculture sector in the context of Sendai Framework target E, and ensuring synergy between such strategies and adaptation action</p> <p>Access to innovative tools for combining geospatial data with climate, environmental and agricultural information</p> <p>Support for accessing climate finance through projects and programmes aimed at scaling up climate investment in agriculture</p>
IOM	Support for integrating consideration of migration into environmental and development policies, climate change adaptation strategies and disaster risk governance frameworks; developing risk-informed local, national and regional strategies and plans on migration, development, disaster risk reduction and adaptation; and taking environmental considerations into account in	Specific country interventions identified in the report: Afghanistan, Belize, Burundi, Côte d'Ivoire, Democratic Republic of the Congo, Kenya, Mali, Mozambique, Nepal, Niger, Philippines, Senegal, Sierra Leone, Somalia, South Sudan, Uganda	Partnerships and/or cooperation with international development and financial institutions, multilateral development banks, academic organizations, think tanks, civil society, State-led platforms, multi-stakeholder networks, the media, migrant and diaspora organizations, and representatives of affected populations	<p>Through IOM country or regional offices or its Migration, Environment, Climate Change and Risk Reduction Division</p> <p>Contact details for the Division provided</p>	<p>Local support, including capacity-building support, for integrating consideration of human mobility in the context of climate change into national and local adaptation plans</p> <p>Workshops for building capacity in relation to considering human mobility in the context of disasters, climate change and environmental degradation</p>

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	<p>comprehensive migration management policies</p> <p>Support for gathering data on displacement, including through the Displacement Tracking Matrix, which includes some 137 million movements monitored by around 10,000 primary data collectors across a network of more than 400,000 key informants in more than 100 countries</p> <p>Support aimed at strengthening knowledge and knowledge-sharing in relation to assessment and mapping of hazards and vulnerability with a view to facilitating risk-informed planning and the compilation of information on displacement and migration for (1) adaptation action, (2) disaster risk reduction efforts, (3) humanitarian and transition or recovery programming, including early warning systems, (4) anticipatory action and (5) other preparedness activities</p> <p>Support through participation in the implementation of anticipatory action frameworks financed by the Central Emergency Response Fund</p>				<p>Support for organizing national consultations and dialogues on human mobility in the context of climate change</p> <p>Support in the context of the Early Warnings for All initiative, specifically through the development of global tools and products and roll-out of a national-level consultation process and gap analysis in 30 priority countries</p>
OCHA	Support for facilitating and scaling up coordinated anticipatory action to	Specific country interventions identified in the report: Bangladesh, Burkina Faso,	Facilitation of anticipatory action frameworks with the participation of a wide range	Through OCHA regional and country offices	Support is also available through the Joint Environment Unit of the

<i>Submitter</i>	<i>Technical assistance provided</i>	<i>Developing countries to which technical assistance is provided<sup>i</sup></i>	<i>Involvement of and collaboration among stakeholders</i>	<i>Ways in which developing countries can access technical assistance</i>	<i>Additional support available, as contained in the report</i>
	<p>minimize and address the impacts of climate-related disasters, generating evidence of the benefits of that action and supporting vulnerable communities at imminent risk from climate-related disasters, including through facilitating anticipatory action frameworks financed by the Central Emergency Response Fund</p> <p>Support through a pilot programme in collaboration with the African Risk Capacity Group for developing anticipatory insurance policies to mitigate projected crop loss due to drought in Malawi and Zambia, with reduced premiums and quicker payouts against pre-agreed risk mitigation and response plans</p> <p>Support through the Centre for Humanitarian Data in the form of relevant tools, guides and webinars related to using observational data, forecasts and modelled data, including for early warning</p>	<p>Chad, Democratic Republic of the Congo, Ethiopia, Fiji, Kenya, Malawi, Nepal, Niger, Nigeria, Senegal, Somalia, South Sudan, Zambia</p>	<p>of United Nations agencies and technical partners</p>		<p>United Nations Environment Programme and OCHA, which deploys rapid expertise in response to environmental repercussions of disasters and crises</p>
UNDRR	<p>Demand-driven guidance and structured training modules designed to (1) enhance understanding of systemic climate risk, risk assessment methods and tools, and risk analysis, including development of risk profiles</p>	<p>Africa: Angola, Benin, Botswana, Burkina Faso, Burundi, Cabo Verde, Cameroon, Comoros, Côte d'Ivoire, Equatorial Guinea, Eswatini, Ethiopia, Gambia, Ghana, Guinea, Guinea-Bissau, Kenya, Liberia,</p>	<p>Engagement and cooperation with a variety of stakeholder groups under the Stakeholder Engagement Mechanism, providing a channel to bring together a wide range of non-State actors on the ground to engage in policy processes</p>	<p>Through regional and subregional offices, which can be contacted through disaster risk reduction focal points</p> <p>Contact persons identified and contact details provided</p>	<p>Support under the Early Warnings for All initiative aimed at enhancing global risk knowledge and integrating it into inclusive, accessible and effective early warning systems, as well as support for conducting</p>



