

# Global Set of Climate Change Statistics and Indicators



DA12 project national online workshop:

Generating climate change and disaster statistics for policy decision-making in Antigua and Barbuda

3, 6 & 7 December 2021

United Nations Statistics Division

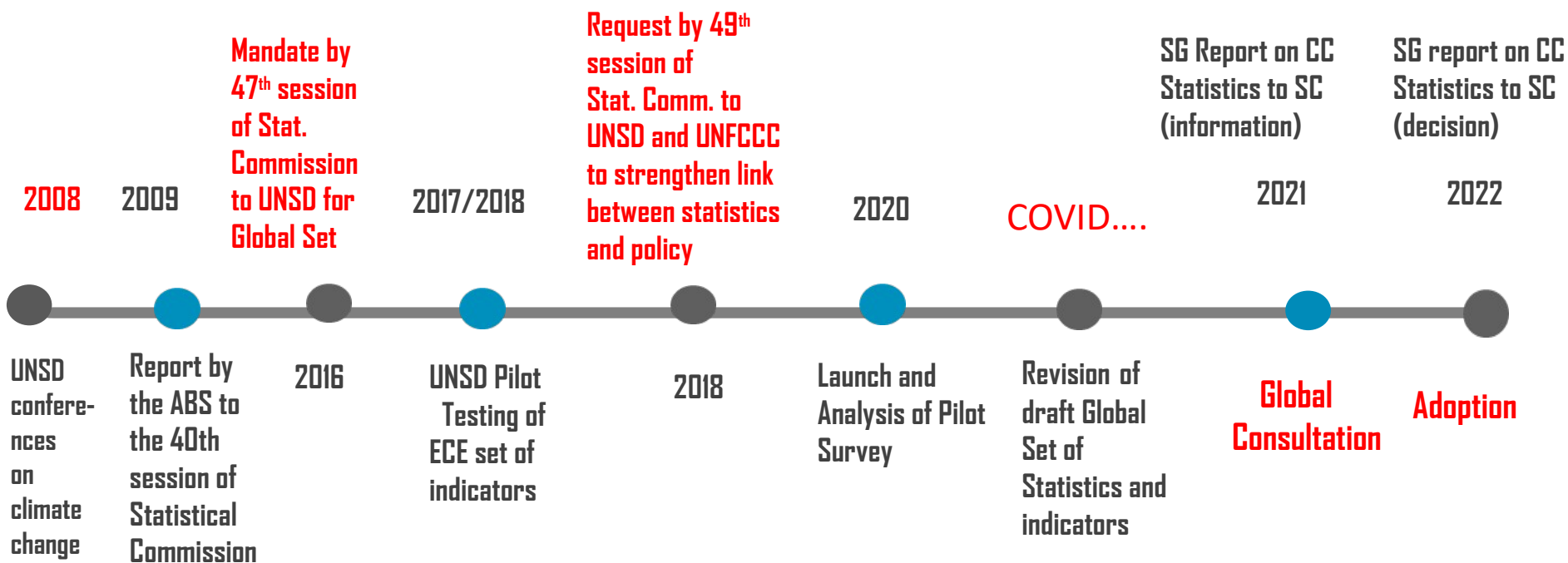


# Outline

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# Background to UNSD work on development of Global Set of Climate Change Statistics and Indicators

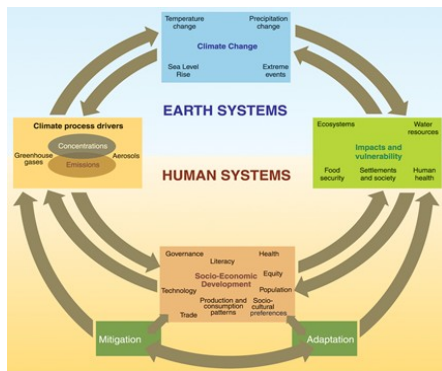


More than a decade long process: 2008 - present

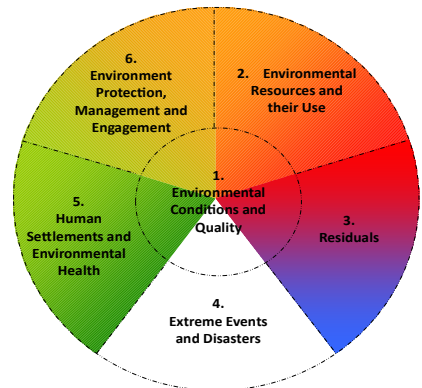


# Global Set: Foundation

- Given that there was no underlying framework linking the reporting requirements stemming from the Paris Agreement and the necessary statistics or indicators to support climate policy action, UNSD has been working closely with UNFCCC to develop such a framework explicitly for climate change.
- Global Set, being developed in close collaboration with UNFCCC, is structured according to the IPCC framework and FDES.
- Relevant articles of the Paris Agreement (PA) and the decisions under the PA Work Programme adopted in Katowice, as well as related SDG and Sendai Framework indicators, are also referenced to strengthen the link between statistics and policy.

