Good practices based on the OECD Recommendation to ensure an efficient coordination of the national statistical system.

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Abstract

Coordination is a key element of an efficient national statistical system. While international statistics guidelines emphasize the coordinating role of national statistical institutes, there is little guidance to set up an efficient coordination and to monitor this implementation. The statistical programmes are the main instruments in place to ensure this coordination. Their development and implementation rely on specific mechanisms and a strong cooperation between the producers of official statistics, while users should also be involved in their elaboration. The statistical programmes also require guidance developed by the coordinators. However, statistical programmes are increasingly insufficient to ensure an efficient coordination of the national statistical system. A strong legal basis is required, as well as appropriate institutional settings and additional tools. In this area, the move to more granular and more frequent statistics requires stronger mechanisms to ensure the production of highquality statistics. Introducing new dimensions in the quality management framework to cover administrative sources and privately held data and extending the quality management to the whole national statistical system are important to overcome new challenges and ensure trust in official statistics. This paper presents the main trends in the area of coordination and highlights selected examples of good practices across countries adhering to the OECD Recommendation on Good Statistical Practice (hereinafter the Recommendation). On this basis, the paper aims to derive a set of good practices to advance the state of coordination in existing international guidelines such as the OECD Recommendation.

Keywords: Coordination, International Guidelines, OECD Recommendation on Good Statistical Practice

1 Introduction

An efficient coordination in the national statistical system is key for the quality of official statistics. International guidelines emphasize the importance of the coordinating role of national statistical institutes, although guidance to set up its efficiency and to monitor its implementation is limited. The legislations on statistics in OECD Members give the role of coordinator to national statistics office and mandate them to coordinate the implementation of statistical programs irrespective of the decentralised or centralised nature of the national statistics, such as

coordination committees, are sometimes established by law, which also often provide the chief statistician with the role to represent the national statistical system. However, the evolving landscape of official statistics is increasingly complex thus making the coordination of the national statistical system more challenging. This is most acutely experienced by official statistics producers during shocks such as the COVID-19 pandemic, which further increased the need for efficient and effective coordination but also made it substantially more challenging.

The increasing demand for more granular and more frequent statistics and cross-cutting statistics requires stronger mechanisms to ensure the production of high-quality statistics. New actors are involved in the evolving data environment and thus warrant different forms and levels of interaction between the various entities within and outside the national statistical system. The traditional roles and responsibilities of the various actors are being redefined or reinforced in an attempt to address the evolving data ecosystem. In particular, this refers to major digitalisation efforts of existing administrative data sources, improving the linkability and interoperability of these sources, as well as the exponential growth of privately held data whose potential in the context of official statistics remains considerably untapped.

Short term (annual) and long-term statistical programmes are increasingly insufficient to ensure an efficient coordination of the national statistical system. A strong legal basis, appropriate institutional settings and additional tools are required. Revisiting and extending the quality management framework to the whole national statistical system are important to overcome the new challenges and ensure continued trust in official statistics.

This paper presents some of the main recent trends in the area of coordination and highlights selected examples of good practices across Adherent countries to the *OECD Recommendation on Good Statistical Practice* (OECD, 2015), hereinafter the Recommendation (see Box 1 in the Appendix). On this basis, a set of good practices are identified to update the list of indicative good practices included in the Recommendation and advance the state of coordination in existing international guidelines.

2 Background

2.1 Importance of an efficient coordination to ensure quality.

Coordination lies at the core of collaboration and cooperation efforts required for the execution of any complex activity such as the production of official statistics. The goal of coordination is to ensure that various entities work together in an organised and synchronised way leading to efficient and effective outcomes. In the context of official statistics, coordination directly contributes to quality outcomes, trust in official statistics, and credibility of the national statistical system. Increasingly complex national statistical systems make the coordination even more essential. The great financial crisis and the COVID-19 pandemic stressed the importance of more timely and more granular official statistics. In the meantime, policy questions are increasingly cross-cutting (environmental and social policies, digital transformation, green transformation, mobility transition, government finances and income and wealth distribution, enterprise demography and productivity, etc.), and the efficiency of some traditional surveys and censuses is declining with reduced response rates. In this context, new data sources are required to complement traditional sources and the coordination of the national statistical system is identified as a priority by the Adherent countries to the Recommendation, as shown in the Figure 1 from the Implementation Report of the OECD Recommendation (OECD, 2020).

