



**Government of Sierra Leone
Ministry of Health and Sanitation**

Results and Accountability Framework

2010 - 2015

January 2012

Foreword

The Ministry of Health and Sanitation, in collaboration with our health development partners, has developed this Results and Accountability Framework to measure progress towards achieving the objectives of the National Health Sector Strategic Plan (NHSSP).

This Plan has been prepared to help us improve the quality of monitoring and evaluation within the health sector. It focuses on how monitoring and evaluation can support health services management and engage stakeholders in understanding progress in health programmes implementation, learning from constraints and achievements, and collectively agreeing on how to improve both strategy and operations.

We recognize the fact that impact-oriented monitoring and evaluation is most effective when stakeholders are involved in a creative process of learning how to improve the health systems on a continual basis. Therefore, this Results and Accountability Framework was developed with the participation of stakeholders who, in a meaningful way, collectively discussed and incorporated what they needed to enhance their participation in sector wide monitoring and evaluation.

The plan has also taken into account the fact that identifying the information needed, the purposes for which it is needed and by whom, is critical for successful monitoring and evaluation. It was thus developed to track progress in relation to targets, and is also intended to explain success and failure, and identify unintended positive or negative effects. It is furthermore intended to provide information that helps answer key questions regarding relevance, effectiveness, efficiency, gender based and human rights programming, impact and sustainability.

We have expended much effort to only collect information that is actively used and have avoided the common M&E trap of gathering too much data of limited quality that is not analysed and not used. The growing belief of less data that may lead to more useful information has been the guiding principle during the development of the plan.

The joint development of the plan with partners is seen as a critical step towards capacity building. It is my sincere hope therefore, that, together with our partners, we can build the capacities of the relevant health workers to be able to better contribute to the monitoring and evaluation of the NHSSP.

The Results and Accountability Framework can only help the implementation of the NHSSP if it is used in a structured, critical and reflective manner together with all stakeholders. Regular identification of '*lessons learned*' from those reflections will help us as a sector to systematise our experiences so that we can decide on improvements that can increase impact.

I hope that this document will serve a meaningful purpose in our Annual Reviews with stakeholders, since those are essential moments to reflect and refocus so that it is possible for us to return to implementation with more clarity and consensus about how to redress problems and build on successes.



Honourable Haja Zainab Hawa Bangura
Minister of Health and Sanitation

Acknowledgements

The development and production of this Results and Accountability (R & A) Framework was made possible through the concerted effort of districts, divisions and departments within the Ministry of Health and Sanitation, as well as through collaboration of government departments and our development partners.

Special thanks and appreciation go to the Minister of health and Sanitation for her leadership and guidance during the development of this document.

The ministry would like to thank all those who contributed to the design and preparation of this framework. Their commitment and hard work has produced the R & A Framework that we believe will enable more systematic assessments of our health system.

The individuals who assisted with the final production of the document are too numerous to mention, but special thanks should go to Dr. Boniface Kalanda of UNFPA, Mrs. Nobuko Ohno of JICA, Dr. Stanislas Nebie of JSI/HMN, Dr. Kathryn O'Neill and all implementing agencies that provided invaluable inputs into this framework.

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We wish to take this opportunity to thank the World Health Organization (WHO) for providing technical and financial assistance to the Ministry during the development, editing and printing of this document.

We hope this document will be useful to all of us as we strive to achieve better health for the residents of Sierra Leone, especially women, children and the poor.



Dr. Kisito Sheku Daoh
Chief Medical Officer
Ministry of Health and Sanitation

Executive Summary

The increased emphasis on accountability in all development plans requires the creation of information systems that allow for Key Performance Indicators to be regularly tracked and reported on. This Results and Accountability Framework is part of a system for creating health information during the implementation of the National Health Sector Strategic Plan (NHSSP) (2010 – 2015). The specific M&E actions to be undertaken will generate information that will enable the health sector to monitor NHSSP implementation and performance. In particular, this information will create knowledge for improving health care.

The M&E system will assist the health sector in three critical and strategic ways: (a) allowing regular performance measurement of results and service quality to facilitate accountability, (b) assisting in focusing attention on achievement of outcomes that are relevant to the goal of the health sector and (c) systematically gauging how well the health sector is progressing towards assisting in attaining the health related Millennium Development Goals (MDG) indicator targets.