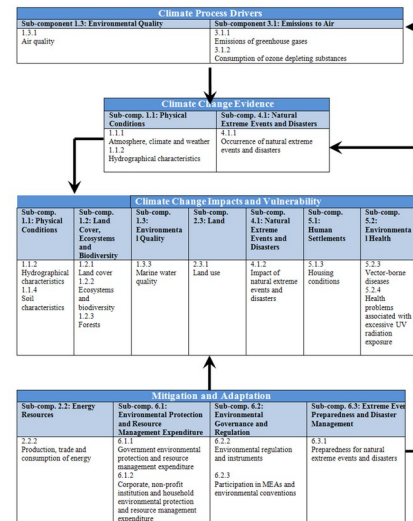


IPCC, 2007, Fourth Assessment Report



Framework for the Development of Environment Statistics (FDES 2013)

Relevant chapters of the Manual of the BSES  
[https://unstats.un.org/unsd/envstats/fdes/manual\\_bses.cshml](https://unstats.un.org/unsd/envstats/fdes/manual_bses.cshml)



FDES cross-cutting application (Chapter 5) links climate change and environment statistics based on the IPCC Framework



Goal 13



# Global Set: Structure

## Indicators and statistics side-by-side, main metadata details

A	B	C	D	E	F	G	H	I	J	K	L	M
Area	Topic	Indicator	Statistic	FDES	SDG	Senda Framework	Paris Agreement	Katowice climate package	Preliminary Tier	Themes	Proposed Review Agency	National Data Sources
IMPACTS	<i>Freshwater resources</i>											
IMPACTS		<a href="#">Renewable freshwater resources per capita</a>					7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	1	Water r	FAO; UNSD	Armstat, Ministry of Environment
IMPACTS			Precipitation	FDES 1.1.1.b			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	1	Water r	FAO; UNSD	Armstat, Ministry of Environment
IMPACTS			Evapotranspiration	FDES 2.6.1.b.1			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	1	Water r	FAO; UNSD	Armstat, Ministry of Environment
IMPACTS			Inflow	FDES 2.6.1.a.2			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	1	Water r	FAO; UNSD	Armstat, Ministry of Environment
IMPACTS			Population						1	Water r	FAO; UNSD	Armstat
IMPACTS		<a href="#">Freshwater abstracted as proportion of renewable freshwater resources</a>				6.4.2: Level of water s	7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	1	Water r	FAO; UNSD	Inspectory for Environment and Mining,
IMPACTS			Freshwater abstracted	FDES 2.6.2.a			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	1	Water r	FAO; UNSD	Inspectory for Environment and Mining, M
IMPACTS			Renewable freshwater resources	FDES 2.6.1.c			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	1	Water r	FAO; UNSD	Armstat, Ministry of Environment
IMPACTS		<a href="#">Water quality</a>				6.3.2: Proportion of bc	7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	3	Water c	UNEP	Ministry of Environment, Armstat
IMPACTS			Total suspended solids	FDES 1.3.2.f.3			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	2	Water q	UNEP	Ministry of Environment, Armstat
IMPACTS			pH/acidity/alkalinity	FDES 1.3.2.f.1	14.3.1: Average marine		7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	2	Water q	UNEP	Ministry of Environment, Armstat
IMPACTS			Water salinity	FDES 1.3.2.f.4			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	2	Water q	UNEP	Ministry of Environment, Armstat
IMPACTS			BOD of water resources	FDES 1.3.2.b.1			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	2	Water q	UNEP	Ministry of Environment, Armstat
IMPACTS			COD of water resources	FDES 1.3.2.b.2			7; 13.8	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	2	Water q	UNEP	Ministry of Environment, Armstat



## 27. Renewable freshwater resources per capita

Field	Description				
Code	2080	2081	2082	2083	1121
Indicator	Renewable freshwater resources per capita				
Statistics		Precipitation (FDES 1.1.1.b/2.6.1.a)	Evapotranspiration (FDES 2.6.1.b.1)	Inflow (FDES 2.6.1.b.2)	Population
Area	Impacts				
Topic	Freshwater resources				
Themes	Water resources				
Paris Agreement article	7; 13.8	7; 13.8	7; 13.8	7; 13.8	
PAWP-Katowice	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	Decision 18/CMA.1, chapter IV; Decision 9/CMA.1	
FDES		1.1.1.b/2.6.1.a	2.6.1.b.1	2.6.1.b.2	
SDG					
Sendai Framework					
Preliminary Tier	1	1	1	1	1
Definition	Renewable water resources are replenished by precipitation and are represented by the annual flow of surface water and groundwater. [FDES BSES manual, Water resources, p.7, <a href="https://unstats.un.org/unsd/environment/FDES/MS%202.6%20Water%20Resources.pdf">https://unstats.un.org/unsd/environment/FDES/MS%202.6%20Water%20Resources.pdf</a> ]	The volume of water that flows from the atmosphere to inland water resources via rain, snow, sleet, hail, dew, mist, etc., per year. [FDES BSES manual, Water resources, p.11, <a href="https://unstats.un.org/unsd/environment/FDES/MS%202.6%20Water%20Resources.pdf">https://unstats.un.org/unsd/environment/FDES/MS%202.6%20Water%20Resources.pdf</a> ]	The volume of water that enters the atmosphere by vaporization of water into a gas through evaporation from land and water surfaces and transpiration from plants, per year. [FDES BSES manual, Water resources, p.13, <a href="https://unstats.un.org/unsd/environment/FDES/MS%202.6%20Water%20Resources.pdf">https://unstats.un.org/unsd/environment/FDES/MS%202.6%20Water%20Resources.pdf</a> ]	The volume of surface water and groundwater that moves into a territory from other territories, during a year. [FDES BSES manual, Water resources, p.12, <a href="https://unstats.un.org/unsd/environment/FDES/MS%202.6%20Water%20Resources.pdf">https://unstats.un.org/unsd/environment/FDES/MS%202.6%20Water%20Resources.pdf</a> ]	Population presents estimated mid-year total population by country or area. <a href="https://unstats.un.org/unsd/demographic-social/products/vitstats/index.cshtml">https://unstats.un.org/unsd/demographic-social/products/vitstats/index.cshtml</a>
Relevance	Freshwater-related risks of climate change increase significantly with increasing greenhouse gas (GHG) concentrations. Modeling studies since AR4, with large but better quantified uncertainties, have demonstrated clear differences between				

