

Working Paper

Understanding the Transparency Guidance

Oeko-Institut Working Paper 7/2021

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Abstract

At the climate change conference in Glasgow in November 2021, the 'guidance for operationalizing the modalities, procedures and guidelines for the enhanced transparency framework' was adopted. This guidance, together with other decisions adopted in Glasgow, completes the so-called 'Paris Agreement Work Programme' and lays out the details needed for reporting and reviewing climate-change related information under the Paris Agreement.

The guidance agreed in Glasgow has to be read together with the modalities, procedures and guidelines (MPGs) adopted in 2018, and it covers a wide range of technical elements, from reporting tables for greenhouse gas inventories to a training programme for review experts.

This paper provides an overview of the contents of the guidance and its links to the MPGs. It is intended for readers interested in the reporting provisions of the transparency framework who did not follow the negotiations on these topics but would like to gain an understanding of the guidance and its implications for reporting and review under the Paris Agreement.

Zusammenfassung

Auf der Klimakonferenz in Glasgow im November 2021 wurde der "Leitfaden für die Umsetzung der Modalitäten, Verfahren und Leitlinien für den erweiterten Transparenzrahmen" verabschiedet. Dieser Leitfaden vervollständigt zusammen mit anderen in Glasgow angenommenen Beschlüssen das sogenannte "Arbeitsprogramm des Pariser Abkommens". Er legt die Details fest, die für die Berichterstattung und Überprüfung von klimarelevanten Informationen im Rahmen des Pariser Abkommens erforderlich sind.

Der in Glasgow angenommene Leitfaden muss zusammen mit den 2018 verabschiedeten Modalitäten, Verfahren und Leitlinien (MPGs) gelesen werden und deckt ein breites Spektrum an technischen Elementen ab, von Berichtstabellen für Treibhausgasinventare bis zu einem Schulungsprogramm für Überprüfer.

Dieses Papier gibt einen Überblick über den Inhalt der Leitlinien und ihre Beziehungen zu den MPGs. Es richtet sich an Leserinnen und Leser, die sich für die Berichterstattung unter dem Transparenzrahmen interessieren, die die Verhandlungen zu diesen Themen nicht verfolgt haben, aber die Leitlinien und ihre Auswirkungen auf die Berichterstattung und Überprüfung unter dem Pariser Abkommen verstehen möchten.

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List of Abbreviations

AFOLU	Agriculture, Forestry and Land Use
BTR	Biennial Transparency Report
CGE	Consultative Group of Experts
CH ₄	Methane
CMA	Conference of the Parties serving as the meeting of the Parties to the Paris Agreement
CO ₂	Carbon dioxide
COP	Conference of the Parties
CORSIA	Carbon Offsetting and Reduction Scheme for International Aviation
CRF	Common Reporting Format
CRT	Common Reporting Tables
FX	Flexibility (notation key)
GEF	Global Environment Facility
GWP	Global Warming Potential
HWP	Harvested Wood Products
IE	Included Elsewhere (notation key)
IPCC	Intergovernmental Panel on Climate Change
IPPU	Industrial Processes and Product Use
ITMO	Internationally Transferred Mitigation Outcome
LULUCF	Land Use, Land-Use Change and Forestry
MPGs	Modalities, Procedures and Guidelines (for the transparency framework for action and support referred to in Article 13 of the Paris Agreement)
N ₂ O	Nitrous oxide
NDC	Nationally Determined Contribution
NID	National Inventory Document
REDD+	Reducing Emissions from Deforestation and Forest Degradation and the Role of Conservation, Sustainable Management of Forests and Enhancement of Forest Carbon Stocks
SBI	Subsidiary Body for Implementation
SBSTA	Subsidiary Body for Scientific and Technical Advice
SO ₂	Sulfur dioxide

SO _x	Sulfur oxides
TERR	Technical Expert Review Report
UN	United Nations
UNFCCC	United Nations Framework Convention on Climate Change

1 Introduction

The Paris Agreement introduced a framework for the global response to climate change, which requires all its Parties to pursue ambitious actions. The detailed provisions for the implementation of the agreement were negotiated in the years following its adoption in 2015, and they were finalised at the UN climate change conference in Glasgow in November 2021.

The provisions which were finalised in Glasgow include the ‘guidance for operationalizing the modalities, procedures and guidelines for the enhanced transparency framework’ (‘transparency guidance’ in short).¹ This guidance provides reporting tables and outlines, to be used by Parties when they report information on climate action and support in line with the modalities, procedures and guidelines for the transparency framework adopted at the climate change conference in Katowice in 2018.

At the Glasgow conference, Parties agreed on a comprehensive package, consisting of a 54-page document and a separate set of Excel tables². Many changes and additions were made during the final days of the negotiations and some changes are linked to other decisions adopted in Glasgow, such as those on finance and on cooperative approaches under Article 6 of the Paris Agreement. Therefore, the resulting guidance may be difficult to understand for those who did not follow the negotiations closely.

Hence, this paper provides insights into the decision text and its annexes, discussing their background and pointing out links to related topics. The paper is intended for readers who would like to gain an overview and enhanced understanding of the transparency guidance, especially those who will use it in the coming years when they prepare biennial transparency reports under the transparency framework.

1.1 The enhanced transparency framework under the Paris Agreement

Article 13 of the Paris Agreement established an ‘enhanced transparency framework for action and support’ (transparency framework, in short). Under this framework, all Parties are required to regularly provide information on greenhouse gas emissions and removals and information necessary to track progress made in implementing and achieving their nationally determined contributions (NDCs). In addition, the framework covers information related to climate change impacts and adaptation and information on financial, technology and capacity-building support to developing countries.

The transparency framework is seen by many as the ‘backbone’ of the Paris Agreement because it ensures that information is made available regularly on the progress made towards the goals of the Paris Agreement. The framework also aims at building mutual trust among Parties.

Besides the reporting of information, the transparency framework covers a technical expert review and a facilitative, multilateral consideration of progress among Parties, as depicted in Figure 1.

¹ At the time of writing of this working paper, the transparency guidance is available as advance unedited version at <https://unfccc.int/documents/310499>. A final version can be expected to be available on the UNFCCC website shortly, as part of the addendum to the report of the CMA.

² The separate set of tables, the common reporting tables for greenhouse gas inventories, can be found at <https://unfccc.int/documents/311076>.

	Reporting	Review	Consideration of reports
Paris Agreement (All countries)	<div style="border: 1px solid blue; padding: 2px;">Biennial transparency report</div> <div style="border: 1px solid blue; padding: 2px;">National inventory report</div>	<div style="border: 1px solid red; padding: 2px;">Technical expert review</div>	<div style="border: 1px solid red; padding: 2px;">Facilitative, multilateral consideration of progress</div>
Convention	<div style="border: 1px solid blue; padding: 2px;">Biennial report (Developed countries)</div> <div style="border: 1px solid blue; padding: 2px;">Biennial update report (Developing countries)</div>	<div style="border: 1px solid red; padding: 2px;">Technical expert review (Developed countries)</div> <div style="border: 1px solid red; padding: 2px;">Technical analysis (Developing countries)</div>	<div style="border: 1px solid red; padding: 2px;">Multilateral assessment (Developed countries)</div> <div style="border: 1px solid red; padding: 2px;">Facilitative sharing of views (Developing countries)</div>
Convention	<div style="border: 1px solid blue; padding: 2px;">National communication (All countries)</div> <div style="border: 1px solid blue; padding: 2px;">Annual national inventory report (Developed countries)</div>	<div style="border: 1px solid red; padding: 2px;">Technical review (Developed countries)</div> <div style="border: 1px solid red; padding: 2px;">Technical review (Developed countries)</div>	

Arrangements which will be superseded by the arrangements under the Paris Agreement

Arrangements which will continue, but can be combined with the arrangements under the Paris Agreement

Figure 1: Reporting, review and consideration of reports under the Paris Agreement and under the Convention.

As can be seen in Figure 1, some elements of the transparency framework already exist under the United Nations Framework Convention on Climate Change (UNFCCC). Parties can therefore build upon experiences with the implementation of these elements. However, the requirements for developing countries become more comprehensive under the Paris Agreement than under the Convention. Under the Convention, they were not required to provide national inventory reports, and their reports were no subject to review. To facilitate the transition to the new reporting requirements, developing countries are granted specific flexibilities, and support is available to fulfil these requirements.

In 2024, the biennial reports and biennial update reports under the Convention will be superseded by the reports under the Paris Agreement. The other reports under the Convention, namely the national inventory reports which are due annually for developed country Parties and the national communications, will continue to be submitted, but they can be combined with the submissions of biennial transparency reports under the Paris Agreement.

1.2 The role of improved reporting over time and enhanced ambition

One of the guiding principles of the transparency framework is the improvement of reporting over time, as depicted in Figure 2.



Figure 2: The cycle of improved reporting over time and enhanced ambition.

Information provided in biennial transparency reports is subject to a technical expert review and to the facilitative multilateral consideration of progress. The committee which was established under Article 15 of the Paris Agreement may be involved in case of inconsistencies in the information provided. The outcomes of these processes can then be used by the Parties to improve their reporting. In addition, the information collected under the transparency framework helps Parties in the review of their individual progress towards the goals of the Paris Agreement and in increasing their ambition.

Finally, the information collected under the transparency framework constitutes an important input to the global stocktake, which addresses the collective progress towards the goals of the agreement, and which informs Parties in updating and enhancing their NDCs.

1.3 The ‘modalities, procedures and guidelines’ and the ‘transparency guidance’

While Article 13 of the Paris Agreement laid out the main elements of the transparency framework, more specific guidelines were agreed later, as depicted in Figure 3. At the UN climate change conference in Katowice in 2018 the ‘modalities, procedures and guidelines (MPGs) for the transparency framework for action and support referred to in Article 13 of the Paris Agreement’ were agreed. The MPGs were adopted by the Conference of the Parties serving as the meeting of the Parties to the Paris Agreement (CMA), and they can be found in the annex to decision 18/CMA.1³. The MPGs lay out the information to be provided in the reports under the transparency framework and the modalities for the technical expert review and the facilitative, multilateral consideration of progress.

However, the MPGs left open various details, including the reporting tables and the outlines of the reports. These were agreed at the UN climate change conference in Glasgow in 2021 in the ‘Guidance for operationalizing the modalities, procedures and guidelines for the enhanced transparency framework referred to in Article 13 of the Paris Agreement’ (‘transparency guidance’ in short)⁴.

³ Decision 18/CMA.1, pages 18 to 52 of the addendum to the report of the CMA, <https://unfccc.int/documents/193408>.

⁴ CMA decision, advance unedited version available at <https://unfccc.int/documents/310499>.

