Submission to the UN CSTD Working Group on Data Governance

Track 1: Data Governance Principles as Relevant to Development

25 August 2025

IT for Change

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The below submission includes answers to select questions shared by the co-facilitators for this track. Question numbers are indicated as per the numbers in the online submission form. Responses are followed by a list of relevant readings and resources on data governance principles, as relevant to development.

Q9. Which tensions or trade-offs among the proposed data governance principles do you consider most pressing in your context, and what mechanisms would you recommend to resolve or balance these tensions?

The Secretariat's overview of data governance principles evaluated 34 existing frameworks on data governance pertaining to international data governance arrangements applicable across various data types, sectors, and thematic fields.

From this mapping, the following baseline principles were identified as critical to ensuring data governance for development:

- human rights,
- context-sensitivity,
- transparency,
- accountability,
- data security,
- consent and user control,
- data minimization and proportionality,
- equity and non-discrimination,
- open access and data sharing,
- data quality and interoperability,
- innovation,
- multistakeholderism

The proposed data governance principles present the following tensions, which need to be resolved with the development objective at the center:

Tension 1. 'Data interoperability' vs 'Innovation'

Research suggests that while the technical principle of data interoperability—i.e., "use of common data formats and protocols that enable two or more systems to communicate with one another" (Bacchus et al., 2024)—can reduce duplication and enhance efficiency, this may not always enable equitable data-based innovation for development. On the contrary, without being enshrined in a robust governance framework for data sharing, technical interoperability can reinforce monopolies and thwart downstream innovation. Regulatory oversight is necessary so that dominant players can be kept in check and prevented from creating closed/proprietary technical or operational standards that entrench their market power, thus making it difficult for smaller firms to compete in innovation ecosystems (Russell, 2014, cited in Eaves et al., 2025).

Competition law scholars have highlighted the need for regulation to treat vertical and horizontal interoperabilities differently. Data exchange that allows services at different levels of the digital value chain to work together, that is, vertical interoperability of data, can contribute to more competitive markets. An example is the possibility to run different app stores on the same operating system or to allow alternative identification service providers when accessing a digital service or website (Bourreau et al., 2022). However, horizontal interoperability, which is the ability of products and services at the same level of the digital value chain to "work together" (Bourreau et al., 2022), can potentially entrench the market power of incumbents due to network effects (e.g., a dominant social media app interoperating with smaller social media services).

Tension 2. 'Open access and data sharing' vs 'Equity'

Without guardrails, open access and data sharing may reinforce monopolistic innovation trajectories that impede equity in benefit sharing from data-based innovation. This is noted particularly in the case of open government data, which typically benefits big corporate players to strengthen their market power and control.

Building on the learnings from the access and benefit sharing debate on digital sequence information in the Convention on Biological Diversity, it is evident that open access and data sharing must be qualified through a 'bounded openness' framing. Such a framing recognizes that access to the data commons cannot be absolutely open. It needs conditional licensing to ensure that the benefits from their use—such as the value of knowledge innovation built on them—flow back to enrich the public domain. This approach recognizes the publicness of underlying societal datasets, public data infrastructure, and data work of citizens as crucial in value generation (Vogel et al, 2022; Gurumurthy & Chami, 2022; Prainsack, 2022).

Tension 3. 'Multistakeholderism' vs 'Accountability'

The current multistakeholder model in digital policy making has resulted in a situation where powerful countries and big corporations have an oversized role in agenda setting and shaping norms that suit dominant interests in the digital economy, without addressing the roots of global injustice in the "proprietary exploitation of data" (Manahan & Kumar, 2021).

The aggregation of various interests in the room in the name of an equal-stakes dialogue is not the same as bottom-up participation of a plurality of voices that produces public accountability and a democratic policy consensus. Public policy processes based on multistakeholder participation need a defined institutional mechanism to mediate competing interests (stakes) and produce a public interest consensus in the policy process that is transparent and accountable, and rooted in the principles of democratic and people-centric data governance.

Tension 4. 'Innovation' vs 'human rights'

The unfolding trajectories of social media and the data and AI revolution show us that innovation in and of itself may not always further equitable development. Only through active shaping of innovation trajectories in ways that generate positive externalities such as fair digital markets, opportunities for small players and community innovation, diversity of digital services and business models, protection of fundamental human rights, addressing structural exclusions and harms, and meeting pressing developmental challenges such as food security, public health, etc. can the societal benefits of the technological premium be claimed. This calls for exercising the precautionary principle, widely used in the environmental domain, in determining what kinds of digital innovation are permissible and aligned with broader societal well-being.

To resolve the above tensions, we call for data governance mechanisms that respect the principles of data sovereignty of all peoples, international data solidarity, and people-centric data governance.