	global futures with higher emissions, which have stronger adverse impacts, and those with lower emissions, which cause less damage and cost less to adapt to. For each degree of global warming, approximately 7% of the global population is projected to be exposed to a decrease of renewable water resources of at least 20% (multi-model mean). [IPCC AR5, p 232, <a href="https://www.ipcc.ch/site/assets/uploads/2018/02/WGIAR5-Chap3_FINAL.pdf">https://www.ipcc.ch/site/assets/uploads/2018/02/WGIAR5-Chap3_FINAL.pdf</a> ]				
<b>National data sources</b>	Meteorological office/Ministry of natural resources/Water and related agencies	Meteorological office/Ministry of natural resources/Water and related agencies	Meteorological office/Ministry of natural resources/Water and related agencies	Meteorological office/Ministry of natural resources/Water and related agencies	NSO
<b>Data collection methods</b>		Monitoring systems	Monitoring systems	Monitoring systems	Census, survey, population register
<b>Update frequency</b>		Monthly, annual	Annual	Annual	Annual
<b>Category of measurement</b>	Volume	Volume	Volume	Volume	Volume
<b>Computation/compilation methods</b>	Precipitation plus inflows minus evapotranspiration divided over population number	Interpolation of point measurements over a geographic area (GCWAS pg. 71). GIS modelling of precipitation.	Residual of precipitation less surface and sub-surface run-off (GCWAS pg. 71).	Sum of inflows from other territories	
<b>International primary data reference, institution</b>	UNSD Environmental Indicators (Inland water resources)	UNSD Environmental Indicators (Inland water resources)	UNSD Environmental Indicators (Inland water resources)	UNSD Environmental Indicators (Inland water resources)	
<b>International primary data reference, description</b>	Renewable freshwater resources per capita	Precipitation	Actual evapotranspiration	Inflow of surface and groundwaters from neighbouring countries	
<b>International primary data reference, URL</b>	<a href="https://unstats.un.org/unsd/envstats/qindicators">https://unstats.un.org/unsd/envstats/qindicators</a>				
<b>Type of statistics</b>	C	C	C	C	
<b>International secondary data references</b>					
<b>Other data references</b>					
<b>Potential aggregations and scales</b>	National	National	National	National	National
<b>Methodological guidance</b>	<p>FDES BSES manual, Water resources, <a href="https://unstats.un.org/unsd/environment/FDES/MS%20202.6%20Water%20Resources.pdf">https://unstats.un.org/unsd/environment/FDES/MS%20202.6%20Water%20Resources.pdf</a>;</p> <p>International Recommendations for Water Statistics, <a href="http://unstats.un.org/unsd/EconStatKB/Attachment491.aspx?AttachmentType=1">http://unstats.un.org/unsd/EconStatKB/Attachment491.aspx?AttachmentType=1</a>;</p> <p>Draft Guidelines for the Compilation of Water Accounts and Statistics, <a href="https://seea.un.org/sites/seea.un.org/files/guidelines_comp_water_stats_en.pdf">https://seea.un.org/sites/seea.un.org/files/guidelines_comp_water_stats_en.pdf</a></p>				

# Global Set: Methodology

The Global Set is based on:

- systematic review of climate change statistics and indicators from 130 countries, with representative regional coverage, and identification of most commonly repeated statistics/indicators;
- discussions at several meetings of the UNSD-led Expert Group on Environment Statistics (EGES);
- bilateral consultations with specialized agencies and in-depth discussions with selected countries; and
- inputs from an extensive Pilot Survey that took place in 2020.