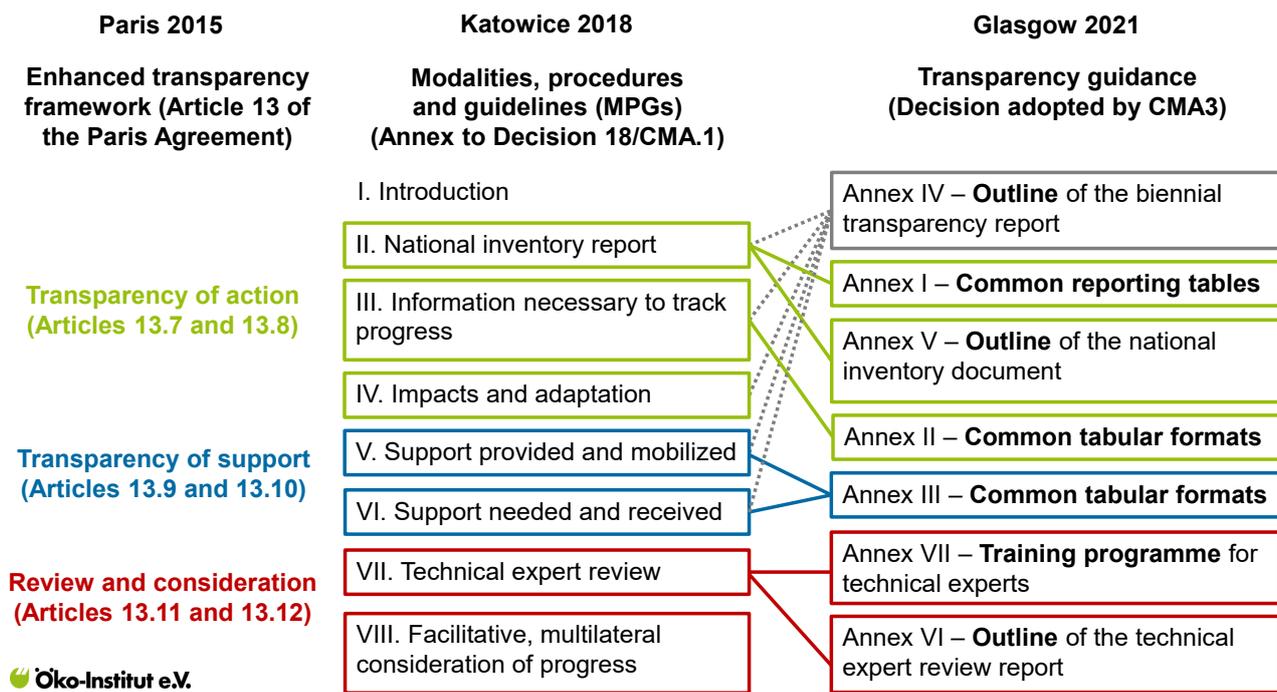


Figure 3: Elements of Article 13 of the Paris Agreement, chapters of the MPGs, and elements of the transparency guidance.

It can be seen in Figure 3 that the transparency guidance adopted in Glasgow provides further provisions for most elements of the MPGs. For the national inventory report, it provides common reporting tables and an outline; for information necessary to track progress and information on support, it provides common tabular formats, and for the technical expert review it provides a training programme and an outline. In addition, the outline of the biennial transparency report covers all elements of action and support.

In the following chapters, the various elements of the transparency guidance are explained in more detail. Chapter 2 addresses the paragraphs in the decision text, and chapter 3 provides an overview of the various annexes to this decision.

2 The paragraphs of the transparency guidance and their context

The decision adopted in Glasgow consists of several pages of decision text, followed by seven annexes. In this chapter, the context of the paragraphs of the decision text and the relationship to other decisions are explained. Figure 4 provides an overview of the topics addressed by the decision text.

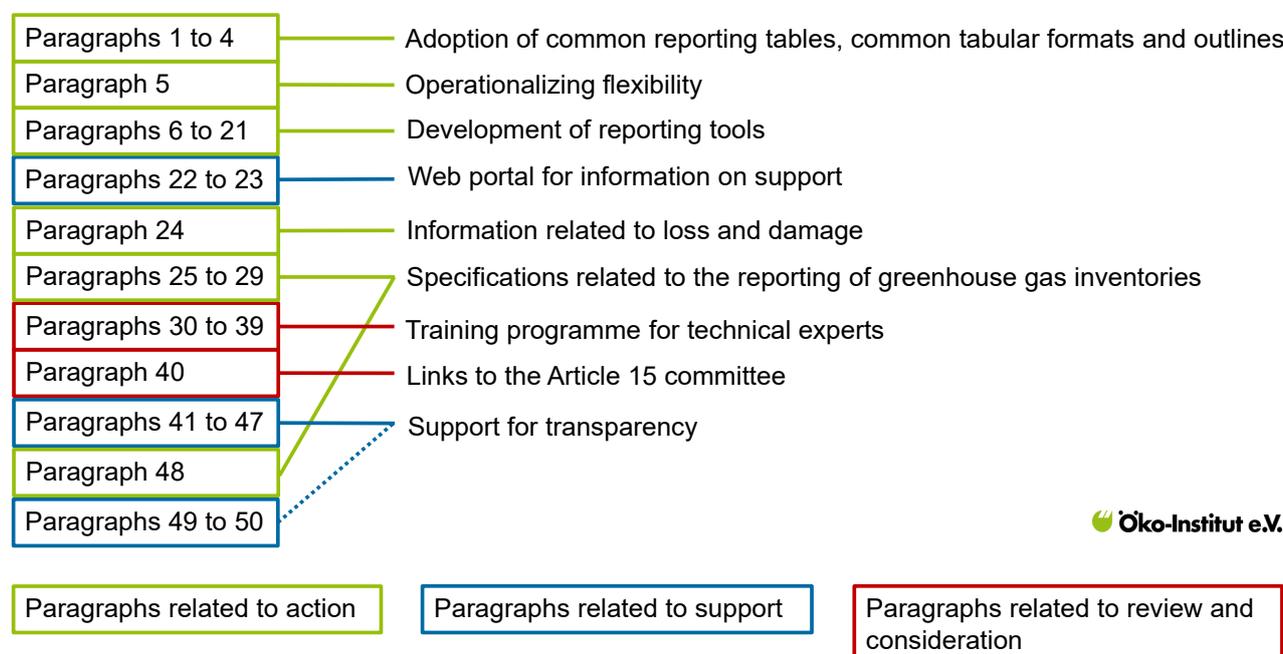


Figure 4: Topics addressed by the various paragraphs of the transparency guidance.

2.1 Adoption of common reporting tables, common tabular formats and outlines (paragraphs 1 to 4)

The decision text starts with recalling Article 13 of the Paris Agreement and various earlier decisions. These include the decision on the MPGs (18/CMA.1), the CMA decision on the Article 15 Committee (20/CMA.1)⁵ and various Conference of the Parties (COP) decisions on reporting and review under the Convention (17/CP.8 and others). Decision 1/CP.24 is the cover decision of COP24 in Katowice⁶. It is important because it governs how reporting under the Convention is related to reporting under the transparency framework. It specifies, inter alia, that Parties may submit their national communication and biennial transparency report as a single document.

In paragraph 1 of the decision text, the main elements of the transparency guidance are adopted:

- The common reporting tables (CRT) for greenhouse gas inventories (see chapter 3.1, below, for more details);

⁵ Decisions 18/CMA.1 and 20/CMA.1 can be found in the addendum to the report of the CMA held in Katowice, <https://unfccc.int/documents/193408>

⁶ Decision 1/CP.24 can be found in the addendum to the report of the COP held in Katowice, <https://unfccc.int/documents/193360>

- the common tabular formats (CTF) for information necessary to track progress in implementing and achieving NDCs (see chapter 3.2);
- the CTF for financial, technology and capacity building support (see chapter 3.3);
- the outlines for the biennial transparency report (BTR), the national inventory document (NID) and the technical expert review report (TERR) (see chapter 3.4); and
- the training programme for technical experts participating in the technical expert review (see chapter 3.5).

2.1.1 Legal status

Paragraph 2 to 4 specify the legal status of the elements, i.e. whether they are mandatory or voluntary. According to paragraph 2, Parties are *encouraged* to prepare their BTR and NID in accordance with the respective outlines. Although the adherence to the outlines facilitates comparability between Parties and facilitates the technical expert review, Parties in Glasgow did not agree on making the outlines mandatory. It should be noted that the use of outlines for reporting under the Convention is not mandatory either. As an example, the requirement for using the outline for the national inventory report under the Convention is a 'should' requirement. Experience with current reporting shows that most Parties report using the outlines despite the fact that they are not legally binding.

Unlike the BTR and NID outlines, the use of the TERR outline is mandatory. According to paragraph 3, the technical expert review team *will* follow this outline.

Paragraph 4 reaffirms what was agreed in Katowice, i.e. that each Party shall report certain information related to the tracking of progress in a narrative and common tabular format, as applicable. In the run-up to the negotiations in Glasgow, Parties had differing interpretations concerning the applicability of narrative vs. tabular formats. Some Parties argued that tabular formats may not be needed for some types of NDCs, while others pointed out that the common tabular formats need to accommodate all types of NDCs. In Glasgow, Parties agreed on the wording that 'the information provided in the common tabular format may be further complemented by other formats in a Party's BTR, as applicable'. As the common tabular formats agreed in Glasgow accommodate all types of NDCs, at least some information needs to be provided in tabular format, but additional information may be provided in the BTR.

The decision text does not further specify the legal status of the CRT and CTF. However, it was already specified in the MPGs in Katowice that each Party *shall* provide a national inventory report, which consists of an NID and the CRT (paragraph 38 of decision 18/CMA.1). It was also specified in the various chapters of the MPGs which CTF shall be provided. As examples, each Party *shall* provide information on mitigation actions in tabular and narrative format (paragraph 80 of decision 18/CMA.1), and each *developed* country Party *shall* report information on financial support provided and mobilised in a tabular format (paragraphs 118 and 123 of the annex to decision 18/CMA.1).

2.2 Operationalising flexibility (paragraph 5)

One of the important principles of the transparency framework is the need to provide flexibility to those developing country Parties that need it in the light of their capacities. Parties agreed in Katowice in which areas developing country Parties can apply flexibility if they do not possess the capacity to fulfil all reporting requirements. As examples, there is specific flexibility related to the reporting of emissions of fluorinated gases and related to the length of the inventory time series.

