

# Pilot-Testing a Gender-Integrated Routine Data Quality Assessment Tool in Zambia

## Summary of the Results

### Background

Although new HIV infections and AIDS-related deaths have decreased in Zambia over the past decade, the national prevalence of HIV, at 12.4 percent in 2016, remains high relative to that in other low- and middle- income countries.<sup>1</sup> Vulnerable populations, such as orphans and vulnerable children (OVC) and people experiencing gender-based violence (GBV), are at greater risk of contracting HIV. HIV/AIDS control and treatment, therefore, are priorities for the government of Zambia.<sup>2</sup> Gender- and age-disaggregated data and gender-sensitive indicators are key to assessing the needs and experiences of different at-risk, vulnerable populations. In recent years, the United States President's Emergency Plan for AIDS Relief (PEPFAR) has increased requirements for the disaggregation of sex and age data, but it is unclear how researchers understand and address these requirements in practice.

MEASURE Evaluation, in collaboration with the United States Agency for International Development (USAID) and implementing partners (IPs), piloted a new tool—available at <https://www.measureevaluation.org/our-work/gender/gender-integrated-routine-data-quality-assessment-rdqa-g-tool/gender-integrated-routine-data-quality-assessment-rdqa-g-tool>—to collect and analyze information from a gender perspective: the Routine Data Quality Assessment, Plus Gender (RDQA+G). This brief summarizes the results of the RDQA+G pilot test, conducted as part of a larger initiative to assess gender and HIV data quality, build capacity, and identify best practices for improving data quality in Zambia. Gender-specific results are emphasized in this brief to illustrate the capacity and utility of the modified assessment tool.

### Methods

We used the RDQA+G tool to collect and analyze information from a gender perspective. This modified version of the Routine Data Quality Assessment (RDQA) tool was adapted to incorporate data on sex- and age-disaggregated



A schoolgirl in Zambia. Photo: Liv Unni Sødem, courtesy of Flickr Creative Commons

indicators and gender-sensitive indicators. For example, the RDQA+G examines not only the structure, functions, and capabilities of a monitoring and evaluation (M&E) unit, but also whether relevant M&E staff have received training in the past 12 months on gender mainstreaming, or consideration of and adjustment for gender throughout the planning, implementation, monitoring and evaluation of all programs and activities.<sup>3</sup> The tool can determine if M&E units document or adopt guidelines on handling gender-sensitive data at each reporting level, and whether M&E staff analyze data and develop graphic representations of the data disaggregated by sex and age. Such sex- and age-disaggregated indicators and gender-sensitive indicators are incorporated across levels of the data quality assessment.

<sup>1</sup> Joint United Nations Plan for HIV/AIDS (UNAIDS). (2015). HIV and AIDS estimates. Geneva, Switzerland: UNAIDS. Accessed on 26 April 2017. Retrieved from: <http://www.unaids.org/en/regionscountries/countries/zambia>

<sup>2</sup> Joint United Nations Plan for HIV/AIDS (UNAIDS). (2015). HIV and AIDS estimates. Geneva, Switzerland: UNAIDS. Accessed on 26 April 2017. Retrieved from: <http://www.unaids.org/en/regionscountries/countries/zambia>

<sup>3</sup> USAID. Gender mainstreaming and disability sensitization in civic and voter education for USAID/Namibia. Washington, DC, USA: USAID. Retrieved from [http://pdf.usaid.gov/pdf\\_docs/PNACY231.pdf](http://pdf.usaid.gov/pdf_docs/PNACY231.pdf)

The RDQA+G tool has two protocols, one quantitative and one qualitative: (1) “data verification” quantitatively measures the availability, accuracy, completeness, and timeliness of data; and (2) “system assessment” qualitatively evaluates the capacity of the reporting system to produce high-quality data. Three program-level indicators were assessed by the data verification protocol: (1) the number of people tested for HIV who received their results; (2) the number of clients receiving gender-based violence (GBV)-related services; and (3) the number of orphans and vulnerable children (OVC) receiving services. The data from these indicators were investigated in terms of accuracy, timeliness, and completeness of reporting, and the availability of reports. The system assessment protocol examined six aspects of the data system: (1) M&E structure, functions, and capabilities; (2) indicator definitions and reporting guidelines; (3) data collection and reporting forms/tools; (4) data management processes; (5) evidence-based decision making; and (6) links with the national reporting system.