More information:

<https://unstats.un.org/unsd/envstats/climatechange.cshtml> and

[https://unstats.un.org/unsd/envstats/ClimateChange\\_StatAndInd\\_global.cshtml](https://unstats.un.org/unsd/envstats/ClimateChange_StatAndInd_global.cshtml)





# Global Set: Output

- The Global Set:
  - will provide a **comprehensive statistical framework with statistics, indicators and metadata**, designed to support countries in preparing their own sets of climate change statistics and indicators according to their individual concerns, priorities and resources.
  - will support the reporting requirements of countries under the Enhanced Transparency Framework and the Global Stocktake of the Paris Agreement, as well as climate-related SDG indicators.
  - will assist those countries embarking on the development of climate change statistics by providing the scope and coverage as to what may be considered climate change. It can also assist countries already involved in this area of statistics by providing a check list to see what may be already covered or added to national sets.
  - is flexible enough, with a tiering system, to be applied based on regions', as well as countries', priorities and data availability. It is recommended to promote complementarity among global, regional and national sets of climate indicators, to encourage harmonization across all levels.



# Global Consultation on draft Global Set

## Part I:

- **Institutional Dimension of Climate Change Statistics and Indicators** (in countries): aims at collecting general information on the institutional dimensions of climate change statistics through an online survey.
- **International Agency's Activities on Climate Change Statistics and Indicators**: aims at collecting general information on the main activities led by international Agencies (data collection, methodology development and capacity development), through an online survey.

## Part II:

- **Draft Global Set of Climate Change Statistics and Indicators** (Excel file: *Part II\_DraftGlobalSet.xls*) which allows respondents to provide comments on each individual indicator or statistic in the Excel file;
- **Metadata** (Word file: *Part II\_Metadata.doc*) which allows respondents to provide detailed comments on the metadata in the Word file.

**35 ECE:** Armenia, Azerbaijan, Belarus, Bulgaria, Canada, Croatia, Cyprus, Denmark, Estonia, Finland, France, Georgia, Hungary, Ireland, Italy, Kazakhstan, Lithuania, Luxembourg, North Macedonia, Moldova, Montenegro, Netherlands, Norway, Poland, Russian Federation, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey, United Kingdom, Ukraine, USA.

**14 ESCAP:** Australia, Bangladesh, Bhutan, China, India, Indonesia, Japan, Malaysia, Mongolia, Myanmar, Nepal, Philippines, Thailand, Vietnam.

**14 ECA:** Botswana, Burundi, Cabo Verde, Guinea, Côte d'Ivoire, Kenya, Madagascar, Mali, Mauritius, Senegal, South Africa, Tanzania, Zambia, Zimbabwe.

**6 ESCWA:** Jordan, Kuwait, Qatar, Saudi Arabia, State of Palestine, United Arab Emirates

**16 ECLAC:** Bermuda, Bolivia, Brazil, Chile, Colombia, Costa Rica, Dominican Republic, Ecuador, Grenada, Guyana, Jamaica, Mexico, Paraguay, Peru, Saint Lucia, Suriname.

**25 agencies:** EEA, Eurostat, CARICOM, IPCC, GCC-STAT, IEA, IMF, IOM, ESCAP, ECLAC, ECA, ECE, ESCWA, FAO, OECD, UNCTAD, UNESCO, UNEP, UNEP-WCMC, UNU, UN-HABITAT, UNFCCC, UNODC, UNSD – Energy Statistics Section, UN-Women

**TOTAL RESPONSES: 85 member states and 25 agencies**

United Nations Statistics Division



## Draft Global Set of Climate Change Statistics and Indicators (required responses from countries)

A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P
Area	Topic		Indicator	Statistics	Code	Preliminary Tier	Themes	National Data Sources	Relevance	Methodological Soundness		Data Availability		General Comments	
									Yes/No	Reference/Link	Yes/No/Partially	Reference/Link	Yes/No	Reference/Link	
<b>DRIVERS</b>					1										
<i>Total greenhouse gas (GHG) emissions</i>					101										
	1		<a href="#">Total greenhouse gas emissions per year (SDG 13.2.2)</a>		1020	1	GHG emission	Environment Agency/Na							
				Total emissions of direct greenhouse gases (GHGs, excludi	1021	1	GHG emission	Environment Agency/Na							
				Total emissions of indirect greenhouse gases (GHGs) (FDE	1022	1	GHG emission	Environment Agency/Na							
				Greenhouse gas emissions from land use, land use change	1023	1	GHG emission	Environment Agency/Na							
	2		<a href="#">Total greenhouse gas emissions from the national economy (UN-ECE 09a, excluding</a>		1030	2	GHG emission	NSO							
					1031		GHG emissions								
<i>Atmospheric concentration of greenhouse gases</i>					104										
	3		<a href="#">Global concentration of greenhouse gases</a>		1040	2	GHG concentration								
					1041		GHG concentration								
<i>Energy production and supply</i>					105										
	4		<a href="#">Total primary energy production from fossil fuels</a>		1050	1	Energy	Ministry of Energy/Oil c							
					1051		Energy								
	5		<a href="#">Total energy supply from fossil fuels</a>		1060	1	Energy	Ministry of Energy/Oil c							
					1061		Energy								

