NATURAL AND CLIMATE HAZARDS

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5 RECOMMENDED INDICATORS OF NATURAL AND CLIMATE HAZARDS

5.13 Disaster Resilience

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Disaster resilience scorecard for cities		Natural and Climate Hazards	
Description and justification	The Disaster resilience scorecard provides a set of assessment criteria for the local governments that allow assessing their disaster resilience, structuring around UNDRR's Ten Essentials for Making Cities Resilient. It also helps to monitor and review progress and challenges in the implementation of the Sendai Framework for Disaster Risk Reduction: 2015-2030 and supports the baseline analysis for preparation of the disaster risk reduction and resilience strategies.		
Definition	The Scorecard prompts to identify "most probable" and "most severe" risk scenarios for each of the identified city hazards, or for a potential multi-hazard event		
Strengths and weaknesses	+ Promote resilience awareness+ Establishing a baseline status of disaster resilience		

	+ Enabling planning towards DRR		
	- Need for a facilitator to interpret the results		
	 The assessment is not immediate and requires time (e.g., month(s)) 		
Measurement procedure and tool	 First, the actors are identified, which should include local authorities, private businesses, research centres, academia, community groups, etc. Via interviews and workshops, external and internal parties provide their scores and comments to the ten categories (i.e., Essentials) and their sub-categories that are evaluated in the MS Excel spreadsheet. The overall score of the assessment provides information on the city's overall relative disaster resilience whilst individual sub-categories support identification of specific vulnerabilities to different hazards and risks. Two options and their respective Excel spreadsheets exist for the DRR evaluation: Preliminary level: responding to key Sendai Framework targets and indicators, and with some critical sub-questions. In total there are 47 questions indicators, each with a 0 – 3 score Detailed assessment: a multi-stakeholder exercise that can be a basis for a detailed city resilience action plan. The detailed assessment includes 117 indicator criteria, each with a score of 0 – 5. 		
Scale of measurement	City		
Data source			
Required data	Information on the city pressures and hazards		
Data input type	Quantitative and qualitative		
Data collection frequency	Additional data collection is needed only if the assessment is repeated to monitor progress in DRR. Short-term: within 1 year since the compilation Mid-term: from 1 to 5 years since the compilation Long-term: 5 years since the compilation		
Level of expertise required	High – requires the ability to use the scorecard template and the ability to interpret the outcomes		
Synergies with other indicators	The evaluation of each Essential may rely on multiple indicators for the respective topic		
Connection with SDGs	SDG 6 Clean water and sanitation, SDG 11 Sustainable cities and communities, SDG 13 Climate action, SDG 15 Life on land		

Opportunities for participatory data collection	Yes, with data available to Cities' departments		
Additional information			
References	United Nations Office for Disaster Risk Reduction, <i>Disaster Resilience</i> <i>Scorecard for Cities – Preliminary Level Assessment</i> , May 2017 <u>https://www.unisdr.org/campaign/resilientcities/toolkit/article/disaster-</u> <u>resilience-scorecard-for-cities</u>		

5.14 Disaster-risk informed development

Project Name: UNaLab (Grant Agreement no. 730052)

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Disaster-risk informed development		Natural and Climate Hazards
Description and justification	Natural and climate hazards such as floods or earthquakes cannot be prevented. However, it is possible to anticipate the consequences and take preventive measures. Including disaster risk planning into national and/or municipal urban development plans enhances the resilience against natural hazards that reduces the economic losses and damages to property.	
Definition	The extent to which disaster risk has been taken into account when planning national-level or municipal-level economic or urban development (0-2)	
Strengths and weaknesses	 + Ensures robust action planning for urban disaster resilience - Requires prior risk assessment on national/municipal level 	
Measurement procedure and tool	The inclusion of disaster-risk informed urban development to local development plans can be assessed using the scale: 0 – No inclusion: Disaster risk has not been accounted in either national economic development plans, or in city-level urban planning; 1 – Partial inclusion: Present only in the active national development plan/strategy; 2 – Full inclusion: Accounted for in both the active national development plan/strategy and in city-level urban planning	