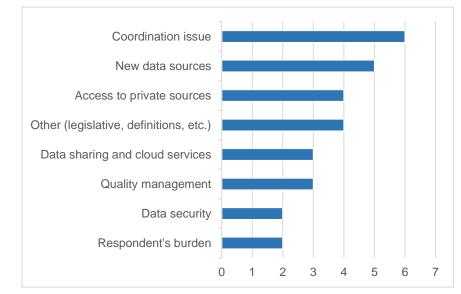


Figure 1: Possible areas of further development of the Recommendation (number of positive responses).

The Recommendation highlights the importance to establish responsibilities for an efficient coordination of statistical activities within the national statistical system. This principle is provided with indicative good practices (see Box 2 in the Appendix) based on concrete mechanisms to coordinate different phases of the statistical production. These good practices include the legal basis, planning activities, coordinated data dissemination, assistance with the implementation of international standards and classification as well as common quality management processes. However, they need to be reevaluated and updated to monitor the efficiency of coordination in the new data ecosystem. Coordination issues are multifaceted and multiple factors can thus influence coordination activities in national statistical systems.

2.2 Coordination of national statistical systems

National statistical legislation must provide clear definitions of the national statistical systems and official statistics. In order to ensure some flexibility and adaptability, it is preferable that the law on statistics establishes mechanisms for defining and updating these concepts rather than providing a list of subjects included in official statistics and/or a list of entities included in the national statistical system. The Recommendation defines a national statistical system as the "ensemble of statistical organisations and units within a country that jointly collect, process, and disseminate official statistics on behalf of the national government." Thus, a national statistical system often reflects the national governance structure and its degree of centralisation has a direct impact on coordination requirements.

National statistical systems are centralised when all or most of the statistical products of the national statistical system are processed and disseminated by a central organisation. Conversely, they are decentralised when official statistics are produced by many different producers including the national statistics office, the Central Bank, Ministries and Public Agencies. Decentralisation can take different forms depending on whether the production of official statistics is decentralised by subject domain (for example in Korea, Costa Rica, Chile and Belgium), or by geographical area (for example in Mexico and Argentina where official statistics are produced at the federal, state, and local level).

The production of official statistics can therefore involve numerous institutional actors with varying roles and responsibilities within the national statistical system. A large (and potentially growing) number of actors and complex institutional interactions require a higher degree of coordination within a system. Another perspective on national statistical systems goes beyond producers of official statistics and includes data providers who deliver data to be further processed by producers of official statistics as part of the national statistical systems, a clear legal and institutional framework for official statistics is therefore essential, as outlined in the Recommendation (see Recommendation 1 in Box 1 in the Appendix). This legal basis should clearly establish the coordinating role, as well as the capacity to develop tools (ex. planning activities) and mechanisms (capacity to develop agreements) to ensure efficient coordination.

2.3 Coordination in other international statistical guidelines

International statistical guidelines developed over the last decades include principles, practice, methodologies, or indicators and provide important standards for national statistical systems and the production of high-quality statistics. A brief overview of some of these guidelines is provided below.

- The European Statistics Code of Practice (2017) and the related Quality Assurance Framework of the European Statistical System (2019) include an indicative list of institutional methods such as a clear legal basis for coordination, written agreements with other statistical authorities or regular meetings to manage national coordination.
- Principle 8 of the UN Fundamental Principles of Official Statistics Implementation Guidelines (2015) provides guidance on national coordination including practical examples covering legal and institutional mechanisms to ensure its implementation.
- Chapter V of the UNECE Generic Law on Official Statistics (UNECE, 2016) covers coordination of the national statistical system in Chapter V and identifies the statistical programmes are the main instrument to efficiently coordinate work between the producers of official statistics.
- Principle 2 of the Code of Good Practice in Statistics for Latin America and the Caribbean (2011) focuses on institutional coordination mechanisms, coordinating bodies, and consultative committees.

Although these guidelines emphasize the coordinating role of national statistical offices and the principle of coordination, there is little guidance to set up an efficient coordination and to monitor its implementation in practice. The following section highlights some selected good practices related to the efficient coordination of the national statistical system in Adherent countries to the Recommendation.