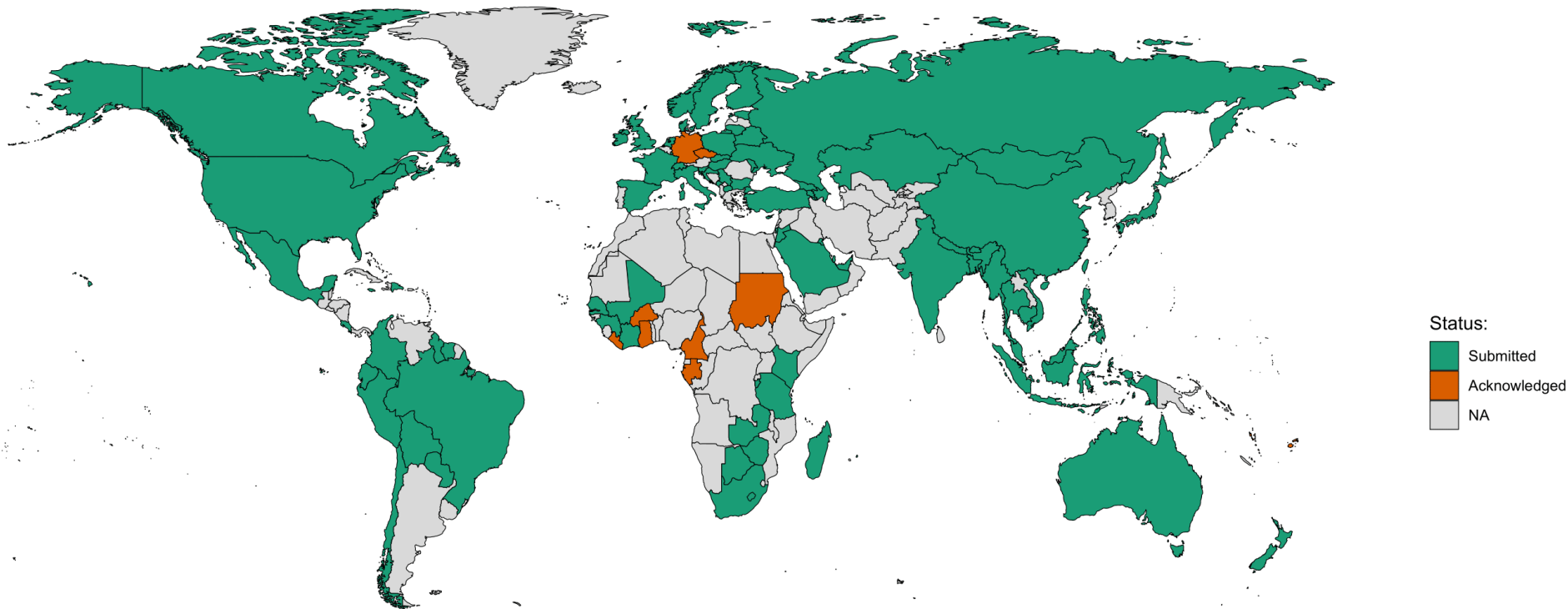
**Relevance** - is the indicator/statistic relevant for your country? In column J: Yes/No; In column K, if yes, please provide reference/link to the national policies for which the data applies.

**Methodological soundness** - do you use the methodology as provided in the metadata? In column L: Yes/No/Partially; In column M, please provide reference/link to the methodology applied in your country.

**Data availability** - are national data/statistics/indicators available for the proposed global indicator/statistic? In column N: Yes/No; In column O: If yes, please provide reference/link to the available data.



# Responses from the Global Consultation

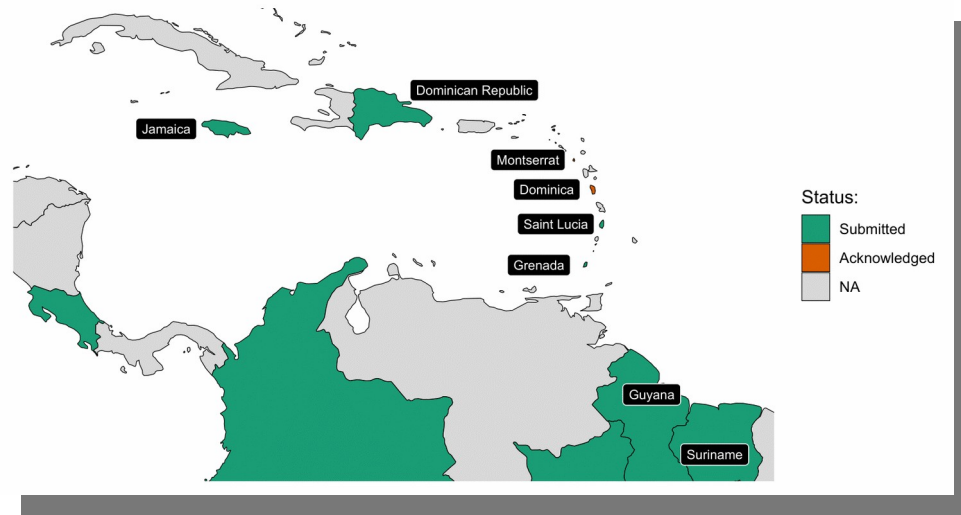


- 86 member states have **submitted** Part 1 and/or 2.
  - 72 Part 1, 75 Part 2.
- 14 member states **acknowledged**.
- 25 agencies also submitted.

"Acknowledged" means that the national statistical offices of the countries (to whom we sent out the invitations to participate) communicated with us regarding the Global Consultation after we sent out our invitation, but that they did not submit a response.