In the run-up to Glasgow and during the conference, there were debates as to how to address such flexibility in the reporting tables. Some developing country representatives pointed out that the application of flexibility would result in many empty fields in the reporting tables, and these empty fields may be difficult to justify internally and to the general public. In the end, negotiators in Glasgow agreed on an approach which is specified in paragraph 5 and which allows for three options:

- (a) To enter a notation key 'FX' (for flexibility) in each relevant cell;
- (b) to collapse rows or columns where 'FX' is reported in each cell; and/or
- (c) to collapse tables related to fluorinated gases where 'FX' is reported in each cell; and/or to indicate the first and last year of the inventory time series and to generate columns and tables only for the years in this selected time series.

All three options maintain a complete set of information because reporters have to specify for each entry whether flexibility applies or not. They are also required to explain the application of flexibility in a documentation box, and if information is collapsed, it can be expanded again for display purposes. Figure 5 illustrates how these options could be implemented in the CRT, using as an example a part of Table 2(II), taken from Annex I to the transparency guidance.

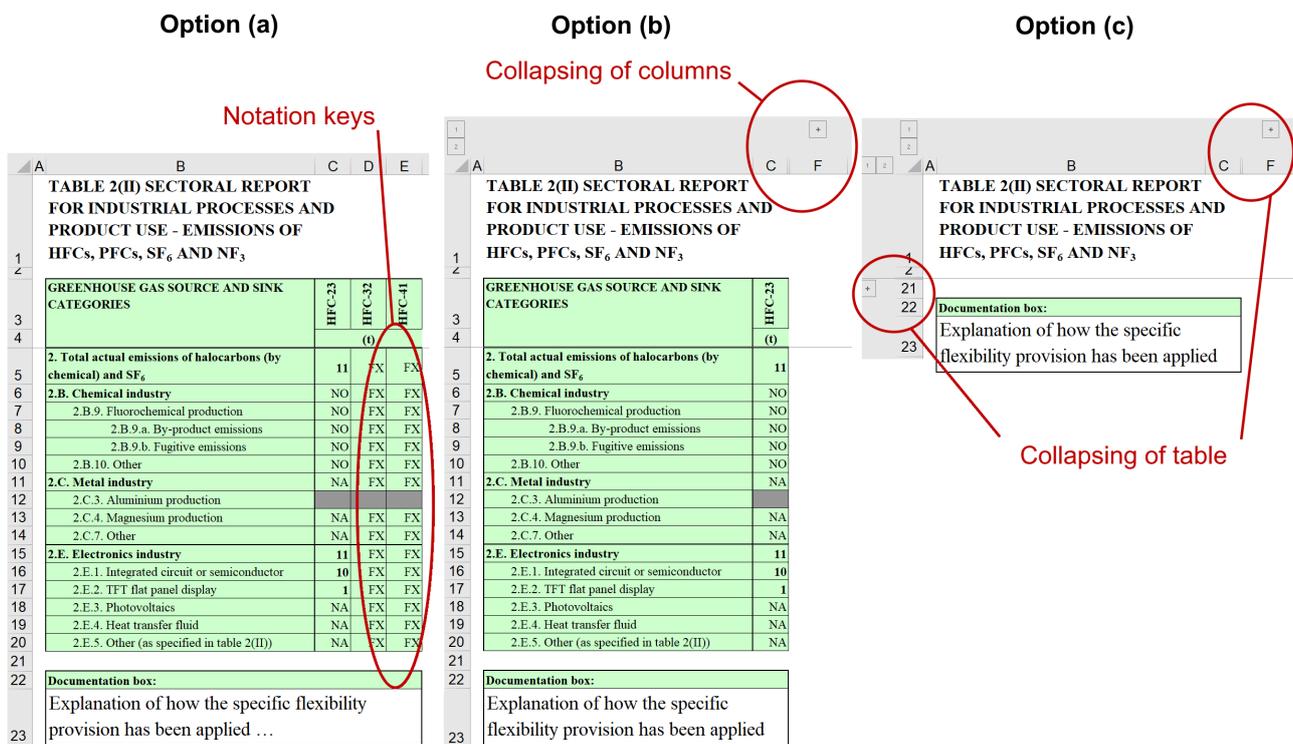


Figure 5: Illustration of the options for flexibility, using a part of a common reporting table.

Source: Excerpt of Table 2(II) of the common reporting tables for greenhouse gas inventories, version 2.60, <https://unfccc.int/documents/311076>; authors' illustration.

Option (c) also specifies that two thresholds have to be indicated. These are:

- The threshold for the key category analysis, which is 95 % but may be reduced to a threshold no lower than 85 % by developing country Parties that need flexibility in the light of their capacities (paragraph 25 of the MPGs).

- The threshold of insignificance of source categories, which is 0.1 % but may be increased to 0.2 % (for the complete rules for this threshold, see paragraph 32 of the MPGs).

2.3 Development of reporting tools (paragraphs 6 to 21)

The information to be reported in CRT and CTF will be submitted using electronic reporting tools. Paragraphs 6 to 21 provide guidance for the development of these tools. For reporting under the Convention, two such tools already exist: The 'Common Reporting Format (CRF) Reporter' for greenhouse gas inventory information, and the 'Biennial Report-CTF application' for common tabular formats which are submitted together with biennial reports. Overview information on these tools can be found in the document 'Submission of National Reports' by the UNFCCC secretariat (UNFCCC 2020).

In paragraphs 6 to 8, the UNFCCC secretariat (in the following: the secretariat) is requested to develop reporting tools for the electronic reporting of CRT and CTF, incorporating the approach for flexibility (paragraph 5) and the approach for dealing with confidential information (paragraph 26). A test version is to be made available by June 2023, and the final version by June 2024.

Several Parties pointed out that this timeline does not leave much time for Parties to finalise their first BTR, which is due by 31 December 2024 at the latest. Some which had planned to submit their first BTR early will have to adjust their schedules. In paragraph 17 and 18, a clause was added which specifies that if the reporting tool for the CRT is delayed, Parties can submit their national inventory reports later, and if the reporting tool for the CTF is delayed, Parties can submit these tabular formats later.

2.3.1 Interaction between the Parties and the secretariat

It was important for Parties to be informed about the further development of the reporting tools due to the experience made with the development of the CRF reporter software which was considerably delayed and contained several errors when it was released by the secretariat. Therefore, Parties defined in paragraphs 9 to 13 the interaction between Parties and the secretariat during the development of the software, including regular information by the secretariat, submissions by Parties and technical training workshops.

Once the tools have been completed, the secretariat is requested to organise regular technical training workshops, to develop user manuals and to provide training and advice to developing country Parties (paragraphs 14 to 16).

2.3.2 IPCC inventory software

Many developing countries use the software developed by the Intergovernmental Panel on Climate Change Task Force on National Greenhouse Gas Inventories ('IPCC inventory software') to compile their greenhouse gas inventories⁷. The IPCC Inventory Software implements the simplest Tier 1 methods for all sectors and Tier 2 methods for most categories under energy, industrial processes and product use (IPPU) and waste sectors, as well as agriculture categories under the Agriculture, Forestry and Land use (AFOLU) Sector in the 2006 IPCC Guidelines for National Greenhouse Gas

⁷ IPCC Task Force on National Greenhouse Gas Inventories, Inventory Software, <https://www.ipcc-nggip.iges.or.jp/software/index.html>

Inventories (IPCC 2006). The IPCC Task Force on Inventories is currently working on making the software compatible with the Tier 2 methods for the land component of the AFOLU Sector.

In paragraphs 19 to 21 of the transparency guidance, the secretariat is requested to facilitate the interoperability between the new reporting tools and the IPCC inventory software. The IPCC is also invited to engage in this work and to organize in the second half of 2024 a workshop on how to link its inventory software with the CRT reporting tool.

2.4 Web portal for information on support (paragraphs 22 and 23)

In paragraphs 22 to 23, the secretariat is requested to establish an interactive web portal for the information in accordance with paragraphs 118 to 145 of the MPGs, which is the information on support provided and mobilized, and needed and received. The portal is to be made available from December 2025.

This web portal was brought up during the negotiations in Glasgow because Parties were not able to agree on summary tables for support. As Parties agreed on the CTF for support strictly in line with the MPGs, there is no space for reporting aggregated information such as ‘total contributions through multilateral channels’ or ‘total contributions for adaptation’. The web portal, once operational, will allow for displaying such information by parameter and by year.

For data reported under the Convention, the following interactive web portals already exist:

- The Biennial Reports Data Interface, which allows to search and display data on greenhouse gas inventories, targets, policies and measures, projections, and financial, technology and capacity building support provided.⁸ This tool allows for displaying aggregated data on financial support provided by Party, by year and by various parameters such as type of support.⁹
- The greenhouse gas data interface, which contains greenhouse gas time series data and country profiles.¹⁰

2.5 Information related to loss and damage (paragraph 24)

The transparency framework under Article 13 of the Paris Agreement covers information on mitigation, adaptation and support, but it does not include information on averting, minimising or addressing loss and damage. As the topic of loss and damage is of particular importance to many developing countries, Parties agreed in Katowice to provide room for the reporting on loss and damage, namely in the chapter of the BTR which deals with climate change impacts and adaptation (paragraph 115 of the MPGs).

During the Glasgow conference, several Parties again pointed out the importance of reporting information on loss and damage. Parties agreed to add paragraph 24 to the decision text, which ‘*emphasizes* that each interested Party may provide, as appropriate, information related to [...] loss and damage’. The space where this information may be provided is chapter III.G of the biennial

⁸ Biennial Reports Data Interface, <https://www4.unfccc.int/sites/br-di/Pages/Home.aspx>

⁹ Data interface for displaying summary information on financial support, <https://www4.unfccc.int/sites/br-di/Pages/FinancialSupportSummary.aspx>

¹⁰ Greenhouse gas data from UNFCCC, <https://unfccc.int/process-and-meetings/transparency-and-reporting/greenhouse-gas-data/ghg-data-unfccc/ghg-data-from-unfccc>

transparency report. The outline for this report can be found in Annex IV on pages 38 to 41 of the transparency guidance. For more information on this outline, see chapter 3.4.1, below.

2.6 Specifications related to the reporting of greenhouse gas inventories (paragraphs 25 to 29 and 48)

2.6.1 Global warming potentials

Paragraphs 25 to 29 provide some clarifications related to the reporting of greenhouse gas inventories. It was already decided in Katowice that Parties shall use the 100-year time-horizon global warming potential (GWP) from the IPCC Fifth Assessment Report (IPCC 2013b) to report aggregate emissions and removals of greenhouse gases, expressed in CO₂ equivalents (paragraph 37 of the MPGs). However, such GWPs are listed in two locations in chapter 8 of this report and again in the supplementary material (IPCC 2013a). Some of the GWPs listed include climate-carbon feedbacks, while others partly include these feedbacks, and there are separate values for methane and for fossil methane.