The assessment was conducted from May 17–28, 2016, in a sample of five service delivery sites and two associated M&E units. We selected

**Verification factor interpretation**

Over 100 percent = Underreporting  
Under 100 percent = Overreporting

sites using convenience sampling based on gender-related work at the site with the two IPs—referred to in this brief as IP1 and IP2, to preserve privacy and confidentiality. IP1 works with Zambian and international nongovernmental organizations to support children and families affected by HIV/AIDS in the Lusaka Province. IP2 aims to increase the availability and uptake of GBV services. The reporting period for review was that of the semiannual performance reports (SAPRs) by IPs to USAID (SAPR 16: 1 October 2015–31 March 2016). Results are reported below, by IP.

**Results**

**IP1**—Data verification factors at IP1 ranged from 104 percent to 139 percent, demonstrating slight to significant underreporting across sites. While 100 percent of records at the M&E Unit were found to be complete, decreased data completeness was detected at service delivery points (SDPs; 67%–75%). The timeliness of data updating and availability was at or near 100 percent across IP1 sites, with the lowest level of timeliness (94%) at Kapululwe. HIV testing and counseling (HTC) data at IP1 met USAID’s criteria for the HTC\_TST indicator, and therefore, were not assessed for accuracy, availability, completeness, or timeliness.

The three SDPs associated with IP1 achieved an average score of 3.2 (range 2.9–3.5) on the overall systems assessment component of the RDQA+G. Scores varied widely by functional area. Most sites scored well in “data collection and reporting forms and tools” (average score: 4.0) and “linkages with the national reporting system” (average score: 3.7). The lowest scores, on average, were earned for “indicator definitions and reporting guidelines” (average score: 2.8). The strongest performance across functional areas was demonstrated by the M&E Unit (average score: 3.9).

**Systems assessment score ranges**

0= Not applicable  
1=No, not at all  
2=Party  
3=Mostly  
4=Yes, completely

Scores on the gender-specific component of the systems assessment were low relative to overall systems assessment scores (Table 1). The average score across sites was 1.7, with the highest scores earned for “data collection and reporting forms and tools” (average score: 4.0) and the lowest scores earned for “M&E structures, functions, and capabilities” (average score: 1.2). The M&E Unit again demonstrated the strongest performance across gender-specific functional areas (average score: 3.9).

**Table 1. Gender system assessment summary, IP1 on OVC\_SERV**

	I	II	III	IV	V	VI	(Average per site)
Assessment of data management and reporting systems	M&E structure, functions, and capabilities	Indicator definitions and reporting guidelines	Data collection and reporting forms and tools	Data management processes	Evidence-based decision making	Linkages with the national reporting system	
<b>M&amp;E Unit</b>							
Head office	3.9	4.0	4.0	3.5	4.0	4.0	3.9
<b>Service delivery point</b>							
IP1_SDP1	1.0	1.0	4.0	3.0	1.0	2.3	2.1
IP1_SDP2	1.5	1.0	4.0	1.0	1.0	2.8	2.3
IP1_SDP3	1.0	4.0	4.0	1.0	1.0	2.8	2.3
Average (per functional area)	1.2	2.1	4.0	1.8	1.0	2.7	2.2

Legend: 4.0–3.1; 3.0–1.5; <1.5

**IP2**—Data verification factors both for HTC and GBV data generally indicated accurate reporting by IP2, with one exception: Ngombe GBV data had a verification factor of 79 percent, indicating substantial overreporting. Completeness of data, similarly, was high at two of the three IP2 sites (99%–100%), with a lower percentage (64%) detected at Ngombe. Availability (94%–100%) and timeliness (100%) were high across all sites.