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	<p>and governance of risk data, and (2) enable quantification of the economic impacts of cascading disaster impacts, with a view to enabling robust risk analysis and risk-informed decision-making</p> <p>Support for enhancing integration of climate information and projections, and adaptation goals, into national and subnational disaster risk reduction plans, and disaster risk reduction considerations into national adaptation plans</p> <p>Support to local authorities and cities for developing resilience action plans as part of the Making Cities Resilient 2030 initiative</p> <p>Support for identifying financing gaps, promoting risk disclosure in public and private sector investment decisions, and developing integrated national financing frameworks</p> <p>Support for incentivizing capital markets to invest in resilience-building and conducting economic stability analysis and risk-sensitive budget reviews through a global taxonomy and observatory</p>	<p>Madagascar, Malawi, Mali, Mauritius, Mozambique, Namibia, Niger, Nigeria, Rwanda, Sao Tome and Principe, Seychelles, Sierra Leone, Somalia, South Africa, Sudan, Togo, Uganda, United Republic of Tanzania, Zambia</p> <p>Latin America and the Caribbean: Antigua and Barbuda, Argentina, Bahamas, Barbados, Belize, Bolivia (Plurinational State of), Brazil, Chile, Colombia, Costa Rica, Dominica, Dominican Republic, Ecuador, El Salvador, Grenada, Guatemala, Guyana, Haiti, Honduras, Jamaica, Mexico, Nicaragua, Panama, Paraguay, Peru, Saint Kitts and Nevis, Saint Lucia, Saint Vincent and the Grenadines, Suriname, Trinidad and Tobago, Uruguay, Venezuela (Bolivarian Republic of)</p> <p>Arab States: Djibouti, Egypt, Iraq, Jordan, Kuwait, Lebanon, Mauritania, Morocco, State of Palestine, Sudan, Syrian Arab Republic, Tunisia, United Arab Emirates, Yemen</p> <p>Asia-Pacific: Afghanistan, Bangladesh, Bhutan, Cambodia, China, Democratic People's Republic of Korea, Fiji, India, Indonesia, Iran (Islamic Republic of), Kiribati, Lao People's</p>	and contribute to resilience-building		<p>capacity gap assessments of early warning systems</p> <p>Support for monitoring disasters and related loss and damage through databases and tracking systems such as DesInventar and the Sendai Framework Monitor tool</p> <p>Support for developing risk-informed United Nations Sustainable Development Cooperation Frameworks and humanitarian response plans</p>

