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# Operationalizing Ethical Data Governance in Africa: Applying CARE Principles and Developing of Data Sharing Agreements in African Institutions.

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### Introduction

Data governance is rapidly evolving to address new technological opportunities and risks. In today's world, where data is perceived as a global currency, its value depends not only on availability but also on how it is governed, accessed, controlled, and used. In Africa, where there are no continental data protection policies, there is growing recognition of the need to ethically govern population and health data at the country and continental levels, through frameworks that protect individual and community interests while enabling responsible reuse.

## **Objectives**

Building on the Collective Benefit, Authority to Control, Responsibility, and Ethics (CARE) principles and in alignment with Findable, Accessible, Interoperable, Reusable (FAIR) data principles, the Data Science Without Borders (DSWB) project aimed to develop a harmonized Data Sharing Agreement (DSA) and Data Access Request (DAR) template. These tools empower institutions to maintain data sovereignty and ownership while facilitating secure, ethical sharing and interoperability across partners.

### Methodology

First, a needs assessment and institutional mapping across 20 institutions in Cameroon, Senegal, and Ethiopia was conducted to assess data governance structures, stakeholder roles, and compliance mechanisms. Key assessment areas included the presence of formal data governance frameworks, stakeholder involvement, compliance mechanisms, training needs, and policies guiding ownership and data sharing trust. Next, insights from the assessment informed the co-development of two governance instruments: a modular Data Sharing Agreement (DSA) and a standardized Data Access Request (DAR) form for implementation by three DSWB implementing institutions. The tools were designed to embed CARE and FAIR principles, refined through iterative stakeholder consultations, and are currently being piloted across pathfinder sites to ensure contextual relevance and regulatory compliance.

### Results

Among the three pathfinder institutions, Ethiopia demonstrated the most advanced governance structure with a formal data governance framework, while Cameroon and Senegal reported partial or informal systems. All sites emphasized the need for clear data ownership and governance policies, ethics review boards, and stronger adherence to ethical standards to build trust for data sharing. Trustworthiness was assessed differently across countries, with Cameroon relying on DSA and institutional reputation, Senegal relied on institutional reputation, while Ethiopia considered existing data governance practices. Findings highlighted gaps in oversight, policy alignment, and ethical data access. Early piloting of the new DSA and DAR tools revealed the need for enhanced clarity in access procedures and growing institutional confidence in structured data exchanges. The tools are currently being piloted across African health institutions to ensure contextual relevance and regulatory.

## Conclusion

In conclusion, integrating CARE and FAIR principles within governance instruments is pivotal for bridging ethical intent with operational execution. This approach enhances responsible data sharing and serves as a replicable model for equitable practices in diverse settings, reinforcing the importance of co-design in sustainable data ecosystems.

**Primary authors:** BARASA, Miranda (African Population and Health Research Center); Ms ODHIAMBO, Rachel (African Population and Health Research Center)

**Co-authors:** Dr KIRAGGA, Agnes (African Population and Health Research Center); Dr IDDI, Samuel (African Population and Health Research Center); Dr CYGU, Steve (African Population and Health Research Center)

**Presenter:** BARASA, Miranda (African Population and Health Research Center)

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