3 Indicative good practices of coordination

Good Practice 1. A clear legal framework for the national statistical system determines the roles and responsibilities of all producers of statistics, designates a coordinator of the system and provides institutional arrangements and technical mechanisms for an efficient coordination. In Croatia, the Official Statistics Act provides the legal basis for the organisation and coordination of the national statistical system by the Croatian Bureau of Statistics (CBS). The law establishes mechanisms to add or remove entities of the national statistical system, as well as a coordination committee composed of the producers of official statistics. The mandate to coordinate needs to be sufficiently strong in relation to other public authorities, and the chief statistician should be ultimately responsible and accountable for the implementation of an efficient coordination of the national statistical system, for example through reporting mechanisms of the implementation of coordination tools to the Parliament or Council of Ministers. Good Practice 2. Statistical planning and reporting are used to coordinate the work of producers of official statistics. Planning activities include annual and multi-year national statistical programmes and cover activities of the national statistical office and other statistical authorities involved in the production of official statistics. The national statistical office coordinates the statistical activities and collaborates with the other authorities in drafting and implementing the annual national statistical programme. The national statistical authorities have the responsibility to submit an annual implementation report to the Parliament or to the Council of Ministers. Planning activities represent the most widely used tool for the coordination of the national statistical systems across Adherent countries to the Recommendation. They are often linked to the advance release calendars informing users of the statistical release dates. However, these programmes should include all the entities of the national statistical system even when their statistical activities are subject to other legislation (ex. central banks).

Good Practice 3. The coordinated dissemination of official statistics is facilitated by joint online platforms and common procedures. Single online platforms for disseminating all official statistics help to ensure standardisation and consistency, for example by ensuring that the same statistical classifications are used by all the producers. The Latvian Official Statistics Portal brings together official statistics from various entities of the national statistical system. Statistics Sweden's "Publishing Calendar" provides the releases dates of official statistics produced by Statistics Sweden and other government agencies. Implementing coordinated dissemination of official statistics is more challenging in decentralized systems, although suitable platforms exist. For example, the "Dashboard Germany" disseminates data from different sources in the decentralized German national statistical system and beyond, including official statistics and data produced by other institutions, such as the Federal Employment Agency or the German Airports Association. Statistics Canada worked in coordination with Health Canada to support the COVID-19 response by creating a joint data platform to visualise the supply and demand information for Personal Protective Equipment. Statistics Canada collected and processed high-frequency data in diverse formats from various sources, including provincial/territorial governments, federal departments, and private sector entities, and developed a PowerBI dashboard to share this information with government departments to meet their needs.

Good Practice 4. Coordinated government-wide strategic directions on data are established. Statistics Canada plays a key leadership and coordination role in the centralised national statistical system, but also in a "whole-of-government" approach to data stewardship and data management. Its Data Strategy based on the agency's modernisation pillars is aligned with the "2023-2026 Data Strategy for the Federal Public Service". Statistics Canada

is at the core of the foundational elements, namely talent, governance, processes and tools, of this government-wide strategy. Activities such as formalizing upskilling and reskilling, enabling the use of common standards, data discovery, integration and reuse, and supporting the implementation of the recently developed Government of Canada Data Quality Framework formalized into the Guidance on Data Quality are included.

Good Practice 5. Governance bodies are in place with a clear responsibility for coordination established by law. The Australian Bureau of Statistics Act establishes the Australian Statistics Advisory Council, which advises on the improvement, extension and coordination of statistical services provided for public purposes in Australia. Advisory councils and coordination committees are typically composed of producers and sometimes users of official statistics. National statistical systems sometimes also have governance bodies dedicated to coordination and composed of producers of official statistics only. For example, Kazakhstan established in 2021 the Council of State Statistics Bodies to ensure the high quality of administrative data and promote the harmonization of methodological principles for the production of official statistics.

Good Practice 6. Ensure an efficient coordination at the operational level. For example, expert, technical or working groups provide a platform for knowledge sharing to support the use of common conceptual frameworks, processes and statistical methods. INEGI Mexico relies largely on the Executive Committees and Technical Committees to ensure effective coordination. INEGI's National Advisory Council and Governing Board provide high-level advice and control of committees' processes, respectively. Coordination between these committees could be strengthened by appropriate staff secondments. For example, the Chair of the group on labour statistics is represented in the economic statistics committee. Each committee has a secretariat provided by INEGI, which records the proceedings as a reference for all participants.

Good Practice 7. The implementation of international statistical standards and classifications is coordinated at the national level. The implementation of international statistical standards (methodological handbooks, international classifications, GSBPM, SDMX, etc.) established through a consultation process involving international organisations and national statistical authorities to ensure their relevance and application plays a key role in ensuring the effective coordination of the national statistical system. For example, the Croatian Bureau of Statistics has developed a statistical classification management system (KLASUS) based on the Generic Statistical Information Model (GSIM): Statistical Classifications Model, an international reference framework for statistical information. KLASUS is accessible by all

internal and external users free of charge and is part of a central metadata repository. It allows for coordinated implementation of international classifications across the entities of the national statistical system.