The two SDPs associated with IP2 achieved an average score of 3.7 on the overall systems assessment. Perfect scores were earned for “indicator definitions and reporting guidelines” and “data collection and reporting forms and systems.” The lowest scores were observed for “data management processes” (3.0). The M&E Unit, with an average score of 3.5 across functional areas, demonstrated similar capacity.

Scores on the gender-specific component of the systems assessment were similar to those achieved on the overall systems assessment (Table 2). Both sites earned perfect scores on “indicator definitions and reporting guidelines,” “data collection and reporting forms and tools,” and “data management processes.” The lowest scores were observed for “evidence-based decision making” (average score: 3.4). The M&E Unit, with an average score of 3.5, performed comparably.

**Table 2. Gender system assessment summary, IP2**

Assessment of Data Management and Reporting Systems	I II III IV V VI						Average (per site)
	M&E structure, functions, and capabilities	Indicator definitions and reporting guidelines	Data collection and reporting forms and tools	Data management processes	Evidence-based decision making	Linkages with the national reporting system	
<b>M&amp;E Unit</b>							
Head Office	3.6	4	3.7	3.3	4	2.5	3.5
<b>Service Delivery Point</b>							
IP2_SPD1	4	4	4	4	4	4	4
IPS_SD2	3.5	4	4	4	2.8	3.6	3.7
Average (per functional area)	3.8	4	4	4	3.4	3.8	3.9

Legend: 4.0–3.1; 3.0–1.5; <1.5

## Gender-Specific Data Systems: Strengths and Areas for Improvement across IPs

### Strengths

- Sex- and age-disaggregation data are available for all three indicators of interest.
- Some staff at both IPs have received training on integrating gender.
- IP2 has a programmatic focus on gender, and scored highly across functional areas.

IP1 M&E staff expressed interest in learning about and integrating gender in their work.

### Areas for Improvement

- Missing or incorrect files were detected for sex and age data and should be created or corrected.
- Missing or incorrect data on types of GBV should be supplied or corrected.

•Gaps in gender-related M&E structures, guidelines, and evidence-based decision making should be filled.

•Staff would benefit from training on the demand for and use of gender-specific data

### Discussion

To the best of our knowledge, this is the first pilot test of a gender-integrated RDQA. The assessment indicated multiple strengths of the IPs’ data management systems. Our findings indicate that both IPs use a performance management plan as a key reference for all M&E-related activities, with data collection tools and instruction manuals available for staff. Furthermore, results confirm the existence of a documented data filing system at the M&E Unit at both IPs.

The RDQA+G also indicated areas for improvement for both IPs in evidence-based decision making, as well as unique challenges for each IP. Site-level M&E guidelines on confidentiality, systematic feedback, and the avoidance of double-counting and dropouts were lacking for both IPs. IP1 showed room for improvement in indicator definitions and reporting guidelines and the M&E data management system.

The capacity of M&E systems to collect, manage, and analyze data from a gender perspective was a key focus of the RDQA+G. The tool identified several gender-related strengths of the Zambian IPs. Sex- and age-disaggregated data are available for all three indicators of interest, and staff at IP2 had received some gender-related training. While IP1 had not provided gender-related training, staff involved in the RDQA+G expressed interest in learning about and integrating gender in their work.

However, research has shown that supporting data use to address gender inequity is a challenge at national levels.<sup>4</sup> This RDQA+G confirms that gender-integrated M&E is also a challenge at the facility level. Gender-related scores for both organizations revealed areas for improvement, especially regarding evidence-based decision making. IP1, in particular, demonstrated a need to build its capacity to conduct gender-related M&E, with the lowest scores in data management processes, evidence-based decision making, and M&E structure, functions, and capabilities.