# Responses from Latin American and Caribbean Countries



## Latin America:

- Bolivia, Brazil, Chile, Colombia, Costa Rica, Ecuador, Mexico, Paraguay and Peru have **submitted**.

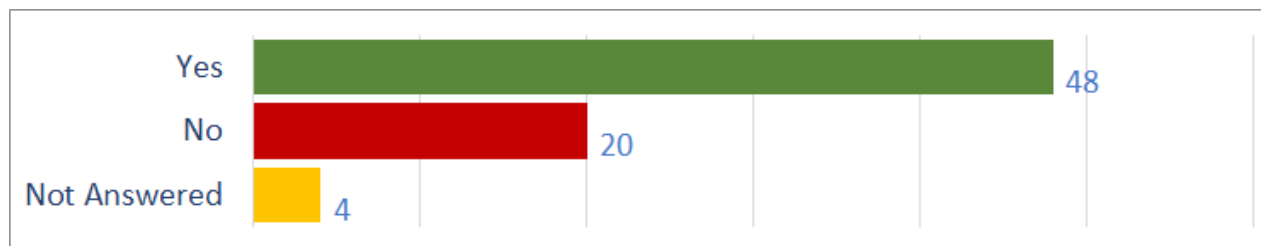
## Caribbean:

- Dominican Republic, Jamaica, Grenada, Guyana, Saint Lucia, Suriname have **submitted**.
- Montserrat and Dominica **acknowledged**.



# General remarks on Part 1

C2. Is there a department, division or unit responsible for climate change statistics in the National Statistical Office (NSO)?



- Environment
- Energy
- Social statistics; Directorate of social resilience; Social statistics division
- Satellite accounts
- Agriculture, livestock & fishery and forestry section; agriculture and environmental statistics department
- Spatial and environmental surveys department
- Territory and environment division

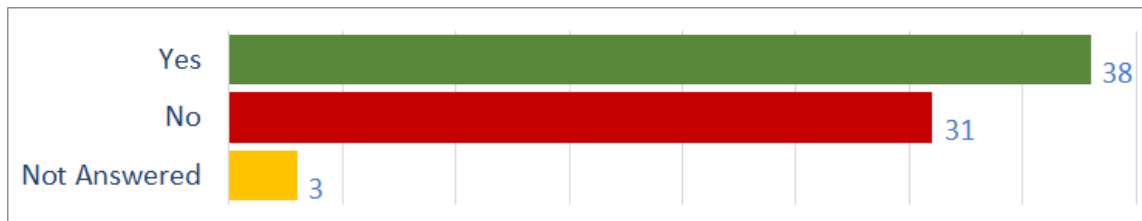
Some NSOs have established 'combined' environment and climate change statistics units.



# General remarks on Part 1

## Section D. Production and reporting of climate change statistics

D1. Is the NSO currently involved in the preparation of the country's GHG inventory, as part of the reporting obligations of the UNFCCC and/or in the preparation of national reports to UNFCCC (NC, BR for Annex I parties; and NC, BUR for non-Annex I parties)?



When Yes: Many NSOs mentioned that they provide source data, such as population, demography, GDP, energy, agriculture, waste, poverty, unemployment, Human Development Index etc., for the compilation of GHG inventories, providing data to other line ministries that act as the country focal person for GHG inventory. NSOs are also involved in the training and compilation and are involved in the preparation of the report.

When No: Some reasons for NSO to be not directly involved in the compilation include no legal or institutional mandate to collaborate. However, even when NSO is not directly involved, some pointed out that they are still indirectly contributing, since the focal point will use the data that NSO provided through their official publication and reports.



## General remarks on Part 1

D5. Has the NSO developed any specialized climate change surveys, or modules in existing censuses/surveys?



D6. If D5 is yes, list the names of these surveys.

- Agencia Nacional de Transitio
- Climate Adaption Financing Survey
- Climate Change and Natural Disaster Perspectives
- Environmental Expenditure Survey
- Forestry surveys
- Household Environmental Survey
- Living Standards Survey
- Low Carbon and Renewable Energy Economy Survey
- National Climate Change Impact Survey
- National Climate Statistic Report
- Pilot Survey on Sex, Age and Disability Disaggregated Data (SADDD) for Climate Change Adaptation (CCA) and Disaster Risk Reduction
- Rural, Agricultural and Fishery Census
- Omnibus Survey: Environmental Quality and Behaviour
- Waste Generation Survey

There is a growing number of NSOs conducting specialized surveys to illustrate the importance of this topic.

