Statistical CommissionBackground documentFifty-fourth sessionAvailable in English only28 February–3 March 2023Item 3(a) of the provisional agendaItems for discussion and decision: Data and indicators for the 2030 Agenda on SustainableDevelopment

# The Collaborative on the Use of Administrative Data for Statistics: practical experience exchange and tool developments

Prepared by Collaborative on Administrative Data

The Collaborative on the Use of Administrative Data for Statistics:

Practical experience exchange and tool developments



# Overview

This background document provides an overview of the work of the Collaborative on the Use of Administrative Data for Statistics (CAD). The CAD is a group which focuses on experience exchange and learning among its members, providing input and ideas on how administrative data can be accesses and used for statistics purposes. The work is process oriented rather than focusing on one specific thematic or subject matter area of work. As part of the exchanges, various gaps in practical guidance and tools have been identified which members of the CAD jointly develop and review for their own use.

In 2022, the CAD has exchanged on various topics including on standards and definitions, on maturity models and on access to administrative data sources. Training materials have been developed and tested which are aimed at giving National Statistical Offices (NSO) and administrative data holders a common platform for exchange around topics such as data sharing and quality assurance of the records. A toolkit has also been developed and is being tested for assessing the quality of administrative data sources.

The document has three main parts:

- 1. A summary of key achievements in 2022, with an emphasis on tools and guidance materials that have been developed for the benefit of the statistical community and administrative data holders
- 2. A more detailed overview of the work of the CAD, and related activities
- 3. A brief overview of preliminary plans for continued work in 2023

The homepage of the Collaborative provides general information and contains many of the tools and guidance materials that are highlighted in this document. Please visit the page here: <a href="https://unstats.un.org/capacity-development/admin-data/">https://unstats.un.org/capacity-development/admin-data/</a>. Some elements of the website are also available in French and Spanish.

#### Membership

The Collaborative is open to new members who want to participate in the experience exchange and learn from others. Interest can be expressed by contacting the co-facilitating agencies, UN Statistics Division (UNSD, represented by Inter-Regional Adviser Vibeke O. Nielsen, <u>vibeke.nielsen@un.org</u>) or the Global Partnership for Sustainable Development Data (GPSDD, represented by Policy Manager Karen Bett, <u>kbett@data4sdgs.org</u>).

# 1. Overview of the CAD

Administrative data collected by governments and service providers in the course of their day-to-day operations is an increasingly important source for the production of official statistics. Many countries are, however, still encountering challenges in this process, from access and data sharing, to processing and quality assuring the data, linking them with other sources and ensuring confidential and secure processes. Responding to this need to further improve processes and learning from others, the United Nations Statistics Division and the Global Partnership for Sustainable Development Data jointly initiated a multi-stakeholder Collaborative in May 2020. It includes more than 25<sup>1</sup> countries as well as roughly the same number of regional and international agencies<sup>2</sup>. Objectives and guiding principles have been jointly formulated to guide the work.

#### Membership

To ensure that the guidance and training materials are readily applicable in a broad range of settings and national contexts, the Collaborative includes technical experts from developed and developing countries and draws on the expertise of UN regional and specialized agencies and other organizations and initiatives.

Membership is open to other actors, particularly to countries who want to increase and improve their use of administrative data for statistical purposes. While the main representatives from countries are from NSOs, they are encouraged to, as much as possible, also involve and engage the Ministries, Departments and Agencies that own and use the administrative data in their countries.

#### Structure

The Collaborative is co-facilitated by UNSD and GPSDD. Much of the work since its initiation has been structured under three task teams:

- Task team 1: Institutional framework, coordination and partnerships
- Task team 2: Data management and standardization
- Task team 3: Technical interoperability and linking

The work in the task teams is led by staff of UNSD and GPSDD jointly with two or three country co-leads. At present, task team 1 is co-led by Chile, Denmark and Kyrgyzstan, task team 2 by Bhutan, Namibia and Norway and task team 3 by Ecuador and Uruguay. The country co-leads meet every 6 weeks to exchange information on ongoing work and to provide feedback and input to the co-facilitators on more general strategic development work including outreach work and planning ahead.