The transparency guidance clarifies in paragraph 25 which GWP values are to be used: The values from the appendix to chapter 8 (table 8.A.1) shall be used, excluding the value for fossil methane (cf. Figure 6). The value for fossil methane takes into account the warming effect of CO₂ which forms when methane is converted to CO₂ in the atmosphere. However, the use of this value would lead to an over-estimation of the effect of biogenic methane emissions, such as in the agriculture and waste sector. The same would be true for the estimation of emissions from combustion, because the IPCC emission factors assume a 100 % conversion rate from carbon to CO₂ – this includes carbon that is emitted as methane and converted into CO₂ in the atmosphere.

Acronym, Common Name or Chemical Name	Chemical Formula	Lifetime (Years)	Radiative Efficiency (W m ⁻² ppb ⁻¹)	AGWP 20-year (W m ⁻² yr kg ⁻¹)	GWP 20-year	AGWP 100-year (W m ⁻² yr kg ⁻¹)	GWP 100-year	AGTP 20-year (K kg ⁻¹)	GTP 20-year	AGTP 50-year (K kg ⁻¹)	GTP 50-year	AGTP 100-year (K kg ⁻¹)	GTP 100-year
Carbon dioxide	CO ₂	see*	1.37e-5	2.49e-14	1	9.17e-14	1	6.84e-16	1	6.17e-16	1	5.47e-16	1
Methane	CH ₄	12.4†	3.63e-4	2.09e-12	84	2.61e-12	28	4.62e-14	67	8.69e-15	14	2.34e-15	4
Fossil methane†	CH ₄	12.4†	3.63e-4	2.11e-12	85	2.73e-12	30	4.68e-14	68	9.55e-15	15	3.11e-15	6
Nitrous Oxide	N ₂ O	121†	3.00e-3	6.58e-12	264	2.43e-11	265	1.89e-13	277	1.74e-13	282	1.28e-13	234
Chlorofluorocarbons													
CFC-11	CCl ₃ F	45.0	0.26	1.72e-10	6900	4.28e-10	4660	4.71e-12	6890	3.01e-12	4890	1.28e-12	2340
CFC-12	CCl ₂ F ₂	100.0	0.32	2.69e-10	10,800	9.39e-10	10,200	7.71e-12	11,300	6.75e-12	11,000	4.62e-12	8450
CFC-13	CClF ₃	640.0	0.25	2.71e-10	10,900	1.27e-09	13,900	7.99e-12	11,700	8.77e-12	14,200	8.71e-12	15,900

Figure 6: Excerpt of table 8.A.1 in the contribution of Working Group 1 to the IPCC Fifth Assessment Report.

Source: IPCC (2013b). Global warming potentials to be used in greenhouse gas inventories under the transparency framework are marked in red. Not all gases are shown in this excerpt of the table.

It should be noted that, in addition to the 100-year GWP, Parties may use other metrics to report aggregate emissions (paragraph 37 of the MPGs). However, for comparability between Parties it is important that all use one common metric, and for consistency over time it is important that this metric does not change during an NDC implementation period.

2.6.2 Disaggregated data

Paragraphs 25 and 26 of the transparency guidance address a concern raised by several developing country Parties, namely that they may not be able to report disaggregated data, either because these

data would reveal confidential business or military information, or because data are available at an aggregated level only due to the lack of detailed data sources.

Hence, the CMA decision recalls that a minimum level of aggregation is needed to protect confidential business and military information and that in case of confidentiality issues a Party shall provide related information to the technical expert review team. In case of a lack of disaggregated data, the notation key 'IE' (for 'included elsewhere') may be used when filling in the respective sections of the inventory reporting tables.

2.6.3 2019 Refinement to the 2006 IPCC Guidelines

In paragraph 28 of the transparency guidance, the CMA notes that Parties may use on a voluntary basis the 2019 Refinement to the 2006 IPCC Guidelines for National Greenhouse Gas Inventories (IPCC 2019).¹¹ At the time the MPGs were adopted in 2018, the 2006 IPCC Guidelines (IPCC 2006) were the most recent inventory guidelines, and it was decided that these guidelines shall be used for inventory reporting. Now that a refinement to these guidelines is available, it was important to several Parties to point out that this refinement may also be used in order to allow Parties to make use of the latest available science.

2.6.4 Mapping of categories

The common reporting tables for GHG inventories contained in Annex I to the transparency guidance are largely based on the tables currently used by developed countries for inventory reporting under the Convention, the common reporting format (CRF) tables. During the negotiations, representatives of developing countries pointed out that the structure and naming conventions in these tables show various differences to the tables in the 2006 IPCC Guidelines. As an example, the common reporting tables contain separate tables for the sectors agriculture and land use, land use change and forestry (LULUCF), while the tables in the 2006 IPCC Guidelines contain tables for the AFOLU sector.

These differences can be explained by decisions made by Parties in Katowice, when they decided to introduce the two separate sectors of agriculture and LULUCF, and by decisions made when the original CRF tables were adopted. As time was limited and Parties were not able to discuss all differences in the tables, they requested, in paragraph 29 of the transparency guidance, the secretariat to undertake a mapping exercise – to compare the categories in the 2006 IPCC Guidelines to the categories contained in the common reporting tables agreed in Glasgow.

2.6.5 Inventory submission date

Finally, paragraph 48 addresses another aspect related to greenhouse gas inventories. While all Parties to the Paris Agreement shall submit their biennial transparency reports and national inventory reports by 31 December 2024 and every two years thereafter, developed country Parties still have to submit their annual greenhouse gas inventories by the date specified under the Convention, which is 15 April of each year. These Parties may combine the submission of their inventories under the Convention and under the Paris Agreement. However, due to the late completion date of the CRT reporting tool (cf. chapter 2.3, above), this may not be possible for the first biennial transparency report.

¹¹ The IPCC 2019 Refinement is available at: <https://www.ipcc-nggip.iges.or.jp/public/2019rf/index.html>

2.7 Training programme for technical experts (paragraphs 30 to 39)

In order to have a sufficient number of experts available for the review of biennial transparency reports, it was decided in Katowice to develop a training programme for these experts. Further details for this training programme were defined in paragraphs 30 to 39 and in Annex VII to the transparency guidance.

In paragraph 30 and 31, the secretariat is requested to develop and implement such a training programme. A major open issue during the negotiations was the role of the Consultative Group of Experts (CGE) in the development of this programme. The CGE provides capacity-building to developing countries in the area of transparency, and it developed a training programme for the technical analysis of biennial update reports, but it has limited expertise related to the development of review training programmes. In the end, Parties agreed on wording that requests the secretariat to incorporate, as appropriate, technical advice from the CGE and the lead reviewers (a group of reviewers experienced in reviews under the Convention) when developing and implementing the training programme.

Paragraphs 32 to 34 contain further requests to the secretariat, namely to report to the Subsidiary Body for Scientific and Technical Advice (SBSTA) on progress in the development of the training programme, to make the courses available beginning 1 March 2023, and all courses by September 2023, to promote geographical and gender balance and to give special consideration to experts from developing countries.

2.7.1 Voluntary review of information on climate change impacts and adaptation

According to Article 13 of the Paris Agreement, information on climate change impacts and adaptation is not subject to review. Such information is to a high degree dependent on national circumstances and more difficult to compare than information such as greenhouse gas emissions. Furthermore, the related reporting requirements are not mandatory while the review is focussed on the mandatory information. However, before and during the negotiations in Glasgow several developing countries voiced their interest in a voluntary review of information on climate change impacts and adaptation.

Parties finally agreed on paragraphs 35 to 39, which note that information on impacts and adaptation (i.e. information pursuant to chapter IV of the MPGs) is not covered by the scope of the technical expert review, but voluntary review of such information is not prohibited. They also note that Parties have expressed interest in such a voluntary review, and they recognize the important role which such a review could play in improving the reporting on impacts and adaptation. Finally, they request the SBSTA to consider the options for conducting voluntary reviews of information on climate change impacts and adaptation, and they invite Parties to submit their views on these matters by 30 April 2022.

2.8 Link to the Article 15 committee (paragraph 40)

Under Article 15 of the Paris Agreement, a committee was established with the aim to facilitate implementation of the Paris Agreement and to promote compliance with its provisions. According to the modalities and procedures of this committee, which were agreed in Katowice in 2018, the committee may, with the consent of the Party concerned, engage in a facilitative consideration of issues in cases of significant and persistent inconsistencies of the information submitted under the

transparency framework. This consideration will be based, inter alia, on the recommendations made in the final technical expert review reports.¹²

During the negotiations in Glasgow, some Parties suggested to specifically address, in the outline of the technical expert review report, the link between the technical expert review and the Article 15 committee. However, others pointed out that the tasks of reviewers were clearly defined in the MPGs and that the review should not address topics such as significant and persistent inconsistencies, which are part of the mandate of the Article 15 committee.

Parties finally agreed to address the link to the Article 15 committee in a paragraph of the decision text, rather than in the outline of the technical expert review report. In paragraph 40, the committee is invited to liaise with lead reviewers, as needed, when identifying cases of significant and persistent inconsistencies referred to in decision 20/CMA.1 (the decision on the modalities and procedures for the committee). Hence, the committee can make use of the expertise of lead reviewers, but the responsibility to identify cases of significant and persistent inconsistencies clearly lies with the committee, rather than with the technical expert review team.

2.9 Support for transparency (paragraphs 41 to 47 and 49 to 50)

The reporting of information under the transparency framework poses challenges to developing countries because the provisions are more comprehensive than they are currently under the Convention. In the run-up to the negotiations in Glasgow, many developing countries pointed out that in their view a comprehensive guidance for transparency can only be agreed if it is combined with a package that includes financial and capacity building support for developing countries. This package should help these countries prepare for their first and subsequent biennial transparency reports. In Glasgow, Parties agreed on such a package which covers a range of topics from training by the UNFCCC secretariat to financial support by the Global Environment Facility and capacity building support by the CGE.

2.9.1 Training for electronic reporting

In paragraph 41, developed country Parties, and other Parties on a voluntary basis, are invited to provide financial resources to enable the secretariat to provide training to all Parties on using the common reporting tables and common tabular formats and the corresponding reporting tools. Such support is of particular importance for developing countries, because – unlike developed countries – they were not yet required under the Convention to report information in such tabular formats.

2.9.2 Consideration of support for transparency under the Paris Agreement

In the negotiations under the Subsidiary Body for Implementation (SBI), there is a regular agenda item on 'provision of financial and technical support.' Under this item, the Global Environment Facility (GEF) reports, inter alia, on the support which it provides to developing countries for the preparation of their reports under the Convention, i.e. national communications and biennial update reports.

