

HEART

HEALTH & EDUCATION ADVICE & RESOURCE TEAM

JUNE 2016

Monitoring and Evaluation in Sierra Leone's Health Sector



Overview

In 2010 the Free Health Care Initiative (FHCI) abolished health user fees for pregnant women, lactating mothers, and children under five. This was a response to very high mortality and morbidity levels among mothers and children and reports that financial costs were a major barrier to health service uptake and use by these groups. An Oxford Policy Management team conducted an independent review of the FHCI in 2014-2016. As part of that review researchers assessed Sierra Leone's health M&E system, its strengths and weaknesses and the changes that took place as result of the FHCI.

PHOTO: © Direct Relief



HEART is a consortium of leading organisations in international development, health, nutrition and education. We work together to support the use of evidence and expert advice in policymaking.



HEART

HEALTH & EDUCATION ADVICE & RESOURCE TEAM

JUNE 2016

1. Key messages

A strong monitoring and evaluation (M&E) system is crucial to help improve performance and achieve results. The recent review of Sierra Leone's Free Health Care Initiative (FHCI) identified the following key points to strengthen health sector M&E processes.

- Consult key data users to clarify what information should be collected and how frequently and use this as the basis to develop a new M&E strategy.
- Improve the quality and coherence of the various health data sources, especially for maternal mortality.
- Increase the publication and dissemination of health data analysis in user-friendly formats.
- Strengthen the demand for and use of health information particularly through health sector reviews and accountability processes.

2. Monitoring and evaluation: its purpose and coverage

An effective M&E system needs good quality information and analysis. The data must be used and lead to action. A solid M&E system should include:

- Appropriate organisational structures and staff capacity
- Plans for the M&E system and the resources to deliver them
- Coherent data collection processes, including strong quality control
- Analysis and reporting with effective methods of disseminating the information and ensuring it is used.

The M&E system should look across the whole results chain, starting with finance and identifying how funds are converted into inputs and outputs, and ultimately into outcomes and impacts.

3. Findings of the review

Before the FHCI was launched in 2010, M&E in the health sector was weak. There were survey data from the 2008 Demographic and Health Survey (DHS) and Multiple Indicator Cluster Surveys (MICS), and limited amounts of information from the health management information system (HMIS). Evidence suggested the information was not systematically or effectively used to deliver change.

During FHCI preparations, M&E was identified as a key pillar, which led to the creation of an M&E working group and an explicit role for the Directorate of Policy, Planning and Information (DPPI). A greater focus in this area and some improvements, not least in the number of people involved, led to a greater scope of Health Management Information System (HMIS) information collected and the development of an M&E strategy.

Despite this, evidence shows that M&E was not a sufficiently strong focus of the FHCI. Appropriate leadership and resources were not allocated to M&E and there was insufficient follow-through in the plans developed. As a result the M&E work was not implemented as effectively as it could have been. High staff turnover in DPPI also severely hampered the continuity of the work and there was a loss of HMIS micro-data for the years before 2011.

The FHCI review also highlighted some key quality concerns for the health data:

MONTH	GENERAL			POSTNATAL CARE			TOTAL
	UNDERFIVE	GENERAL	ANC	CONTACT	CONTACT	CONTACT	
JAN	470	284	134	15	15	29	947
FEB	410	231	157	30	11	5	844
MAR	363	257	112	44	43	25	844
APR	426	165	137	39	35	21	823
MAY	609	298	138	42	42	32	1161
JUN	537	270	127	29	27	13	1003
JUL	321	275	93	42	31	17	779
AUG	267	198	86	33	29	26	639
SEP	429	140	89	42	42	21	763
OCT	492	141	124	34	33	32	856
NOV	283	118	122	24	21	24	592
DEC	260	167	116	24	14	14	595
GRAND TOTAL	4867	2544	1435	398	343	259	9846

Monitoring information at Koribondo Community Health Centre, Bo District.

HEART

HEALTH & EDUCATION ADVICE & RESOURCE TEAM

JUNE 2016

HMIS data

- The FHCI assessment included a review of selected HMIS indicators. This showed missing values each month for between 20% and 40% of health facilities. This is likely to have led to biases in the HMIS information.
- A study by Options Consultancy² in 2015 showed that there are large unexplained variations between figures recorded in the health facility registers, the summary sheets at district level, and the data recorded centrally in District Health Information System (DHIS). This highlights the weaknesses of current data quality control processes.
- No HMIS data are available in the DHIS for the period before April 2011.

Demographic and Health Surveys

- Inconsistencies exist in the trends for mortality between the 2008 and 2013 rounds of the DHS and between the DHS and the MICS.
- The age structures for females in the 2008 DHS do not match those from census population estimates.
- There are known weaknesses in fieldwork processes for the 2008 DHS.

Vital registration system

- No effective vital registration system exists to provide a full count of births and deaths. Of particular importance to the field of health, there is no comprehensive information on the causes of death, particularly maternal deaths.

Maternal mortality measurement

The data weaknesses have particular relevance to maternal mortality, which is currently measured and assessed poorly in Sierra Leone. The survey measures from the DHS come with such wide margins of uncertainty that they are of little use in showing change. The survey approach is not a suitable method to understand why women are dying, which deaths are avoidable, or where in the country the problems are most severe. The result is that there is little information from the M&E system to guide effective policies and actions to tackle maternal mortality. What is needed is accurate data on how many women are dying and where, but more importantly, why they die when they do. Survey and management data can only provide a limited picture of this compared to vital registration statistics.