#### Workstreams

<sup>&</sup>lt;sup>1</sup> Bhutan, Cabo Verde, Cameroon, Chile, Colombia, Denmark, Ecuador, Egypt, Ghana, Italy, Kenya, Kyrgyzstan, Mexico, Mongolia, Myanmar, Namibia, Norway, Slovenia, State of Palestine, Suriname, Sweden, Tanzania, Ukraine, United Kingdom, Uruguay and Vanuatu

<sup>&</sup>lt;sup>2</sup> African Development Bank (ADB), Asian Development Bank (AfDB), Development Gateway, District Health Information System (DHIS2), Global Partnership for Sustainable Development Data (GPSDD), Inter-American Development Bank (IADB), International Labor Organization (ILO), Statistical, Economic and Social Research and Training Centre for Islamic Countries (SESRIC), UN Development Project (UNDP), UN Economic Commission for Africa (UNECA), UN Economic Commission for Europe (UNECE), UN Economic Commission for Latin America and the Caribbean (UNECLAC), UN Economic and Social Commission of Asia and the Pacific (UNESCAP), UN Educational, Scientific and Cultural Organization (UNESCO), UN Economic and Social Commission for Western Asia (UNESCWA), UN Population Fund (UNFPA), UN Statistics Division (UNSD), UN Women and World Bank.

Next to the task teams, the Collaborative also set up workstreams in 2022. These workstreams focus on a concrete topic that is cross-cutting and time-bound. Workstream membership is cutting across task teams and encourages all members interested in the specific topic to join the work. The workstreams that were active in 2022 are the following:

- Communication and fundraising
- E-learning course
- IT infrastructure

Work of the workstreams is covered in the overview of activities in chapter 1 of this document.

#### Funding

Much of the work has been carried out through in-kind contributions from the co-facilitating and member countries and organizations.

UNSD has, however, as detailed below, a pot of funds through the Development Account 13 (DA13) tranch of the Department of Economic and Social Affairs. Moreover, a consultant was funded by UN Women from April - December 2022 to support the CAD in its various tasks as well as develop a quality assessment toolkit for administrative data. UN Women also contributed its communication resources to support the VAD through branding and development of communications resources. In addition, the UK FCDO contributed resources to the CAD which were used to develop additional communications resources and social media assets.

# 2. Activities of the CAD in 2022

From the beginning of the Collaborative in June 2020, its members have agreed to focus the work on practical experience exchange and learning across countries and organizations, primarily focusing on cross-cutting and process-oriented challenges related to the use of administrative data sources for statistics production. The achievements of 2022 are the result of this approach. Some of the achievements are a continuation of earlier initiatives and some are new activities. Below is a brief overview of the work, including practical tools and guidance materials that have been developed as part of the work of the Collaborative.

#### i. Training course and e-learning on use of administrative data for official statistics

Collaborative members from all regions have expressed the need for advocacy and training materials related to using administrative data for statistics. Especially need for help to improve the relationships between NSOs and administrative data holders, increasing the data access and sharing and data quality concerns have been raised as key challenges. To address this need, the CAD has since the end of 2021 worked on developing modules and content for a course, for use in person and for e-learning, on the use of administrative data for official statistics.

The course targets both the National Statistical Offices and administrative data holders of a country. The material covers a wide range of topics that have been identified by CAD members and DA13 project countries as key when making use of administrative data for official statistics. Among the topics covered in the course are coordination and communication between the partners, the legal framework and formal agreements for exchange and data sharing, confidentiality and IT security, mapping and quality assessment of data sources, as well as metadata and harmonization of concepts and definitions.

In order to test the course material, it has been piloted in Bhutan and Namibia in 2022. In both countries, participants came from a wide range of ministries as well as the NSO. The course was well received by data holders and the NSO. Trainings are planned to be held in additional countries in 2023.



Figure 1: Workshop in Namibia

In addition to the face to face training, and based on the material that has been piloted, an online learning course with the same focus will be developed in 2023.