Many developing country representatives pointed out that there is no agenda item which considers the support to developing countries for transparency-related activities under the Paris Agreement. Hence, Parties agreed in Glasgow that the CMA will consider at its next session and at each session thereafter an item on 'reporting and review pursuant to Article 13 of the Paris Agreement: provision

¹² Decision 20/CMA.1, addendum to the report of the CMA held in Katowice, <https://unfccc.int/documents/193408>.

of financial and technical support to developing country Parties for reporting and capacity-building.’ Under this agenda item, Parties will consider the support provided to developing country Parties for reporting under the transparency framework, and related capacity-building (paragraph 42 of the decision text).

2.9.3 Role of the Global Environment Facility

As the GEF is the main source of support for reporting, the CMA decision text contains several additional paragraphs addressing the GEF. The CMA recognizes the need for enhanced support (paragraph 43), it welcomes the arrangements which have already been made by the GEF for supporting the preparation of BTRs (paragraph 44), and it takes note of the CMA decision ‘Guidance to the Global Environment Facility’ (paragraph 45).¹³ In this separate decision, the GEF is requested, *inter alia*, to consider increasing its support for the transparency framework and developing an expedited process for projects related to preparing BTRs.

The CMA decision also encourages developing country Parties to prepare and submit project proposals to the GEF for preparing BTRs (paragraph 46).

2.9.4 Role of the Consultative Group of Experts

The CGE will play an important role in supporting the implementation of the transparency framework by developing countries. In paragraph 47 of the CMA decision, the CGE is invited to take into account paragraph 1, *i.e.* the common reporting tables, common tabular formats, outlines and training programmes adopted there.

It should be noted that the CGE is already deeply involved in work related to the implementation of the transparency framework. As an example, the CGE published a ‘Technical handbook for developing country Parties on preparing for implementation of the enhanced transparency framework under the Paris Agreement’ (CGE 2020).

2.9.5 Budgetary implications

Throughout the CMA decision, the UNFCCC secretariat is requested to conduct a number of new activities. Hence, paragraphs 49 and 50 take note of the budgetary implications of these activities and request that these actions be undertaken subject to the availability of financial resources. The wording in these paragraphs is similar to the wording in other decisions which request the secretariat to undertake new activities.

¹³ At the time of writing of this working paper, the CMA decision ‘Guidance to the Global Environment Facility’ is available as advance unedited version at <https://unfccc.int/documents/310504>.

3 The annexes to the transparency guidance

The CMA decision adopted in Glasgow contains seven annexes – one annex for common reporting tables, two annexes for common tabular formats, three annexes for outlines and one annex addressing the review training programme. Many of the tables presented in the annexes are based on formats which are currently used by developed countries for reporting under the Convention. However, several tables were extended, and new tables were developed, e.g. for the reporting by developing countries on support needed and received.

In this chapter, an overview of the annexes of the transparency guidance is provided, and the main differences to the reporting formats under the Convention are discussed.

3.1 Annex I – Common reporting tables for greenhouse gas inventories

Annex I to the transparency guidance does not contain the actual tables, but refers to a separate Excel file, which contains the ‘common reporting tables for the electronic reporting of the information in the national inventory reports of anthropogenic emissions by sources and removals by sinks of greenhouse gases’. At the time of writing this working paper, version 2.60 of the Excel file was available.¹⁴ It consists of 60 tables (worksheets). Figure 7 provides an overview of these tables.

Tables 1	Sectoral report for energy 11 background tables for energy
Tables 2	2 sectoral reports for industrial processes and product use (IPPU) 3 background tables for IPPU
Tables 3	Sectoral report for agriculture 8 background tables for agriculture
Tables 4	Sectoral report for land use, land-use change and forestry (LULUCF) 13 background tables for LULUCF
Tables 5	Sectoral report for waste 4 background tables for Waste
‘Summary’	3 summary reports (sources and sinks; CO ₂ equivalents; methods and emission factors)
Tables 6-9	5 cross-cutting reports (indirect emissions; key categories; recalculations; completeness)
Tables 10	6 trend tables (CO ₂ equivalents; CO ₂ ; CH ₄ ; N ₂ O; fluorinated gases; summary)
‘Flex’	Summary table on the use of flexibility provisions

Figure 7: Overview of common reporting tables.

¹⁴ Common Reporting Tables (CRT), 13 November 2021, <https://unfccc.int/documents/311076>

In this working paper, the CRT will not be discussed in detail, but we discuss some main differences to the common reporting format (CRF) currently used for reporting by developed country Parties under the Convention. We also discuss the operationalization of flexibility in the CRT.

3.1.1 Selected differences between the CRF and the CRT

Each of the CRTs (except the summary table on the use of flexibility provisions) contains a note relating to the **minimum level of aggregation**. It reads as follows: 'Note: Minimum level of aggregation is needed to protect confidential business and military information, where it would identify particular entity's/entities' confidential data.' The addition of this note is related to the discussion of disaggregated data (cf. chapter 2.6.2). The note was added to allow all Parties to agree on a complete set of mandatory sectoral and background tables. It provides an assurance to those Parties that may not have disaggregated data available in all cases. The concept of reporting aggregated instead of disaggregated data is not new; it is used by many Parties reporting their greenhouse gas inventories under the Convention. Where disaggregated data are not available and reported as part of another category, the notation key 'IE' (included elsewhere) can be used.

The sectoral report tables 1, 2, 3 and 5 and the 'summary 1' table allow for the reporting of emissions of **sulfur oxides** (SO_x). This is in line with paragraph 51 of the MPGs, which states that each Party should provide information on sulfur oxides. However, it is different from the CRF, where sectoral report tables 1, 2 and 5 and the 'summary 1' table allow for the reporting of sulfur *dioxide* emissions (SO₂). The switch from SO₂ to SO_x is of little importance in practice because the majority of emitted SO_x is SO₂ and only small fractions of sulfur trioxide can arise (EEA 2019). Emission factors are mostly available for SO_x, rather than SO₂ (e.g. EEA 2019).

Several background tables in sectors 1, 2 and 5 include columns for **recovery**, next to the columns for emissions. The following footnote was added to each of these columns: 'Enter the amount of GHGs captured as a negative number since this amount is subtracted from total of each GHGs produced respectively.' This constitutes a change in the reporting convention, because in the CRF tables, recovery is reported as positive rather than negative numbers. The CRT reporting tool can be set up in a way that ensures that only negative numbers are entered, and that the absolute values are subtracted correctly.

Next to tables 4.A to 4.E, a separate column for 'Additional information – **simple decay approach** – Carbon transferred to HWP' was added. This addition was made on request by a Party that uses this approach to estimate emissions and removals from harvested wood products (HWP). This column is not part of the reporting table and does not need to be filled by Parties that use other approaches, such as the production approach, for estimating emissions and removals from HWP.

Finally, one additional table was added to the CRT to address the operationalization of flexibility for those developing country Parties that need it in the light of their capacity. This table is discussed in the following section.

3.1.2 Operationalizing flexibility

The basic approaches for operationalizing flexibility in the CRT are introduced in paragraph 5 of the transparency guidance. They include the use of the notation key 'FX' and the collapsing of certain rows, columns and tables (cf. chapter 2.2, above). In the various tables, no additional guidance (such as footnotes) is given on how to operationalize this flexibility. The possibility to enter notation keys and to collapse specific rows, columns and tables will be implemented in the CRT reporting tool.

However, two footnotes address flexibility in the CRT: In table 7 on **key categories**, footnote (1) explains that those developing country Parties that need flexibility in the light of their capacities have the flexibility to identify key categories using a threshold no lower than 85 % in place of the 95 % threshold. This is a reiteration of paragraph 25 of the MPGs. Parties that apply this flexibility fill in the same CRT 7, but they report fewer key categories, depending on the threshold used.

In table 9, footnote (2) reiterates the provision from paragraph 32 of the MPGs on the **threshold of insignificance**. Developing country Parties that need flexibility in the light of their capacities can apply a higher threshold of insignificance and therefore report more categories as 'NE' than other Parties (in line with the detailed rules specified in paragraph 32 of the MPGs). These Parties list these categories in Table 9 under 'sources and sinks not estimated'.

Finally, an additional table was added, on request by many developing countries, which allows to transparently summarize the use of flexibility provisions. This table, entitled '**Summary table on the use of flexibility provisions**' allows to list specific flexibility provisions, to specify where they are applied (year, sector, category, gas), to explain how they are applied and to specify related capacity constraints, timeframes and progress made in addressing areas of improvement.

A note below the table clarifies that this table is used on a voluntary basis. If developing country Parties apply flexibility but decide not to use this table, they are required to provide related information in the BTR and/or NID, in line with paragraph 6 of the MPGs.

3.2 Annex II – Common tabular formats for tracking progress

Annex II to the transparency guidance contains a total of 13 tabular formats, to be used for reporting the information specified in chapter III of the MPGs – the information necessary to track progress made in implementing and achieving NDCs. Not all tabular formats need to be filled in by all Parties, and the information provided in these formats may be complemented by other formats in the BTR (narrative, figures etc.), as stated in paragraph 4 of the transparency guidance.

Figure 8 provides an overview of the common tabular formats for tracking progress, and how they are related to the various sections and paragraphs of the MPGs.