- The principle of data sovereignty of all people calls for safeguarding and promoting a country's and its people's ability to manage their data, take advantage of data flows, and govern data appropriately (African Union Data Policy Framework; CARE Principles). Data sovereignty (the need for all countries to govern their data and algorithmic systems) needs to be balanced with internationalism (the need for transnational solidarity and collaboration to regulate digital technologies for the benefit of/prevent harm to people and the planet). This calls for a multi-tiered sovereignty model (coordinated action across local, national, and global tiers) of data governance grounded in the logic of subsidiarity (decision-making at the most appropriate governance level) (Ishkhanyan, 2025). Unlike polycentric governance, which emphasizes decentralization, a federalist response retains hierarchical coordination while allowing for adaptive, context-sensitive governance (ibid).

- The principle of international data solidarity calls for data governance approaches that prioritize mutual benefit and solidarity for people across geography and generations so that data can be used for the greater good of society, considering both individual and collective needs, interests, and responsibilities (UN CEB Data Principles; WHO Genomic Data Principles; Prainsack, 2022).

- And finally, the people-centric data governance principle necessitates that individuals and communities are put at the center of any data governance decision-making, as proposed by frameworks such as UN CEB Data Principles, UNCTAD Data Principles for Development, UNICEF Responsible Data for Children Principles, Principles for Digital Development, and Health Data Governance Principles.

Resources:

African Union Data Policy Framework, African Union, 2022, https://au.int/sites/default/files/documents/42078-doc-DATA-POLICY-FRAMEWORKS-2024-ENG-V2.pdf

CARE Principles, https://www.gida-global.org/care

Data for Development Report, UNCTAD, 2024, https://unctad.org/system/files/official-document/dtl-tikd2024d2_en.pdf

Data solidarity: a blueprint for governing health futures, Barbara Prainsack, Seliem El-Sayed, Nikolaus Forgó, Łukasz Szoszkiewicz, Philipp Baumer, 2022, https://www.thelancet.com/journals/landig/article/PIIS2589-7500(22)00189-3/fulltext

Generative interoperability: building online public and civic space, Alek Tarkowski, Sophie Bloemen, Paul Keller, Thomas de Groot, 2022, https://openfuture.eu/wp-content/uploads/2022/03/InteroperabilityReport.pdf

Governing data and artificial intelligence for all - Models for sustainable and just data governance, Joan Lopez Solano, Aaron Martin, Siddharth de Souza, and Linnet Taylor, 2022, https://www.europarl.europa.eu/RegData/etudes/STUD/2022/729533/EPRS_STU(2022)729533_EN.pdf

Guidance for human genome data collection, access, use, and sharing, 2024, https://www.who.int/publications/i/item/9789240102149

Health Data Governance Principles, https://healthdatagovernance.org/principles/

Interoperability in digital markets, Marc Bourreau, Jan Krämer, Miriam Buiten, 2022, https://cerre.eu/wp-content/uploads/2022/03/220321_CERRE_Report_Interoperability-in-Digital-Markets_FINAL.pdf

Interoperability of Data Governance Regimes: Challenges for Digital Trade Policy, Bacchus J, Borchert I, Marita-Jaeger M, Ruiz Diaz J, 2024, https://citp.ac.uk/publications/interoperability-of-data-governance-regimes-challenges-for-digital-trade-policy

Movement Forward on ABS for the Convention on Biological Diversity: Bounded Openness Over Natural Information, Joseph Henry Vogel, Manuel Ruiz Muller, Klaus Angerer, and Christopher May, 2022, https://www.southcentre.int/wp-content/uploads/2022/07/RP160_Movement-Forward-on-ABS-for-the-Convention-on-Biological-Diversity_EN.pdf

Open institutions and their "relevant publics": A democratic alternative to neoliberal openness, Parminder Jeet Singh, Anita Gurumurthy, Nandini Chami, 2021, https://tinyurl.com/ycx8rmcy

Principles for Digital Development, 2015 https://dig.watch/resource/principles-digital-development

The Economics of Shared Digital Infrastructures: A Framework for Assessing Societal Value, David Eaves, Diana Coyle, Beatriz Vasconcellos, Sumedha Deshmukh, 2025,

https://www.ucl.ac.uk/bartlett/sites/bartlett/files/2025-04/the_economics_of_shared_digital_infrastructures.pdf

The Great Takeover: Mapping of Multistakeholderism in Global Governance, May Anna Manahan & Madhuresh Kumar, 2021, https://pop-umbrella.s3.amazonaws.com/uploads/bc28cc99-372f-48c3-9ecb-016a869fd3af_Formatted_Book_-_14_Jan_2022.pdf

UN CEB Proposed normative foundations for international data governance: goals and principles; 2024, https://unsceb.org/sites/default/files/2025-03/CEB-2024-2_Proposed%20normative%20foundations%20for%20international%20data%20governance%20goals%20and%20principles-goals%20and%20principles_1.pdf

UNICEF Responsible Data for Children Principles, https://rd4c.org/