The CAD workstream has provided much useful input to this work in 2022. It has around 30 members from the CAD. The objective of the workstream were the following four:

- 1. To pilot learning materials with workstream members and, if possible, admin data owners
- 2. To collect input and feedback on materials already developed
- 3. To coordinate/ bring together admin data focused learning materials (?)
- 4. To discuss content for further modules

Participation at all meetings was lively and fruitful.

#### ii. Development of a toolkit for the assessment of administrative data quality

Based on the demand of many country members to have a resource on quality in administrative data, a first version of a toolkit for the assessment of administrative data quality has been developed. The toolkit consists of a template or assessment for the initial investigation of a new data source as well as a background document, an assessment template and a number of country examples.



Figure 2 Cut-out of quality assessment tool

The development was to begin with primarily with a focus on the Eastern and Southern Africa region though during the development it was expanded to make it usable and applicable more broadly. Two national and one regional consultant worked on the development, building on already available quality guidance materials, including the National Quality Assurance Frameworks, and was supported through a variety of input and feedback from different international experts. The development was carried out in close collaboration with countries that provided input on their needs.

The assessment questionnaire was tested in Bhutan and in South Africa together with data holders and the NSO. In Bhutan it was adopted as the official approach to quality assessments of administrative data and will be used to assess the data of a number of administrative data holders in 2023. The tool was also introduced and discussed in Namibia and is planned to be piloted in Cameroon and Dominican Republic in 2023, potentially also in other countries.

# iii. Updated guidance for Memoranda of Understanding (MoUs)

Memorandums of Understanding (MoU) between the administrative data owner and the NSO play an important role in facilitating access to administrative data sources, independently of the legal framework. MoUs can help formalize and structure the data transfer and will make the access less dependent on personal relations, which many countries presently rely on for the access to data. In discussions of the Collaborative, particularly the ones under task team 1, countries asked for examples and guidance on how to set up MoUs. Based on this, a guidance and template document was developed in 2021. It includes an overview of various elements to consider when agreeing on a MoU, including frequency and mode of data transfer, specification of variables and metadata and level of detail of the data and related concerns around confidentiality and security. The guidance is also accompanied by a template MoU that can be used as a starting point for conversations between NSOs and data owners.

Based on input and learnings from countries, the MoU was adjusted in 2022. A key new feature is a section on the process of setting up a MoU. As it turned out in some cases, MoUs were signed at management level without implementing staff knowing, thus at instances not having necessary details for actual exchange nor being implemented. Having a proper development process where managements, relevant technical staff and legal experts are involved is therefore recommended.

The MoU template and guidance will in the first quarter of 2023 also be made available in French and Spanish.

## iv. IT-architecture

Ensuring that there is a stable and secure IT system in place which can handle a large set of data is also a key concern for many countries. Having an arena for discussing and sharing experience on this has therefore also been important. Related to task team 3, the IT workstream has in 2022 focused on:

- 1. Demystifying information technologies for statistical production
- 2. Develop learning materials and sharing of experiences around the modernization of IT architectures that facilitate the integration and use of administrative data sources into the production of official statistics

One of the main deliverables of the IT workstream was to provide platforms and opportunities for members to share their experiences related to IT architecture surrounding administrative data. In this

context, a series of online webinars on "modern IT Architecture and infrastructure for administrative data" were organized in partnership with The Knowledge Transfer Network of the Statistical Conference of the Americas of the United Nations Economic Commission for Latin America and the Caribbean (ECLAC) and INE Chile. Chile, Colombia, Dominican Republic, Ecuador, Mexico and Uruguay shared their experience on IT Architecture and infrastructure work. Participants were grateful for



bringing up the IT topics to the Statistics community of the region and expressed interest to continue sharing practices and discussing common challenges. You can find the recording in the <u>webinar section</u> of the admin data collaborative webpage.

A questionnaire with the aim of producing country case studies on the use of modern IT architecture for integrating administrative data sources into official statistics was distributed among the members of the collaborative and workshop presenters. Based on the responses received, the resulting case studies will be added to the inventory of resources in the first quarter of 2023.