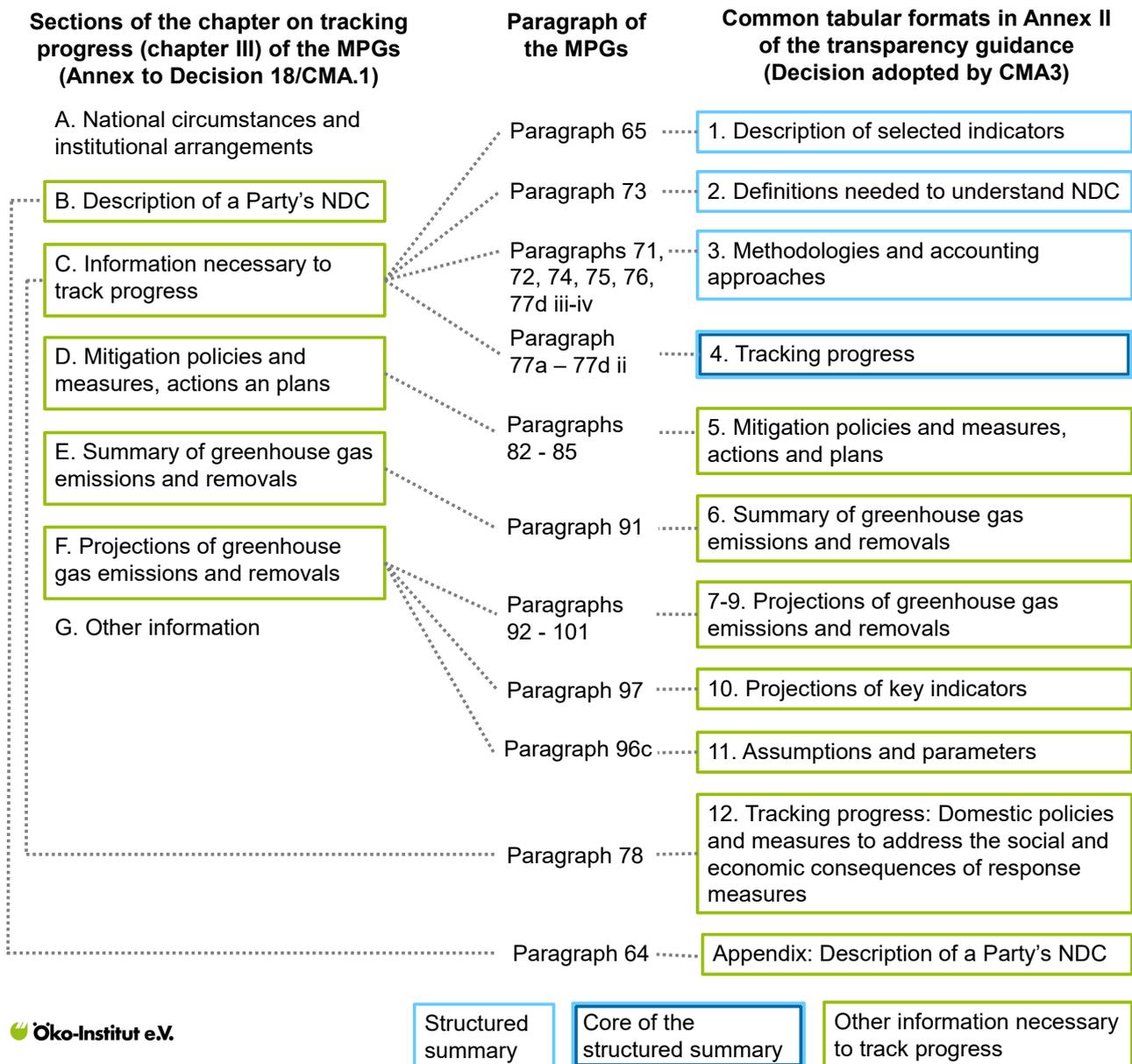


Figure 8: Overview of common tabular formats for tracking progress.

As indicated in Figure 8, the first four tabular formats are known as the ‘structured summary’. This is because paragraph 77 of the MPGs states that ‘each Party shall provide the information referred to in paragraph 65-76 above in a structured summary [...]’. The structured summary in a narrow sense, or its core, is covered by CTF 4. It addresses the specific information listed in paragraph 77.

In the following, an overview of the various common tabular formats is provided.

3.2.1 Structured summary (CTF 1 to 4)

The first three common tabular formats address background information which is necessary to transparently track progress in the implementation and achievement of NDCs.

First, **CTF 1** allows for listing one or more indicators which are selected by the Party to track its progress in implementing and achieving its NDC. As a typical example, such an indicator could be the total emissions and removals of greenhouse gases within the boundaries of the country. The

information for the reference point(s), level(s), baseline(s), base year(s) or starting point(s) could be the total emissions and removals in the base year, e.g. in 1990.

Next, **CTF 2** provides space for definitions needed to understand each indicator, and other definitions needed to understand the NDCs. Finally, **CTF 3** addresses information on the accounting approach. This information is consistent with the accounting guidance (Annex II to decision 4/CMA.1)¹⁵ which was adopted in Katowice. Such information may include lengthy text and it may be more practical to provide it in the BTR, instead of using the table. Therefore, CTF 3 allows for entering references to the relevant section(s) of the BTR.

CTF 4 is the core of the structured summary – it allows for comparing the target or targets of the NDC to the progress made so far, by using selected indicators. While all Parties have to enter information on indicators, on greenhouse gas emissions (as applicable) and on achievement, a large part of this CTF is relevant only for Parties that use cooperative approaches. Specifically, this part is relevant for Parties that

- participate in cooperative approaches that involve the use of internationally transferred mitigation outcomes (ITMOs) towards an NDC (this would be the participation in voluntary cooperation under Article 6 of the Paris Agreement), or
- authorizes the use of mitigation outcomes for international mitigation purposes other than achievement of the NDC (this would be e.g. the use of credits under the Carbon Offsetting and Reduction Scheme for International Aviation – CORSIA).

In Glasgow, CTF 4 was negotiated in parallel to the guidance on cooperative approaches under Article 6¹⁶. In several rows of the CTF, references are made to the CMA decision on this guidance, which provides more details including the rules for determining the information to be reported in CTF 4. This information is needed to transparently document the so-called ‘corresponding adjustments’: Parties that make use of ITMOs to achieve their NDC target, as well as Parties that authorize the use of ITMOs, have to adjust their emissions (or other indicators) according to specific rules, in order to ensure that emission reductions are not double-counted.

Each of the **CTF 1 to 4** contains a note below the table, which explains that:

- 1) Pursuant to paragraph 79 of the MPGs, each Party shall report the information referred to in paras. 65–78 of the MPGs in a narrative and common tabular format, as applicable.
- 2) A Party may amend the reporting format (e.g. Excel file) to remove specific rows in this table if the information to be provided in those rows is not applicable to the Party’s NDC under Article 4 of the Paris Agreement, in accordance with the MPGs.
- 3) The Party could add rows for each additional selected indicator.

This note is a result of intense discussion among Parties about the applicability of narrative vs. common tabular formats. While many Parties argued that some information has to be provided in common tabular format in any case, others argued that it depends on the type of NDC and on choices of the Party which information will be provided in tabular vs. narrative format.

¹⁵ Annex II to Decision 4/CMA.1, pages 12 to 13 of the addendum to the report of the CMA, <https://unfccc.int/documents/193407>

¹⁶ At the time of writing of this working paper, the guidance on cooperative approaches referred to Article 6, paragraph 2 of the Paris Agreement is available as advance unedited version at <https://unfccc.int/documents/310510>.

According to the note, Parties may add or remove rows from the common tabular formats. This approach hampers comparability and poses challenges to the technical expert review team. On the other hand, it is still possible to track progress, provided that all information defined in the MPGs is available in the biennial transparency report.

3.2.2 Mitigation policies and measures, actions and plans (CTF 5)

The common tabular format for mitigation policies and measures, actions and plans is similar to the CTF which is currently in use by developed country Parties when reporting on policies and measures under the Convention (Decision 19/CP.18)¹⁷.

The CTF requires the entering of information such as the name and description of each measure and estimates of greenhouse gas emission reductions. Footnotes provide details on the various columns to be filled in, in line with what was agreed in paragraphs 80 to 86 of the MPGs.

3.2.3 Greenhouse gas emissions and removals (CTF 6)

Under CTF 6, no common tabular format is provided, but it is stated that each Party that submits a stand-alone national inventory report (i.e. a report which is submitted separately from the BTR and from the CTF) shall provide a summary of its greenhouse gas emissions and removals. It follows from the heading of CTF 6 that this summary is to be in accordance with the common reporting table 10 (cf. chapter 3.1).

The CRT 10 provides information on emission and removal trends. Parties can report the same information which they submitted in CRT 10 also in CTF 7. In current reporting under the Convention, developed country Parties also provide in a CTF some of the information which they already submitted with their greenhouse gas inventories.

3.2.4 Information on projections (CTF 7 to 11)

A total of five CTF address the projections of greenhouse gas emissions and removals. CTF 7 to 9 are almost identical; they are intended for reporting **'with measures', with additional measures' and 'without measures' scenarios**. According to the MPGs, each Party *shall* report a 'with measures' scenario and *may* report the other scenarios; those developing countries that need flexibility in the light of their capacities are *encouraged* to report information on projections.

Projected emissions and removals of greenhouse gases are to be reported for each sector, including transport, which is a sub-sector of the energy sector. They are also to be reported separately for each gas, and for years ending in 0 or 5 for at least 15 years. The CTF 7 to 9 are very similar to the CTF currently used by developed country Parties for their biennial reporting under the Convention.

CTF 10 and 11 require the reporting of **key indicators**, and of **key underlying assumptions and parameters used** for the projections. While key variables and assumptions are already reported by developed country Parties under the Convention, the reporting of key indicators is a new requirement under the Paris Agreement. It is related to the fact that many NDCs contain non-greenhouse gas targets. While the progress towards achieving greenhouse gas targets can be tracked using projections of greenhouse gas emissions and removals (CTF 7 to 9), the progress towards non-greenhouse gas targets has to be tracked using CTF 11. An example would be to enter, in CTF 11,

¹⁷ Decision 19/CP.18, addendum to the report of the COP, <https://unfccc.int/documents/7645>

projected values of the share of renewable energy in total electricity generation, if the Party's NDC contains a renewable electricity target.

3.2.5 Domestic policies and measures to address the social and economic consequences of response measures (CTF 12)

The implementation of mitigation measures (also known as 'response measures') has particular consequences in countries whose economies are centred on fossil fuels. These countries have to address the social and economic consequences resulting from a shift away from fossil fuels, e.g. by diversifying their economy and by supporting a just transition of their workforce.

When the MPGs were negotiated in Katowice, it was important for several Parties to be given a space for the reporting on domestic policies and measures to address the social and economic consequences of response measures. This space was provided in the chapter on tracking of progress, in paragraph 78 of the MPGs. In line with this paragraph, a common tabular format – CTF 12 – was included in the transparency guidance.

CTF 12 is to be filled in by Parties that have one of two types of NDCs:

- NDCs that consists of economic diversification plans resulting in mitigation co-benefits; or
- NDCs that consists of adaptation actions resulting in mitigation co-benefits.

For Parties with an NDC that consists of economic diversification plans, it is rather straightforward to fill in CTF 12 because economic diversification is a typical example of a policy that addresses the social and economic consequences of response measures. On the other hand, it may be difficult for Parties with an NDC that consist of adaptation actions to provide the requested information, because they may not have policies or measures in place to address the social and economic consequences of response measures.

Parties with other types of NDCs (e.g. those with emissions reduction targets) are not required to provide the information requested in CTF 12.

3.2.6 Description of a Party's NDC (Appendix)

Like the information related to response measures discussed above, the information on a Party's NDC constitutes a special case because the MPGs do not explicitly require this information to be provided in a common tabular format. In Glasgow, Parties agreed on a tabular format for the description of a Party's NDC, but it was added as an appendix to Annex II and a note was included stating that this table is to be used by Parties on a voluntary basis.