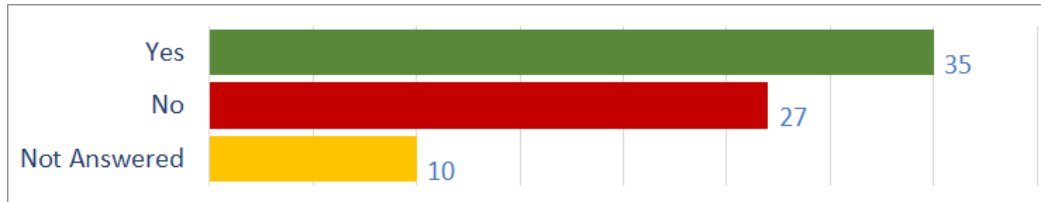
- Nepal – Climate Change Impact Survey (2016)
- Bangladesh – Climate Change/Disasters Survey (2021)





## General remarks on Part 1

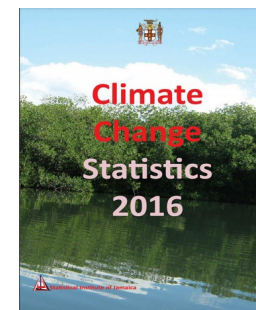
D7 Has the NSO produced and disseminated climate change statistics either in hard copy, electronically or online?



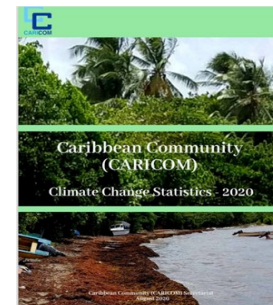
- 25 productions made available in environment statistics compendium and yearbooks.
- 12 in chapters and sections in a statistical yearbook.
- 24 in other formats, including:
  - Database and website; Electronic statistical tables; Official Statistics Portal; Online synthesis; Shared Environmental Information System Indicators; National Accounts; Annual Environment Accounts; Sistema de Información sobre Cambio Climático

There is a growing number of NSOs/regional institutions producing separate climate change statistics reports.

- **National**
  - Jamaica – Climate Change Statistics Report (2016)
  - Tanzania – National Climate Change Statistics Report (2020)
  - Suriname – report being planned (2022)
- **Regional**
  - CARICOM – Climate Change Statistics (2020)
  - ESCWA – Climate change-related statistics in the Arab region (2017)



Jamaica



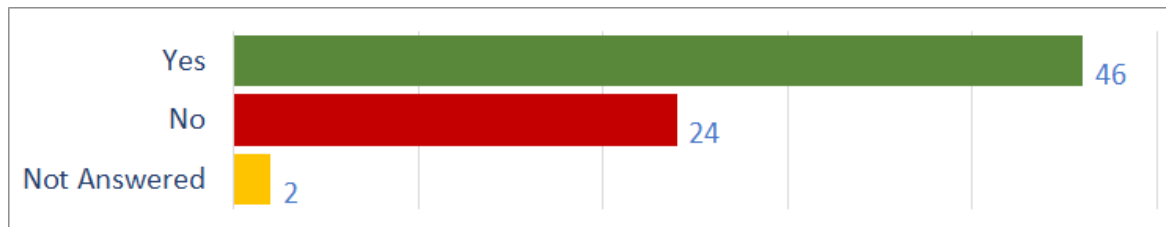
CARICOM



# General remarks on Part 1

## Section E. Inter-institutional collaboration

E1. Does the NSO currently collaborate with the national focal points to the UNFCCC?



The degree and nature of these collaboration varies greatly. Twelve countries identified the collaboration as “ad-hoc.” Others indicated the relation with national focal points such as:

- Communication is upon request but no formal relationship;
- Direct or indirect Involvement;
- Participation of the meeting/technical committee;
- Legal obligation for some countries;
- Formal institutional agreement does not exist in other countries;
- Consultation of sectorial data in collaboration include:
  - Economic data;
  - Energy balance;
  - Agriculture, animal production;
  - Infrastructure, transport, housing, etc.

NSOs sometimes are also in charge of the quality of the data and validate data.

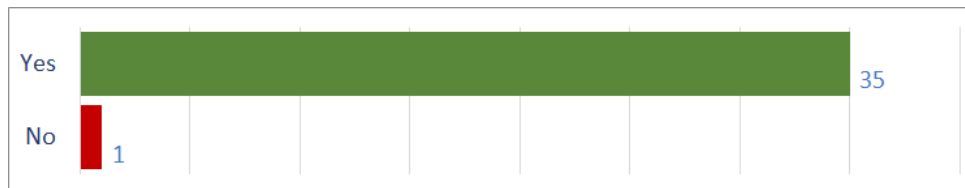


## General remarks on Part 1

E2. Is there a committee, inter-institutional working group or task force in place to coordinate the production of environment statistics?