One benefit of the RDQA and RDQA+G tools is the ability to compare results and improvements over time within an organization. However, comparing scores across organizations or programs can be misleading, as is the case with comparing the gender-related scores for the IP1 and IP2 projects. The IP2 project has a specific focus on gender and GBV, whereas the work conducted by IP1 does not. It is, therefore, unsurprising

<sup>4</sup> MEASURE Evaluation. (2017). Barriers to and facilitators of sex- and age-disaggregated data—Kenya. Chapel Hill, NC, USA: MEASURE Evaluation, University of North Carolina. Retrieved from <https://www.measureevaluation.org/resources/publications/tr-17-163/>

MEASURE Evaluation. (2017). Barriers to and facilitators of sex- and age-disaggregated data—Zambia. Chapel Hill, NC, USA: MEASURE Evaluation, University of North Carolina. Retrieved from <https://www.measureevaluation.org/resources/publications/tr-17-160/>

that IP2 demonstrated the strongest performance on the gender component of the assessment. This does not imply that gender is irrelevant to services provided by IP1. In fact, disaggregation of data by sex and age is particularly relevant to OVC services, because adolescent girls have been shown to be at higher risk of acquiring HIV owing to gender inequities and age barriers. Moreover, PEPFAR requires the programs it supports to disaggregate data by sex and age and to integrate gender.

## Recommendations



A healthy mother and child at a Zambian health care center. Photo: UNICEF Zambia, courtesy of Flickr, Creative Commons

Based on the RDQA+G pilot findings, we propose the following actions to improve the implementation of PEPFAR-funded programs:

- Harmonize the M&E plan to accommodate the description of key M&E guidelines (such as, data retention policy, redundant patient data, data storage and accessibility, M&E budget data analysis and use, and research and evaluation).
- Train and support staff and volunteers at SDPs to understand the importance of data quality to ensure tools and registers are legibly and accurately completed and to conduct basic data analysis at the site level.
- Conduct regular assessments with RDQA+G to monitor progress and support ongoing program improvement.
- Once an RDQA+G has been conducted, address gaps and weaknesses documented in the RDQA+G, while highlighting and maintaining the strengths of the system.

In addition, results of the RDQA+G support the following **gender-specific recommendations**:

- Harmonize the M&E plan to accommodate gender-related guidelines.
- Train staff and volunteers on the value of gender-related data to improve collection and use. Trainings should cover two main topics: (1) the importance of gender equality in health programs, particularly OVC and HIV programs, and (2) how to integrate gender throughout the program cycle, particularly focusing on data quality, analysis, and use.
- Ensure IPs are following the latest version of the PEPFAR Indicators Reference Guide, to confirm that data are collected by sex and age for all appropriate indicators, and that age is disaggregated by the required age bands.
- Facilitate a capacity building workshop on gender analysis for decision making.
- Ensure that M&E guidelines and practices include attention to gender with respect to confidentiality, handling gender-sensitive information, and investigating double-counting and loss to follow-up of clients.
- Conduct regular internal RDQA+G assessments and supervisory activities to ensure that HIV programs provide accurate and valid data for effective and efficient planning and implementing purposes.

## Conclusion

The RDQA+G pilot assessment was successfully completed in Zambia. The pilot highlighted positive practices and strengths among IPs regarding M&E and gender sensitivity. It also uncovered learning opportunities and gaps in gender-related data quality. Four specific actions are required to improve the quality of data collected by both IPs: (1) support, supervise, and develop the capacity of M&E system custodians, from the M&E Unit to the health facility level; (2) ensure that all health facilities complete forms accurately and report to all necessary levels; (3) train M&E staff to conduct basic data analysis at the facility level; and (4) add gender integration training for staff and volunteers. This report recommends regular, internal RDQA+G assessments and supervisory activities to ensure that HIV programs provide accurate and valid data for effective and efficient planning and implementing purposes.