The use of this tabular format for information on the Party's NDC will facilitate the understanding of the information in the BTR, as well as the technical expert review. This situation is comparable to the reporting of 'information to facilitate, clarity, transparency and understanding of NDCs' (annex I to decision 4/CMA.1). While such information is mandatory from the second NDC only, many Parties provided it when they updated their first NDCs in 2020/2021, and many decided to provide this information in a tabular format.

3.3 Annex III – Common tabular formats for support

Annex III contains 13 common tabular formats for support. Figure 9 provides an overview of these CTF.

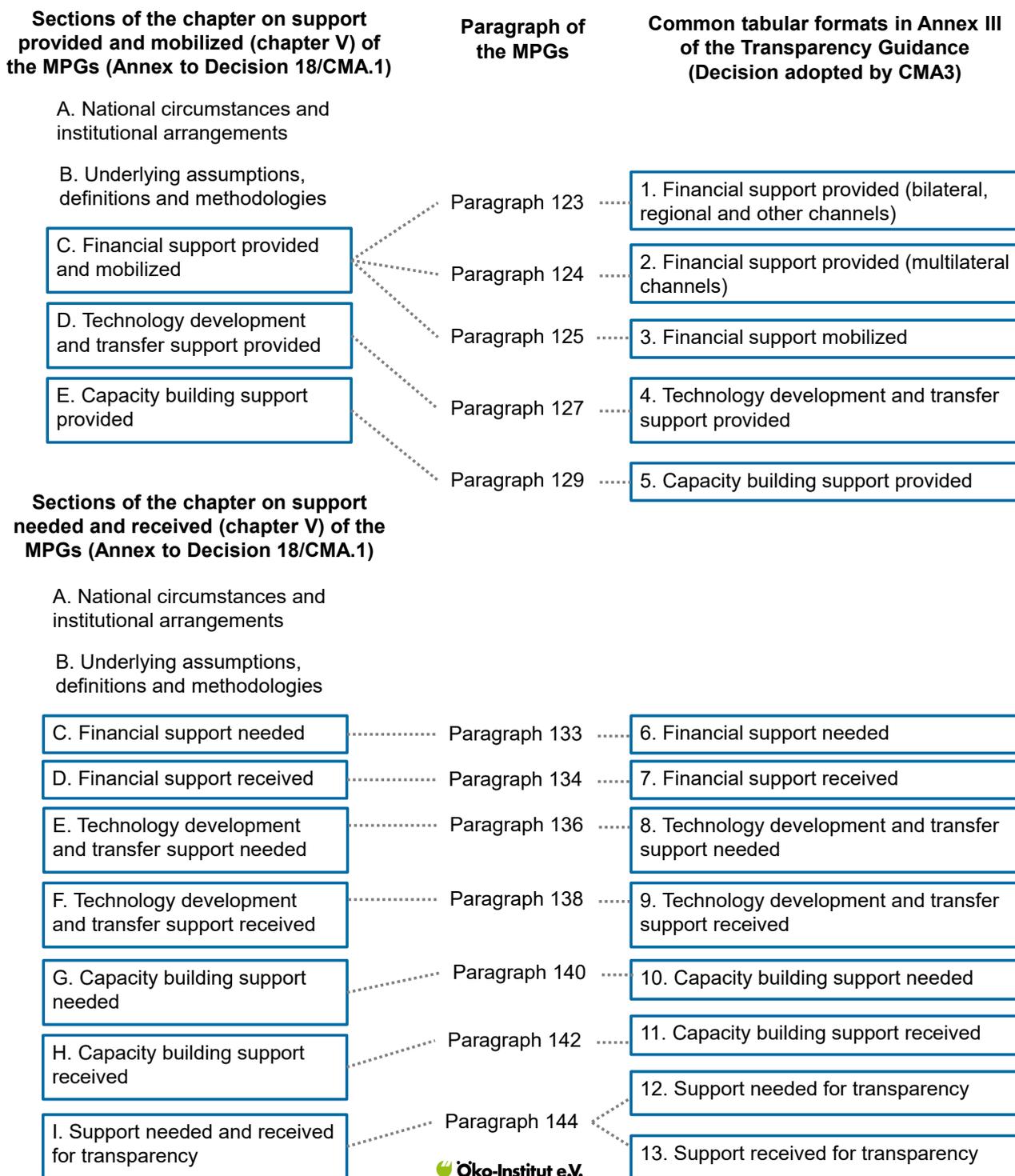


Figure 9: Overview of common tabular formats for support.

In the following, we discuss the main characteristics of these CTF. In this discussion, we distinguish between the CTF for support provided and mobilized, and the CTF for support needed and received.

3.3.1 Common tabular formats for support provided and mobilized (CTF 1 to 5)

CTF for **support provided** are currently used by developed country Parties as part of their biennial reporting under the Convention. Compared to these current CTF, the CTF agreed in Glasgow contain additional columns, including new columns for the title of the project, programme or activity, for the subsector, and separate columns for the face value and grant equivalent of financial support provided. These columns follow the specifications of the MPGs; the MPGs also specify which information is mandatory, voluntary, or to be provided as available.

Besides the four CTF for support provided, which constitute an upgrade of tables already used under the Convention, a new format (CTF 3) was introduced for the reporting on **support mobilized**, following the specifications of the MPGs for information on support mobilized.

Financial support provided or mobilised often contributes to **technology development and transfer or to capacity building**. Hence, Tables 1 to 3 on financial support are linked to tables 4 and 5 on technology and on capacity building. Entries which are shaded in grey in tables 1 to 3 will be populated automatically in tables 4 and 5 in cases where the financial support contributes to technology development and transfer or to capacity building.

Unlike the CTF currently used by developed country Parties for reporting under the Convention, the new CTF do not include a summary table. Parties did not agree on such a table because it is not explicitly mandated by the MPGs. As the data are reported electronically, it will be possible to create aggregated information from the reported data. The web portal which is mandated by paragraph 22 of the transparency guidance can be used to retrieve such information, once the portal is operational (cf. chapter 2.4).

3.3.2 Common tabular formats for support needed and received (CTF 6 to 13)

The reporting of information on support needed and received in a common tabular format constitutes a new requirement for developing countries. However, this is a 'should' requirement, and many developing countries already provided such information in tabular formats in their biennial update reports under the Convention.

The CTF tables 6 to 11 have a similar structure to the tables for support provided and mobilised, but they contain an additional column for the (expected) **use, impact and estimated results** of the support needed and received. This additional reporting element had been agreed in Katowice with the aim to allow for the reporting of information related to the effectiveness of this support.

CTF 12 and 13 are to be used for the reporting of support needed and received, respectively, for the **implementation of Article 13** of the Paris Agreement (such as the drafting of BTRs) and transparency-related activities, including for transparency-related capacity-building.

Each of the CTF 1 to 11 contain the following footnote which refers to the column for additional information: 'Report, to the extent possible, information on the project/programme and implementing agency and provide a link to any relevant documentation and as appropriate, **support to activities related to averting, minimizing and addressing loss and damage** associated with the adverse effects of climate change.' This footnote is the result of the discussions on the reporting on loss and damage (cf. chapter 2.5). While such reporting is not within the scope of Article 13 of the Paris Agreement, several Parties in Glasgow called for the possibility to report on support related to averting, minimizing and addressing loss and damage. Parties did not agree on a separate category for support related to loss and damage, but they agreed on requesting the reporting of such information in the column for additional information.

3.4 Annexes IV to VI – Outlines

Figure 10 provides an overview of the outlines contained in Annexes IV to VI of the transparency guidance. In the following, each of the outlines are discussed briefly.

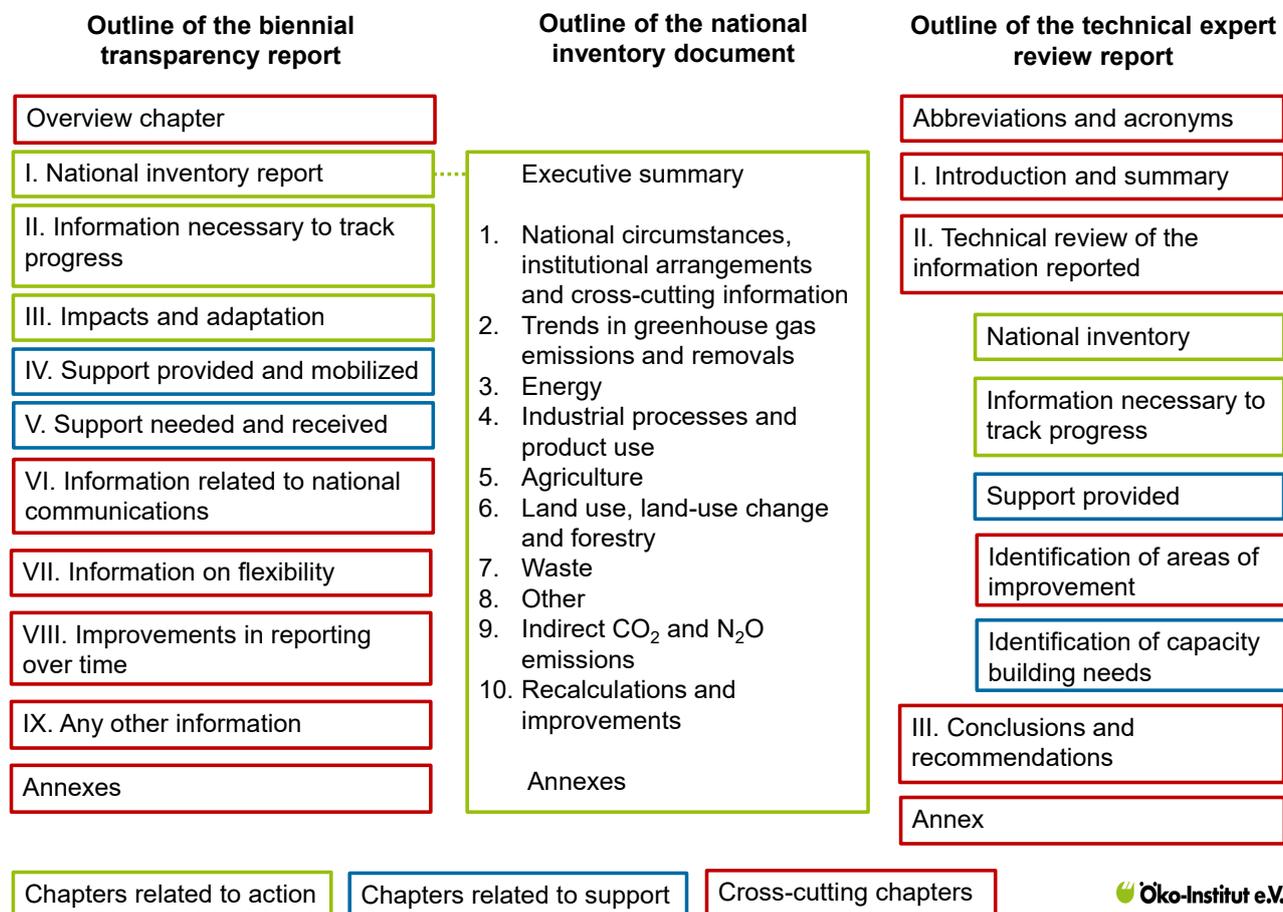


Figure 10: Overview of the BTR, NID and TERR outlines.