### v. Updates to the inventory of resources and webpage

The Collaborative continues to work to provide members with an overview of available guidance materials and help share experiences from countries and other partners. The various task teams and workstreams have been working on updating the inventory of resources with new materials and reviewing the existing materials.



Figure 4 Screenshot of inventory with example case study

New international guidelines, new reports from countries, tools and reports on seminars have been added to the inventory in 2022. The inventory now has a total of 102 materials consisting of 27 case studies, 25 tools, 24 reports, 18 international guidelines and 7 webinars. As shared above, new case studies will soon be added to the inventory on IT architecture.

Work has also been on-going to translate the inventory materials into different languages. The main translation work has been into French where the overall structure of the webpage soon will become

available in French along with all the 27 case studies. A Spanish version of the webpage with related materials in the inventory already exists.

## vi. Communications, advocacy and fundraising

At the start of 2022, the CAD was keen to ramp up its efforts on further promoting its work in order to attract more countries to join the CAD and ultimately mobilize additional resources to the work. A workstream on communications, advocacy and fundraising was therefore established and embarked on first putting in place some communications resources and branding for the CAD. These efforts were supported by the UNWomen East & Southern Africa team. This entailed developing a communications strategy, CAD logo and brand guidelines and increased social media presence.



Additional resources enabled CAD to re-purpose the case studies in the Inventory of Resources into short, concise and easy to understand video clips to ease further dissemination on social media. These social media assets will be disseminated in 2023. A longer video on the <u>Nordic</u> <u>approach to register-based statistics production</u> was also made available and promoted.

Figure 5 Screenshot of video on Uruguay's case study

The CAD participated in a few key events in 2022. Notably the UN Statistics Commission, the Africa Statistics Commission. The secretariat also convened quarterly meetings of all the members of the collaborative. The CAD also hosted two webinars on maturity models and on the harmonization of standards, concepts and definitions. Next to presentations by 4-5 invited speakers, participants used the opportunity to question and discuss with the presenters of the webinars. The videos of the webinars can be found on the CAD homepage under <u>webinars</u>.

Early 2023, three onboarding meetings (Africa and Europe, Asia and Latin America) were conducted to bring on board new countries. The CAD plans to also hold additional onboarding meetings in 2023.

In regard to fundraising for the CAD, the initial steps were internal focus group discussions to reach an agreement on the fundraising priorities and these will be advanced in 2023.

# 3. Engagement with countries related to CAD work

## Development Account 13: Administrative data for disaggregated Sustainable Development Goals indicators in Africa, Asia and the Pacific and Latin America

UNSD applied for funding under the Development Accounts structure of DESA before the Collaborative was established, but with very much the same aim: to support countries in a cross-cutting and processoriented manner in increasing the use of administrative data sources for statistics production. The project started in April 2021 and will run until June 2024. It has a total budget of around 600 000 USD and is implemented by UNSD with active contributions from UN regional commissions, UN Resident Coordinator Offices (UN RCOs) and GPSDD.

The initial phase confirmed the picture from the work of the CAD where most of the countries had similar cross-cutting and process-oriented challenges, including: advocacy and legal frameworks, quality assessment and assurance, data linking and IT infrastructure and security. Much of the work in the countries is therefore focused on the processes overall. To limit the scope of work to make it manageable both from a funding perspective and for the participating countries, each country has selected one or two thematic areas for implementation of the work as follows: Cameroon (SDG16), Namibia (agriculture and labor) and Tanzania (CRVS) in Africa; Bhutan (education and health) and Sri Lanka (business) in Asia; and Chile (population register), Dominican Republic (environment and disaster risk reduction) and Ecuador (stunting) in Latin America. While focused on administrative data, the project is in many ways following the Data for Now approach (see separate background document for more information on this).