Good Practice 8. Common quality management system and quality assurance frameworks are implemented for all the producers of official statistics. The Danish Act on Statistics mandates Statistics Denmark for the development and revision of national quality guidelines to be used by all the public authorities engaged in the production of official statistics. These Danish Statistical System monitors the compliance of official statistics with these guidelines, available on the Official Statistics Portal (in Danish only), through an annual selfassessment complemented with less frequent national peer reviews. The monitoring results are reported annually and submitted to the Minister for Economic Affairs and the Interior.

Good Practice 9. Procedures and criteria for quality certification and labelling are in place. DANE Colombia developed a systematic framework for monitoring the quality of official statistics, including a quality certification based on an assessment of the compliance of the statistical processes with the quality assurance framework and the National Code of Good Practices of the National Statistical System. A Decree establishes the "Quality Certificate" for integrating data into the Colombian Infrastructure and assigns DANE with the responsibility for implementing the certification across the entire national statistical system. This certification of statistical processes provides users with a label indicating that official statistics have been produced in accordance with the quality assurance framework and the national code of statistical outputs are labelled 'official statistics' once they have obtained the quality certificate, thus reinforcing trust in official statistics and in the brand of the national statistical system.

Good Practice 10. An organisational structure for coordination is in place and sufficient human, financial and technical resources are dedicated to the relevant actors on a continuous basis. The Irish Central Statistics Office (CSO) established the Statistical System Coordination Directorate to manage and develop the coordination of the national statistical system. This directorate is one of six directorates of the CSO and manages, among others, the Irish Government Statistical Service, which is a network of CSO's seconded statisticians working in public and civil service bodies. The responsibility for coordination has also been assigned to one of five CSO's Assistant Director-Generals.

Good Practice 11. Coordination is operationalised through written agreements with relevant actors to strengthen relationships between the national statistical authorities and the statistical units in other authorities. Memoranda of Understanding, Memoranda of

Cooperation, agreements, terms of reference, etc., are signed between the national statistical authorities and various data providers. In most cases, these agreements establish procedures for data sharing. However, they could also define criteria to ensure that administrative data can be integrated in the production of official statistics even if they have not been primarily collected for statistical purposes. For example, soft legal agreements setting out modalities of cooperation such as the responsibilities of signatories, data transmission, confidentiality, and quality assurance, facilitate data sharing between the national statistics office, the Central Bank, and the Ministry of Finance for the production of national accounts. Memoranda of Understanding can also be used to regulate the cooperation between producers and information providers, and to secure access to administrative records. Data sharing agreement based on established international standard for the data transmission and statistical modelling (e.g. SDMX) are recommended to ensure harmonisation and efficiency.

Good Practice 12. National statistical authorities develop national quality guidelines and organise training sessions for all the producers of official statistics. INE Spain implemented a comprehensive training plan both for its staff and personnel of other statistical authorities. The School of Statistics of the Public Administrations, attached to INE, has the objective of enhancing the training and statistical qualifications of the Public Administration staff and beyond. This is achieved by offering specialised training for the updating of statistical knowledge and skills. Regular courses, seminars, and technical sessions cover surveys, statistical techniques, IT applications and statistics.

Good Practice 13. The producers of official statistics are systematically involved in cross-government data governance initiatives, including digitalisation, to leverage existing expertise and avoid duplication of work. Digitalisation initiatives have been launched in several Adherent countries with the aim to create data warehouse infrastructure for public sector information and to facilitate data sharing in the public sector. These initiatives are often led centrally by ministries and do not always involve the national statistical authorities. The expertise of national statistical institutes in collecting and combining data from various sources, and in protecting statistical confidentiality and personal information, represents an important asset to design and implement these initiatives. The national statistical authorities should be included in their development and implementation.