The Results and Accountability Framework comprises four (4) sections. First there is an introduction that sets in brief the background to the development of this Results and Accountability Framework. It describes the existing policy environment, which is largely the Agenda for Change and the NHSSP; the process undertaken to develop the Results and Accountability Framework; and the current situation of M&E in the health sector. Risks and assumptions for both the NHSSP and the Results and Accountability Framework are also briefly described.

The second section provides a brief description of the M&E needs of stakeholders and the roles and responsibilities of various players in the sector M&E. This section describes the institutional framework for monitoring and evaluating the NHSSP and indicates that the MOHS will partner with sector wide coordinating bodies to carry out this task. The notable sector wide coordinating bodies are the Health Sector Coordination Committee (HSCC) and the Health Sector Steering Group (HSSG). The private sector (NGOs, CBOs, FBOs) and District Health Management Teams (DHMTs) will be the primary producers and users of health information. The M&E Sub-Committee of the HSSG will provide technical guidance to both the HSCC and HSSG in the implementation of the Results and Accountability Framework..

Section three describes the Monitoring and Evaluation framework as well as data management in the Results and Accountability Framework. It describes the required data as well as the producers and users of the data. Key Performance Indicators of the sector are presented in this section and feedback mechanisms on M&E data are described. The resultant M&E products are also described along with their methods of dissemination and beneficiaries to whom they are to be disseminated. This section also describes the issues that will be monitored.

The fourth section describes the evaluations, reviews and research that will be carried out as part of the knowledge generation and accountability mechanisms for the NHSSP.

There are annexes that provide information on an M&E Logical framework, meta-data for all the indicators, an M&E and Research Management Framework and an 3-year costed M&E development plan with budget.

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List of Abbreviations

ADB	Africa Development Bank
AHSPR	Annual Health Sector Performance Report
AIDS	Acquired Immune Deficiency Syndrome
ANC	Ante Natal Care
ART	Anti-Retroviral Therapy
ARV	Anti-Retroviral
BCG	Bacillus-Calmette-Guérin
BEmONC	Basic Emergency Obstetric and Neonatal Care
BPEHS	Basic Package of Essential Health Services
CAS	Country Assistance Strategy
CBO	Community Based Organisation
CCM	Country Coordinating Mechanism
CEmONC	Comprehensive Emergency Obstetric and New Born care
CHC	Community Health Centre
CHO	Community Health Officer
CHP	Community Health Post
CPR	Contraceptive Prevalence Rate
CPT	Cotrimoxazole Preventive Therapy
CSO	Civil Society Organisation
CWIQ	Core welfare Indicator Questionnaire
DFID	Department for International Development
DHIS	District Health Information System
DHMT	District Health Management Team
DHS	Demographic and Health Survey
DMO	District Medical Officer
DMS	District Medical Stores
DPI	Directorate of Planning and Information
DPT	Diphtheria, Pertussis and Tetanus
EOC	Emergency Obstetric Care
EPI	Expanded Programme for Immunisation
EU	European Union
FBOs	Faith Based Organisations
FHC	Free health Care
GDP	Gross Domestic Product

List of Abbreviations

GFATM	Global fund to Fight AIDS, Tuberculosis and Malaria
GoSL	Government of Sierra Leone
HFS	Health Facility Survey
HIS	Health Information System
HIV	Human Immunodeficiency Virus
HMIS	Health Management Information System
HMN	Health Metrics Network
HR	Human Resources
HRIS	Human Resources Information System
HSCC	Health Sector Coordinating Committee
HSSG	Health Sector Steering Group
ICC	Inter-agency Coordination Committee
ICD	International Classification of Death
IDW	Integrated Data Warehouse
IEC	Information, Education and Communication
IHP	International Health Partnerships
IMNCI	Integrated Management of Neonatal and Childhood illnesses
IMR	Infant Mortality Ratio
INGOs	International Non-Governmental Organisations
IPT	Intermittent Presumptive Treatment
ITN	Insecticide Treated Net
JICA	Japan International Cooperation Agency
JPWF	Joint Programme of Work and Funding
KPI	Key Performance Indicators
LGA	Local Government Authorities
LGFD	Local Government Finance Department
LMIS	Logistics Management Information System
M&E	Monitoring and Evaluation
MCH	Maternal and Child Health
MCHP	Maternal Child Health Post
MDAs	Ministries, Departments and Agencies
MDGs	Millennium Development Goals
MICS	Multi-Indicator Cluster Survey
MMR	Maternal Mortality ratio
MoFED	Ministry of Finance and Economic Development