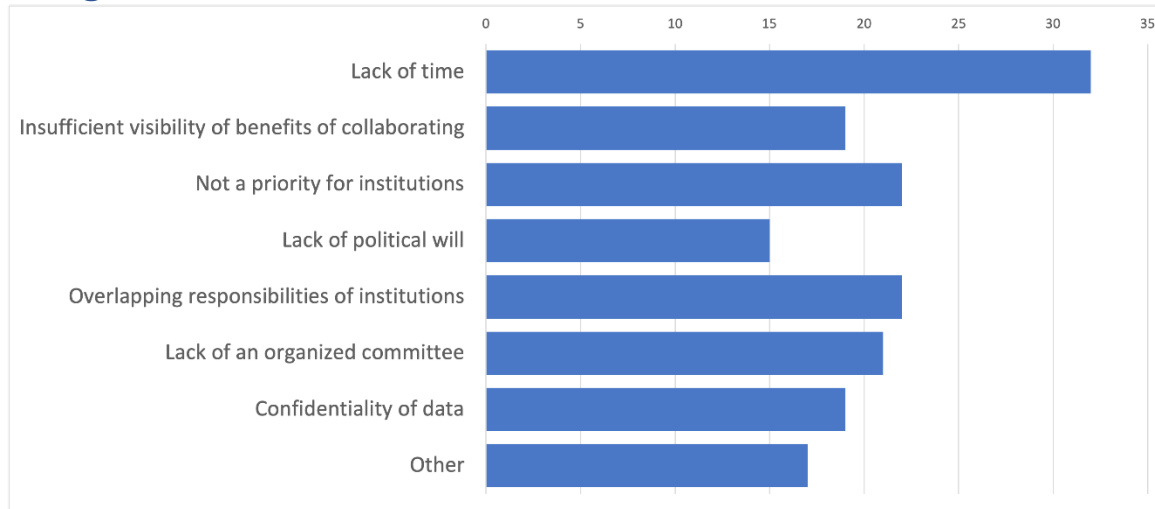


E3. If Question E2 answer is Yes, does it also include climate change statistics?



## General remarks on Part 1

### E5. What are the main barriers to collaboration among institutions for the production of climate change statistics?



#### Examples of Other

- Información en construcción, además del no reconocimiento de los tipos de fuentes de datos.
  - Falta de recursos humanos y financieros.
  - The strong lobby of farmers organizations opposing the climate targets.
  - There is a need to reinforce and improve the collaboration among all departments, units and institutions working on climate change statistics and information
- The production of climate change statistics discusses at one-time meetings and in other groups related to climate change projects.
  - The very broad scope of climate statistics.
  - Lack of resources for production of climate change statistics; lack of human resources; lack of human and technical resources; lack of resources to do all the work (first item above only refers to 'regular meetings'); lack of data sharing policy within and outside the government agencies.
  - Data gaps, periodicity and timeliness of data and non-availability of detailed segregated data.
  - Limited information is available. Most information required is readily available on public domain website. However, arrangements still to be made to formalise working relations including specialised resources.
  - Political instability.



## Global Consultation: Part II - overall summary

- Countries recognized the importance of the Global Set, its relevance to their national statistical and climate change systems, and its potential to serve as a keystone for further climate related data development.
- Invaluable inputs were received from countries with regard to assessing the relevance, methodological soundness and data availability for the 134 indicators and 194 underlying statistics contained in the Global Set.
- Based on these results all indicators and statistics are expected to remain in the list demonstrating its overall robustness.
- Countries and agencies provided comments on the indicators and the metadata, including its structure.
- Very few countries and agencies proposed new indicators, while there were some suggestions for modification of existing indicators, especially at Tier 3.
- Results were discussed at the 8<sup>th</sup> meeting of the Expert Group on Environment Statistics (EGES) (12-20 Oct 2021)

[https://unstats.un.org/unsd/envstats/fdes/fdes\\_eges8.cshtml](https://unstats.un.org/unsd/envstats/fdes/fdes_eges8.cshtml)



# Recent and planned actions of UNSD

- Capacity development:
  - latest activities in the region
    - UNSD/CARICOM Regional Workshop on Environment Statistics and Climate Change Statistics (Grenada, Nov 2019) [in which UNFCCC/ECLAC] participated (<https://unstats.un.org/unsd/envstats/meetings/2019-Caricom%20Region/CaricomRegion.cshtml>)
    - National workshop on Environment Statistics and Climate Change Statistics organized by the CSO of Grenada (Grenada, Nov 2019) (<https://unstats.un.org/unsd/envstats/meetings/2019-Grenada/Grenada.cshtml>)
  - collaborate with ECLAC/CARICOM on DA12 project in the region
- **Update Global Set and related metadata (based on Global Consultation and 8<sup>th</sup> meeting of the EGES) for submission to the 53rd session of the Statistical Commission, in March 2022, for adoption.**
- Further explore ways with UNFCCC to strengthen the relationship between NSOs and national authorities reporting climate change information.
  - Provide continuous support to countries beyond the Global Consultation, including capacity development/information sessions on climate change statistics.
  - Develop training materials and implementation guidelines/strategy for capacity development based on information received via the Global Consultation after the adoption of the Global Set.

# Recommendations

- Review the submission on the Global Set engaging all stakeholders involved in climate change data reporting and policy.
- Utilize/establish inter-agency working group on environment (climate change) statistics to facilitate data coordination and reporting.
- Promote complementarity among global, regional and national sets of climate indicators, to encourage harmonization across all levels. The Global Set is flexible enough, with a tiering system, to be applied based on regions', as well as countries', priorities and data availability.
- Seek support for capacity development through international and regional funding opportunities such as the Green Climate Fund, the Global Environment Facility, the United Nations and bilateral donors.



# Thank you for your attention!

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Climate Change Statistics Website

<https://unstats.un.org/unsd/envstats/climatechange.cshtml>

and

[https://unstats.un.org/unsd/envstats/ClimateChange\\_StatAndInd\\_global.cshtml](https://unstats.un.org/unsd/envstats/ClimateChange_StatAndInd_global.cshtml)