In 2022, the work has progressed in most of the countries. After initial remote engagement with the statistics office in Cameroon (INS) and the custodian agencies for SDG 16, INS decided to focus the work on improving indicators related to access to justice, working with the UN Office of Drug and Crime (UNODC). A mission by UNODC took place in December 2022 bringing together the Ministry of Justice, the Police and the Gendarmerie, who all hold administrative data on the relevant indicators, and INS. They discussed requirements for producing the selected indicators, how to re-establish regular data exchange and quality issues in the data, particularly challenges related to differences in standards and definitions between the data sources. Follow up activities are planned in 2023 on data quality assessments, formalizing data exchange (MoUs) and on the indicator calculation more in-depth.

In Namibia, a local consultant was hired to support the Namibia Statistics Agency (NSA) in mapping the various administrative data sources related to agriculture statistics (livestock in particular) and labor statistics and to jointly with the partners carry out quality assessments of the most relevant data sources. Later in the year, UNSD co-organized two workshops and a high-level event in Windhoek. The NSA management had highlighted a need for increased visibility and more engagement with administrative data holders and the wider public. A high-level event was therefore organized to showcase the work of NSA and present the value of data sharing. Ahead of this event, UNSD, GPSDD and UN Women organized a workshop on user engagement and data values for NSA staff. Following the high-level event, a workshop was held on the use of administrative data for representatives from 12 administrative data holders and NSA. This was jointly held with UNECA and UN Women.

The National Statistical Bureau (NSB) of Bhutan was in 2021 tasked by the government to assess the quality of all public data sources in the country. They did not have a system in place for this and therefore identified the development of a quality assessment framework as a priority for the work under the project. The quality assessment tool developed under the scope of the Collaborative was therefore tested in Bhutan as the first country. A consultant was also hired to support NSB in the work and they jointly carried out a quality assessment with four agencies in Bhutan. NSB adopted the approach and plans to carry out assessments with additional agencies in 2023. A workshop was also held for 13 agencies holding administrative data and NSB.

In Chile, to gain more positive attention around the work to establish a statistical population register and gain access to additional data sources, a three-day high-level seminar and several bilateral meetings with various administrative data holders were organized in October 2023. The Institute of National Statistics of Chile (INE) led the work with support and participation from the social and demography branch of UNSD, UNECLAC, GPSDD, Statistics Norway and INE Uruguay. The conference was very well received, including among many of the administrative data holders who showed commitment to progressing the work through sharing data and agreeing on common standards and definitions.

For the other countries, there was regular remote communication, progressing the work on accessing and making use of the different data sources. Concrete activities are also planned for 2023, the first one in Dominican Republic in February 2023.

Beyond the country work, the project provides funding for the e-learning course development on administrative data sources for statistics. Through the engagement both in the Collaborative and with project countries, the work progressed substantially in 2022. Content is now mostly in place and is currently validated. Once finalized, a company will be hired to support the design work.

Having such a project in parallel to the work of the Collaborative provides useful input and enables synergies. The project benefits from the experience exchange and learning materials of the Collaborative and the Collaborative benefits from the materials that are being developed as part of the project. Project countries are also active contributors to experience exchange in the Collaborative.

# 4. Plans for 2023

Several of the activities presented above will continue in 2023. This includes the work of the three workstreams that have been established. A fourth workstream is also expected to be established covering data quality, standards and definitions. Another area which the CAD would like to expand work on is increased engagement with administrative data holders. At present, there are no administrative data holder representatives in the CAD. Considerations are under way on how they could become more involved in the regional and global discussions in addition to at country level to further help ensure that their needs and interests also are addressed. The annual meeting of the CAD may identify additional areas to be prioritized in 2023.

A workplan was set up to indicate priorities and activities for 2022, and it is expected that the workplan for the coming one to two years to make the work more predictable to members. Members will also be asked to provide input and engage in the further detailing and prioritization of the workplan. The level of activity will be guided by the availability of resources, both in terms of focal points from the member organizations and of the funding that can be secured.

The CAD will participate at and have sessions or side events at the following conferences in 2023: UN Statistical Commission (side-event), IAOS in Zambia (session), UN World Data Forum in China, ISI in Canada and the Festival de los datos in Uruguay. The newly developed videos and other key materials will be promoted to relevant interest groups.