At the start of the FHCI there was some reporting and dissemination of monitoring information. Reports were initially given to the FHCI steering committee and health bulletins were produced. However both these activities had stopped by 2012. There appears to have been little other use of the information and analysis. In particular the health sector reviews did not happen annually as planned. The result was that there was little use of the available data and low levels of feedback to encourage improvements to be made to the data quality. Overall, the review found little evidence that there was a deliberate effort to link the results of the M&E outputs to policy and accountability processes.

Ebola and M&E

The recent Ebola outbreak has had both negative and positive effects on the health M&E system. Response rates and accuracy for HMIS data are likely to have suffered due to the pressure on staff functioning in the emergency situation. However, efforts to collect information on the number and causes of deaths were improved significantly during the Ebola period. This process attempted to cover all deaths, not only those from Ebola. If this data collection is continued and improved in the coming years, it could fill a large gap in Sierra Leone's health information system.

4. Recommendations and priorities for the way forward

Significant outstanding challenges remain for the M&E system in the health sector. This has been recognised by MOHS, and in 2015 DPPI reconvened an M&E technical working group with a wide range of stakeholders to take forward this work. The FHCI review of the M&E pillar highlights outstanding challenges in the following areas:

Strategy and work planning

A new strategy is needed to provide an overarching framework for M&E work in the health sector. A clear time-bound and prioritised work plan is also required, including cost estimates and resources to cover these. The strategy and work plan need to be underpinned by consultation with current and potential users of the M&E outputs.

² Partnership Management, Evaluation and Learning (PMEL). (2015). Rapid Assessment of the Impact of EVD on the Functioning of the Health Management Information System (HMIS) in Sierra Leone. Options Consultancy.

HEART

HEALTH & EDUCATION ADVICE & RESOURCE TEAM

JUNE 2016

Data sources

The focus so far has been primarily on HMIS data. Further work is necessary to design a coherent set of data sources including coordinated management data covering the full range of the health system: use of the health service and its outcomes, human resources, drugs and logistics, surveys, censuses, vital registration and surveillance systems. Each of these types of data source will have different strengths and weaknesses and they need to be considered together to produce a cost-effective and appropriate system.

For the management data, increased coherence is needed between the separate systems that have been developed for the use of health facilities, human resources, drugs, logistics and other areas.

The survey programmes have scope to be brought closer together for example by looking at consistent questions and methods between the DHS and the MICS, and by organising the timings of the surveys to maximise their value.

Developing strong vital registration systems will take several years to plan and implement; this requires resources to be available and plans to be made for the medium term as well as the next few years. In the meantime, sample surveillance techniques for births and deaths should be developed to produce information more quickly. High maternal mortality was one of the key reasons the FHCI was launched, but there is currently no robust system for monitoring it, including how it is changing and the

causes of the maternal deaths that do occur. The DHS is inadequate for this purpose with its wide margins of error for maternal mortality estimates and lack of information on the causes of death.

Data quality

Poor data quality is one of the main weaknesses with the existing system. This affects both the administrative data from HMIS and survey sources. Measures to strengthen quality control processes and improve the completeness and accuracy of the data include the following:

- Regular reporting on which facilities do and do not provide data each month, and the levels of completeness for each facility. Follow-up processes for those facilities whose reporting levels are poor.
- For each indicator, automated comparisons that highlight when responses are out of line with expected levels for each facility and for national and district profiles.
- Increased levels of financial and staff resources for districts to supervise and support data collection in their health facilities.
- Monthly information for each health facility to show how their trends compare with district and national averages and support to show how facilities can use their own data more effectively to manage and improve performance at the local level.
- Regular reporting on data-quality issues, such as response rates and

accuracy levels.

- Comparisons of trends from different sources (HMIS and surveys) to cross check where the pictures are similar and differ.

Encouraging the use of data

In general, the main factors that drive improvements in the availability and quality of data are the level of demand for the data and how much they are used. A high demand for data provides a strong incentive for data producers to strengthen and expand their data collection. Intensive use of the information can highlight the strength and weaknesses of the various datasets, help identify areas that can be improved and demonstrates where resources can best be directed.

The use of data has been an area of weakness for Sierra Leone's health sector. Examples that could strengthen this area include the following:

- Develop a series of outputs that present the results of the M&E system at facility, district and national levels. This could include a regular monthly dashboard of indicators; quarterly bulletins showing trends in the key issues in the health sector along with interpretative text; and annual assessments against the indicators and targets of the overarching health sector programmes.
- Ensure that regular health sector reviews take place and that these include a discussion of the progress seen against indicators and targets.

Resources

Scott C. (2005). Measuring up to the measurement problem: the role of statistics in evidence-based policy-making. *London School of Economics*.

Jones A. (2016) Imagine it was safer to give birth in 1850s Sweden than in many parts of the world today... Medium, <http://bit.ly/29iDyNw>

Witter S. et al. (2016). The Sierra Leone Free Health Care Initiative: process and effectiveness review. Oxford Policy Management Limited.

Contact information: FHCI evaluation project manager: Nouria Brikci (nouria.brikci@opml.co.uk) or team leader: Sophie Witter (switter@qmu.ac.uk).



HEART is a consortium of leading organisations in international development, health, nutrition and education. We work together to support the use of evidence and expert advice in policymaking.