4 Conclusion

The legal framework is key for an efficient coordination of the statistical activities at the national level. However, national statistical systems have different characteristics and there is no single coordination strategy that can be applied to all systems. This paper identified good practices

and highlighted selected examples in adherent countries to the Recommendation. Practices are wide-ranging and cover formalising, planning, reinforcing, facilitating, enabling, and monitoring coordination. Not all these practices need to be in place to ensure an efficient and effective coordination. Nevertheless, the presence of many of these good practices provides a strong indication of a credible and well-coordinated national statistical system producing trustworthy official statistics. These indicative good practices currently in the Recommendation remain relevant, even if some of them could be more precise, and some other added. For example, common quality management system and quality assurance frameworks could be implemented by all the producers of official statistics under the guidance of the national statistical authorities. Common mechanisms to access new data and confidential information could also be established through coordinated access to privately held data by developing mechanisms to facilitate legal and technical access to new data sources and co-invest in the development of new technologies allowing large data storage and protection of personal information, as for example Privacy-Enhancing-Technologies (PET). While challenging, such practices represent a promising way forward to adapt to the evolving new data landscape. However, key principles remain necessary for an efficient coordination by the national statistical authorities, including their professional independence, and human, technical and financial resources.

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Appendix

Box 1. OECD Recommendation on Good Statistical Practice

The OECD Recommendation on Good Statistical Practice adopted in 2015 is the OECD's first legal instrument and represents a detailed blueprint to establish sound and credible national statistical systems. Twelve recommendations or principles, supplemented by a set of indicative good practices, cover the institutional, legal and resource requirements for statistical systems; methods and quality of processes of statistical collection, production and dissemination; and coordination, cooperation, and statistical innovation.

Recommendation 1. Put in place a clear legal and institutional framework for official statistics.

Recommendation 2. Ensure professional independence of National Statistical Authorities.

Recommendation 3. Ensure adequacy of human financial and technical resources available to the National Statistical Authorities for the production and dissemination of official statistics.

Recommendation 4. Protect the privacy of data providers (including individuals, households, enterprises, administrations, and all level of government), and guarantee by law the confidentiality of the individual information provided and its use for statistical purposes only.

Recommendation 5. Ensure the right to access administrative sources to produce official statistics.

Recommendation 6. Ensure impartiality, objectivity and transparency of official statistics, through the development, production and dissemination by the National Statistical Authorities of statistics respecting scientific independence put in place in an objective, professional and transparent manner in which all users are treated equitably. Equitable treatment implies in particular equal access to data by all users.

Recommendation 7. Employ sound methodology and commit to professional standards used in the production of official statistics.

Recommendation 8. Commit to the quality of statistical outputs and processes, in particular with key quality dimensions as defined in national and international quality assessment frameworks, for instance in the Quality Framework and Guidelines for OECD Statistical Activities: timeliness and punctuality (statistics are released in a timely and punctual manner), relevance (statistics meet the needs of users), accuracy (statistics accurately and reliably portray reality), credibility (confidence placed by users in statistical products), coherence and comparability (statistics are consistent internally, over time and in space and it is possible to

combine and make joint use of related data from different sources), and interpretability and accessibility (see Recommendation 9).

Recommendation 9. Ensure user-friendly data access and dissemination, so that statistics are presented in a clear and understandable form, released in a suitable and convenient manner, including in machine-readable form ('open data'), can be found easily, and are available and accessible on an impartial basis with supporting metadata and guidance This also entails a commitment to respond to major misinterpretations of data by users.

Recommendation 10. Establish responsibilities for co-ordination of statistical activities within the NSS.

Recommendation 11. Commit to international cooperation.

Recommendation 12. Encourage exploring innovative methods and new and alternative data sources as inputs for official statistics, and in particular, encourage statistical agencies to actively explore possibilities to use new data sources (including large datasets owned by the private sector) or to combine existing and new data sources as input for official statistics. At the same time, these opportunities are weighted against the limits of using modern information technologies and the need to maintain the quality of official statistics.

Box 2. Recommendation 10 of the OECD Recommendation on Good Statistical Practice	
Recommendation	Good Practice
10. Establish responsibilities for co- ordination of statistical activities within the NSS.	 10.1. The role and responsibilities of all producers of statistics are clearly determined by law. A co-ordinator of the NSS, such as the NSO, is also designated by law. 10.2. The designated co-ordinator has responsibility to co-ordinate the statistical activities of official producers in the NSS and to represent the NSS as a whole. This concerns in particular the use of appropriate statistical concepts and procedures, the implementation of international standards and efforts to minimise duplications in data collection, production and dissemination of official statistics.

10.3. Procedures, mechanisms, tools, guidelines, or agreements are in place to ensure effective co-ordination within the NSS. Procedures include:
 Establishment of a national statistics plan; Co-ordinated data dissemination, e.g. through a single data portal; Assistance with implementation of international standards and classification; and Common quality management processes. 10.4. Exchange of statistical information between statistical agencies is actively undertaken