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		Democratic Republic, Malaysia, Maldives, Marshall Islands, Micronesia (Federated States of), Mongolia, Myanmar, Nauru, Nepal, Pakistan, Palau, Papua New Guinea, Philippines, Republic of Korea, Samoa, Solomon Islands, Sri Lanka, Thailand, Timor-Leste, Tonga, Tuvalu, Vanuatu, Viet Nam			
		Europe and Central Asia: Albania, Armenia, Bosnia and Herzegovina, Kazakhstan, Kyrgyzstan, Montenegro, Serbia, Tajikistan, Ukraine, Uzbekistan			
UNOPS	Support for planning, developing, managing and implementing infrastructure projects that help build resilience  Capacity-building in relation to infrastructure planning, delivery and management, including ensuring that government decision-making contributes to climate action throughout the life cycle of infrastructure developments  Support in partnership with other United Nations agencies for post-disaster recovery efforts (including rehabilitation of damaged infrastructure and implementation of technical specifications and norms for building resilience to shocks)	Specific country interventions identified in the report: Bangladesh, Dominican Republic, Ghana, India, Kenya, Panama, Saint Lucia, Saint Vincent and the Grenadines, South Africa, Zimbabwe	Support provided, for example, through partnerships such as the Initiative for Climate Action Transparency and the NDC Partnership	Contact persons identified and contact details provided	Support for national infrastructure adaptation planning, such as helping governments to systematically assess national adaptation needs and design priority action in line with national climate change objectives through targeted recommendations and identification of potential projects  Support through the National Infrastructure Systems Model, developed with the University of Oxford, to facilitate assessment of future infrastructure needs in the light of current and future climatic stresses and development of strategies that include resilience-building

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	and strengthening of capacity for disaster preparedness, including with regard to early warning systems				measures for meeting those needs in accordance with national development plans, NDCs and the SDGs  Support under the Initiative for Climate Action Transparency in the form of guides and an assessment tool to support decision makers in assessing adaptation project proposals and the impacts of loss and damage, and tracking the implementation of adaptation activities on the ground.
WMO on behalf of CREWS	<p>Analytical and advisory services, capacity-building and operational support for strengthening national, multi-hazard, people-centred and gender-responsive early warning systems, generating climate risk information, developing tools for impact-based forecasting, strengthening early warning communication technology, and enhancing preparedness and response plans</p> <p>Support for improving relevant national governance structures, including through strategic plans and collaboration with ministries and financial institutions on resilience planning and climate financing</p> <p>Regional-level capacity-building for delivering and</p>	<p>Support provided to more than 70 least developed countries and small island developing States through 10 country and 8 regional projects and 5 Accelerated Support Window interventions</p> <p>Regional: Caribbean, Central Africa, East Africa, Horn of Africa, Pacific, South-East Asia, South-West Indian Ocean, West Africa</p> <p>Specific country interventions identified in the report: Afghanistan, Benin, Burkina Faso, Chad, Cuba, Democratic Republic of the Congo, Haiti, Malawi, Mali, Mozambique, Niger, Papua New Guinea, Togo, Tonga, Vanuatu</p>	Implementing partners and national and regional stakeholders	Contact person identified and contact details provided	Support through the Accelerated Support Window, a financing mechanism set up to respond rapidly to requests for assistance, and the Simplified Approval Process—CREWS Scaling-up Framework for accelerating access to GCF funds through the Simplified Approval Process under certain circumstances

<i>Submitter</i>	<i>Technical assistance provided</i>	<i>Developing countries to which technical assistance is provided</i>	<i>Involvement of and collaboration among stakeholders</i>	<i>Ways in which developing countries can access technical assistance</i>	<i>Additional support available, as contained in the report</i>
WTW	<p>enhancing early warning and risk information services and improving regional cooperation on forecasting of climate and weather</p> <p>Global support for ensuring coherence of investment in developing early warning systems</p> <p>Support for developing pre-arranged, trigger-based disaster risk finance options, including parametric risk transfer solutions (insurance), risk pooling, risk-informed sovereign financing strategies, shock-responsive social protection schemes and climate-resilient debt clauses, to ensure the rapid mobilization of resources for preparedness and response efforts, including emergency relief and anticipatory action</p> <p>Support is also available for the development of disaster risk financing solutions with specific use cases such as ecosystem resilience and restoration, anticipatory action, rapid response in humanitarian crises and critical infrastructure restoration</p>	<p>Specific country interventions identified in the reports: Bangladesh, Belize, Comoros, Fiji, Haiti, Kiribati, Madagascar, Mozambique, Papua New Guinea, Philippines, Solomon Islands, Tonga, Vanuatu, Viet Nam</p>	<p>Collaboration with a wide range of stakeholders</p>	<p>Contact persons identified and contact details provided</p>	<p>Not applicable</p>