

Measuring Extreme Events and Disasters (TF MEED)

Michael Nagy and Angela Ferruzza

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In-depth review of measuring extreme events and disasters by CES Bureau (2014)

Main conclusions:

1. Clarify the role of NSOs:
 - Disaster risk reduction
 - Providing quickly the right information
 - Monitoring of occurrence and impact
2. Need to agree on common classifications and definitions for statistical purposes
3. Strong links with the work on climate change related statistics

Task Force on measuring extreme events and disasters (started 2015)

Conference of European Statisticians (CES) decided to launch this work based on the in-depth review.

Members:

Italy (Chair)

Armenia

Kazakhstan

Mexico

Moldova

New Zealand

Nigeria

South Africa

Turkey

Eurostat

Joint Research Centre of the European Union (JRC)

UN Office for Disaster Risk Reduction (UNISDR)

Economic and Social Commission for Asia and the Pacific (UN-ESCAP)

World Health Organization (WHO)

World Meteorological Organization (WMO)

Terms of Reference

http://www.unece.org/fileadmin/DAM/stats/documents/ece/ces/bur/2015/February/05-ToR_TF_on_Measuring_Extreme_Events_and_Disasters.pdf

Objectives:

- Clarify the role of official statistics.
- Identify practical steps how NSOs can support disaster management and risk reduction.
- Identify main data needs and data sources. Take into account SDGs.
- Identify needs for harmonisation of classifications, terms and definitions
- Cooperate with the UN agencies and other international organisations working in this area.
- Draft recommendations

Ongoing discussions and interim-results

- “Extreme events” and “disasters” need to be conceptually linked:
 - Extreme events defined by statistical occurrence and/or potential impact
 - Terms “hazards” and “disasters” defined by potential or actual impact
- In analogy to “climate change-related statistics” the set of statistics should be called “extreme events and disaster-related statistics” (EED)
- Scope still needs to be defined, political and armed conflicts should be excluded
- The Task Force is closely and actively following the work of the Open-ended Intergovernmental Expert Working Group on Indicators and Terminology Relating to Disaster Risk Reduction (OEIWG)
- A survey to NSOs has recently been sent (deadline 15 May)

OEIWG on Indicators and Terminology Relating to Disaster Risk Reduction

- Established by the United Nations General Assembly on 3 June 2015
- Develop a set of possible indicators and terminology to measure global progress in the implementation of Sendai Framework related also to SDG indicators and to monitor the targets

Target A	Substantially reduce global disaster mortality by 2030, aiming to lower average per 100,000 global mortality between 2020-2030 compared to 2005-2015
Target B	Substantially reduce the number of affected people globally by 2030, aiming to lower the average global figure per 100,000 between 2020-2030 compared to 2005-2015
Target C	Reduce direct disaster economic loss in relation to global gross domestic product (GDP) by 2030
Target D	Substantially reduce disaster damage to critical infrastructure and disruption of basic services, among them health and educational facilities, including through developing their resilience by 2030
Target E	Substantially increase the number of countries with national and local disaster risk reduction strategies by 2020
Target F	Substantially enhance international cooperation to developing countries through adequate and sustainable support to complement their national actions for implementation of this framework by 2030
Target G	Substantially increase the availability of and access to multi-hazard early warning systems and disaster risk information and assessments to the people by 2030

OEIWG on Indicators and Terminology Relating to Disaster Risk Reduction: indicators in discussion ...

Target A	Substantially reduce global disaster mortality by 2030, aiming to lower average per 100,000 global mortality between 2020-2030 compared to 2005-2015	
A-1	Number of deaths and missing due to hazardous events per 100,000.	SDG Proposal
A-2	Number of deaths due to hazardous events	SDG Proposal
A-3	Number of missing due to hazardous events	SDG Proposal

Target B	Substantially reduce the number of affected people globally by 2030, aiming to lower the average global figure per 100,000 between 2020-2030 compared to 2005-2015	
B-1	Number of affected people per 100,000	SDG Proposal
B-2	Number of injured or ill people due to hazardous events	SDG Proposal
B-3	Number of people who left their places of residence due to hazardous events	
B-3a	Number of evacuated people due to hazardous events	SDG Proposal
B-3b	Number of relocated people due to hazardous events	SDG Proposal
B-4	Number of people whose houses were damaged due to hazardous events	
B-5	Number of people whose houses were destroyed due to hazardous events	
B-6	Number of people who received food relief aid due to hazardous events	

OEIWG on Indicators and Terminology Relating to Disaster Risk Reduction: indicators in discussion ...

Target C	Reduce direct disaster economic loss in relation to global gross domestic product (GDP) by 2030	
C-1	Direct economic loss due to hazardous events in relation to global gross domestic product.	SDG Proposal
C-2	Direct agricultural loss due to hazardous events	SDG Proposal
C-3	Direct economic loss due to industrial facilities damaged or destroyed by hazardous events	
C-4	Direct economic loss due to commercial facilities damaged or destroyed by hazardous events	
C-5	Direct economic loss due to houses damaged by hazardous events	SDG Proposal
C-6	Direct economic loss due to houses destroyed by hazardous events	SDG Proposal
C-7	Direct economic loss due to damage to critical infrastructure caused by hazardous events	SDG Proposal

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OEIWG on Indicators and Terminology Relating to Disaster Risk Reduction

TF on MEED provided substantive comments on proposed terminology:

- Conceptual framework needed in which the terminology is embedded
- Existing statistical classifications to be used (e.g. ISIC)
- Comments on the IRDR peril classification, including that the term “natural hazards” may be misleading for hazards related to climate change and biological hazards.
- For reporting on EED the temporal and spatial dimension plays an important role; disasters are discreet in terms of space and time. However, lots of practical questions remain, such as:
 - Individuals can change their “status” over time, e.g. from missing to alive, injured or death.
 - Impacts can occur outside of the defined place of the disaster (e.g. through refugees)
 - Impacts can occur after the disaster, e.g. injured people die or people get injured or die during post-disaster events (house collapsing days or weeks after the event)

OEIWG on Indicators and Terminology Relating to Disaster Risk Reduction

First outcomes of the OEIWG having a direct impact on the work of the TF MEED:

- Scope excludes armed conflicts
- NSOs are considered as an important source of information in all phases of disasters risk management
- The recommended classification for hazards and disasters is the IRDR peril classification (note: FDES chapter refers to CRED/EM-DAT)

Survey on the role of NSOs on Measuring Extreme Events and Disasters

Prepared by the TF on MEED and sent to NSOs on 4 April (deadline 15 May)

Objectives:

- identify the role of NSOs
- institutional cooperation between NSOs and the other organizations
- main challenges
- main data sources (including the use of geographical data)
- existing key statistics
- identify those official statistics which are needed by different stakeholders in different phases of disaster risk management.

Survey structure:

- Part A - General questions
- Part B - Occurrence of EED
- Part C - Impact indicators of EED
- Part D - Geospatial information related to EED
- Part E – Challenges and future plans

Next steps of the TF on MEED

- **Analysing survey results**
- **Continue to coordinate with Expert Group on Disaster-related Statistics in Asia and the Pacific (e.g. providing feedback on the proposed draft Disaster-Related Statistics Framework (DRSF))**
- **Prepare comments on the work of the OEIWG**
- **Draft recommendations on EED-related statistics in 2017**