3.4.1 Annex IV – Outline of the biennial transparency report

The outline of the biennial transparency report largely follows the headings and sub-headings of the respective chapters of the MPGs. As an example, the subheadings under the MPG chapter ‘Information related to climate change impacts and adaptation [...]’ are identical to the subheadings under the BTR outline heading with the same name. Parties considered providing an annotated outline with more guidance on what to report under which heading. However, due to the limited time available, they were not able to provide such an annotated outline. Hence, when drafting the BTR, Parties will have to make use of the guidance provided in the MPGs. For reference, the BTR outline includes the MPG paragraphs which are relevant for the various headings and sub-headings.

The first chapter, the **national inventory report**, is a special case because it includes the common reporting tables (CRT) and the national inventory document (NID), as defined in the MPGs and explained in footnote (2) of the outline. When preparing the BTR, Parties need to refer to the CRT, which are submitted as an annex, and they are encouraged to use the outline of the NID – either when structuring the chapter on the national inventory report in their BTR, or when drafting a national inventory document which they submit separately.

Chapter II in **information necessary to track progress** will play an important role in supplementing and explaining the information provided in the CTF for tracking progress (cf. chapter 3.2, above). Chapter III addresses **climate change impacts and adaptation**. There is no corresponding tabular format for this information, hence all information will be provided in this chapter of the BTR. Chapters IV and V address information on **support**. The MPGs specify which information is to be provided in textual format in the BTR and which information is to be provided in the CTF.

The subsequent chapters are of a cross-cutting nature and do not directly reflect chapters of the MPGs. Chapter VI allows for the reporting of information which is part of **national communications** under the Convention, and which can be provided together with the BTR if the national communication is submitted jointly with the BTR. Chapters VII and VIII address two important concepts of the transparency framework – **flexibility** and **improvements in reporting over time**. Finally, a separate chapter allows for reporting any other information which the Party considers relevant to the achievement of the objective of the Paris Agreement.

The annexes of the BTR include an **annex related to REDD+** (Reducing Emissions from Deforestation and Forest Degradation and the Role of Conservation, Sustainable Management of Forests and Enhancement of Forest Carbon Stocks). The background for this annex is that developing country Parties were encouraged to contribute to mitigation actions in the forest sector by undertaking certain activities (decision 1/CP.16, paragraph 70). As part of the Warsaw framework for REDD+, developing country Parties seeking to obtain and receive payments for results-based actions were requested to supply a technical annex to their biennial update reports (decision 14/CP.19, paragraph 7). As biennial update reports will be superseded by biennial transparency reports, decision 1/CP.24, paragraph 45, specified that this technical annex shall be submitted as an annex to the biennial transparency report.

Further annexes include the CRT and CTF, and an **annex for information in relation to the Party's participation in cooperative approaches**, as applicable. The latter annex is to be used for information in line with the CMA decision on the guidance for cooperative approaches under Article 6.2¹⁸. It will contain the so-called 'regular information' specified in paragraphs 21 and 22 of the annex to this CMA decision.

3.4.2 Annex V – Outline of the national inventory document

The outline of the NID largely follows the outline of the national inventory report, which is to be submitted annually by developed country Parties under the Convention. During the negotiations, Parties debated whether the outline of the NID should be simpler if it is submitted as part of the BTR. In the end, they agreed on a detailed outline, but it has to be noted that Parties are only *encouraged* and not required to use this outline.

Compared to the outline of the national inventory report under the Convention, the NID outline contains an extended executive summary, and chapter 1 on national circumstances has been re-arranged, to make it consistent with the MPGs. Chapter 10 on recalculations and improvements has also been extended, to cover areas of improvement and/or capacity building in response to the review process and related to the flexibility provisions.

¹⁸ Guidance on cooperative approaches referred to Article 6, paragraph 2 of the Paris Agreement, advance unedited version, <https://unfccc.int/documents/310510>.

3.4.3 Annex VI – Outline of the technical expert review report

The outline of the TERR lists the topics which are subject to review. The details of the review – such as which topics are subject to review of consistency and which ones are subject to consideration – have already been defined in the MPGs. The TERR outline includes references to the relevant paragraphs of the MPGs.

The review of BTRs can be organised in conjunction with the review of national communications under the Convention. In the run-up to the negotiations in Glasgow, Parties debated whether the TERR outline should also provide a space for the results of the review of national communications. However, it was agreed to keep the TERR separate from the review report under the Convention. If national communications are reviewed together with BTRs, two separate review reports will be produced.

3.5 Annex VII – Training programme for technical experts

Annex VII lays out the main elements of the training programme for technical experts participating in the technical expert review, which will be developed by the UNFCCC secretariat, incorporating advice from the CGE and the lead reviewers (cf. chapter 2.7).

The information in this annex remains at a very general level, mainly due to the limited time that was available for negotiating this agenda item. The secretariat can build on the experience it gained during the development of similar training courses for reviews under the Convention.

Compared to the review training programmes under the Convention, the following elements are new or different: Experts who have already participated in training programmes and related technical reviews under the Convention do not need to take examinations for courses that cover the same information. For courses under the Convention, experts were allowed to re-take exams only once. Such a restriction no longer applies.

The following courses are covered, in line with the topics which are subject to review according to the MPGs:

- (a) General and cross-cutting aspects;
- (b) technical review of national inventory reports, with general and sector-specific modules, similar to the courses currently available under the Convention;
- (c) technical review of information necessary to track progress in implementing and achieving NDCs; and
- (d) technical review of the information on financial, technology development and transfer and capacity-building support provided.

4 Outlook

The transparency guidance agreed in Glasgow constitutes an important milestone on the way towards the implementation of the Paris Agreement. It facilitates the reporting by all Parties of detailed information on climate action and support and helps them in tracking their progress towards the goals of the Paris Agreement. The guidance operationalizes the flexibility provisions which were agreed in Katowice in a practical way, while ensuring that the application of flexibility is documented transparently.

Before Parties can draft and submit their first biennial transparency reports, additional work is needed. First, the secretariat needs to develop electronic tools for the reporting of CRTs and CTFs. A timely completion of these tools will be a prerequisite for a successful submission of BTRs by the deadline at the end 2024.

In addition, the SBSTA will continue to work on guidance on the reporting of information related to Article 6 in 2022. This guidance includes detailed rules for corresponding adjustments and tables and outlines for the reporting of Article 6 related information. The outcome of this work programme will provide further guidance on how to fill in the CTF for tracking progress and what to report in the BTR annex on information in relation to the Party's participation in cooperative approaches. Despite this ongoing work, it is an important achievement of the COP in Glasgow that the common tabular formats for the tracking of progress were completed, together with the overall guidance under Article 6.

For each Party, the reporting of information under the transparency framework will pose challenges and will require careful preparation. These challenges are larger for developing countries due to the more extensive reporting requirements compared to the provisions under the Convention. The provision of capacity-building support, and the sharing of experiences already made by other Parties will help in the preparation for reporting.

Finally, experienced and well-trained experts will be needed to review the submitted reports. It will be important that transparency experts will take the training courses once they are available and participate in the reviews of the biennial transparency reports. Thereby, they will contribute to improved reporting over time and to the full implementation of the transparency framework.

List of References

- CGE (2020): Technical handbook for developing country Parties on preparing for implementation of the enhanced transparency framework under the Paris Agreement, 2020. Online available at https://unfccc.int/sites/default/files/resource/ETF%20Technical%20Handbook%20First%20Edition%20June_2020.pdf, last accessed on 25 Nov 2021.
- EEA (2019): EMEP/EEA air pollutant emission inventory guidebook 2019, Technical guidance to prepare national emission inventories. European Environment Agency. Copenhagen, 2019. Online available at <https://www.eea.europa.eu/publications/emep-eea-guidebook-2019>, last accessed on 30 Nov 2021.
- IPCC (2006): 2006 IPCC Guidelines for National Greenhouse Gas Inventories, Prepared by the National Greenhouse Gas Inventories Programme, Eggleston H.S., Buendia L., Miwa K., Ngara T. and Tanabe K. (eds). IGES, Japan., 2006. Online available at <http://www.ipcc-nggip.iges.or.jp/public/2006gl/index.html>, last accessed on 9 Jun 2021.
- IPCC (2013a): Climate Change 2013: The Physical Science Basis. Chapter 8SM - Anthropogenic and natural radiative forcing - supplementary material. Cambridge University Press. Stocker, T.F., D. Qin, G.-K. Plattner, M. Tignor, S.K. Allen, J. Boschung, A. Nauels, Y. Xia, V. Bex and P.M. Midgley (ed.). Cambridge and New York, 2013. Online available at https://www.ipcc.ch/site/assets/uploads/2018/07/WGI_AR5.Chap_8_SM.pdf, last accessed on 25 Nov 2021.
- IPCC (2013b): Climate Change 2013: The physical Science Basis., Contribution of Working Group I to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change. Cambridge University Press. Stocker, T.F., D. Qin, G.-K. Plattner, M. Tignor, S.K. Allen, J. Boschung, A. Nauels, Y. Xia, V. Bex and P.M. Midgley (ed.). Cambridge and New York, 2013. Online available at <https://www.ipcc.ch/report/ar5/wg1/>, last accessed on 25 Nov 2021.
- IPCC (2019): 2019 Refinement to the 2006 Guidelines for National Greenhouse Gas Inventories, 2019. Online available at <https://www.ipcc.ch/report/2019-refinement-to-the-2006-ipcc-guidelines-for-national-greenhouse-gas-inventories/>, last accessed on 30 Nov 2021.
- UNFCCC (2020): Submission of National Reports, Guide for Annex I Parties, 2020. Online available at https://unfccc.int/sites/default/files/resource/Submission%20Guide_Annex%20I_Parties_v2.pdf, last accessed on 25 Nov 2021.