List of Abbreviations

MoHS	Ministry of Health and Sanitation
MOU	Memorandum Of Understanding
MTE	Mid-term evaluation
MTEF	Medium Term Expenditure Framework
NAS	National AIDS Secretariat
NGO	Non-Governmental Organisation
NHA	National Health Accounts
NHP	National Health Policy
NHSSP	National Health Sector Strategic Plan
ONS	Office of National Security
ORS	Oral Rehydration Salt
PHC	Primary Health Care
PHU	Peripheral Health Units
PMTCT	Preventing Mother to Child Transmission
PPTCT	Prevent Parent To Child Transmission
PRSP	Poverty Reduction Strategy Programme
RCH	Reproductive and Child Health
SARA	Service Availability Readiness Assessment
SECHN	State Enrolled Community Health Nurse
SLDHS	Sierra Leone Demographic Health survey
SMART	Standardized Monitoring and Assessment in Relief and Transition
SP	Sulphadoxine Pyremethamine
SRN	State Registered Nurse
SSL	Statistics Sierra Leone
TB	Tuberculosis
TT	Tetanus Toxoid
U1	Under One
U5	Under Five
UN	United Nations
UNFPA	United Nation's Population Fund
UNICEF	United Nation's Children's Emergency Fund
USL	University Of Sierra Leone
VCCT	Voluntary Confidential Counselling and Testing
WHO	World Health Organisation

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Chapter 1

Results and Accountability Framework for NHSSP

Introduction

Sierra Leone in recent years has made significant progress in delivering interventions to address health goals in areas such as maternal, neonatal and child health, HIV/AIDS, tuberculosis, malaria and non communicable diseases. However, these gains have not been sufficiently broad based and sustainable. Progress at national level has not been reflected in gains for most vulnerable population groups particularly those in the rural settings.

It is evident that health systems that deliver services equitably and efficiently are critical to the achievement of health goals. Global health initiatives have thus paid more attention to health systems strengthening as a key strategy to addressing health inequalities and achieving health goals. Sierra Leone adopted this strategy and has developed its first National Health Sector Strategic Plan (NHSSP) with a six year horizon (2010 – 2015), along the lines of health systems strengthening, mainly focusing on its six pillars of governance, service delivery, human resources, health care financing, medical products and technologies and health information.

While the sector has welcomed the increased attention to health systems strengthening, it has also recognized the fact that it will not be sustained in the absence of a solid monitoring strategy that enables decision-makers to track how health systems are responding to increased inputs and the impact in terms of improved health indicators. This demands the definition of core indicators of health system performance while concurrently developing and implementing appropriate and sustainable measurement strategies to generate the required data.

Monitoring and evaluation is a critical component of the National Health Sector Strategic Plan. The Ministry of Health and Sanitation and health development partners have developed this comprehensive Monitoring and Evaluation (M&E) framework which is designed to measure progress towards the achievement of the goals of the NHSSP and serve as a platform for results and accountability for the health sector. The comprehensive M&E Framework aims to monitor the resources invested, the activities implemented, services delivered as well as evaluate outcomes achieved and their long-term impact.

The framework has been prepared in a bid to reach broad-based consensus around key indicators. Many partners are working within the health sector to help reverse the current unacceptably poor health indices and a successful M&E framework should accommodate more than just a single donor or implementer's needs. The overall M&E needs of the sector have therefore been considered and integrated.

To date, the Ministry of Health and Sanitation has worked closely with stakeholders from other sectors of government, including Statistics Sierra Leone (SSL), Local Government Finance Department (LGFD) and the Decentralization Secretariat. It has also worked closely with interna-

tional agencies including WHO, UNICEF, The World Bank, African Development Bank (ADB), JICA, UNFPA, other health development partners and NGOs to promote coordinated M&E efforts.

There has been considerable progress made with M&E investments within the MoHS in the past few years. One of the most notable achievements has been the successful collaboration with WHO and DFID on the National Health Accounts (NHA) survey of 2007. The completion of this survey has provided the ministry and partners with valuable information in terms of health care financing in the country, and has established base line data which can now be used for M&E and other planning purposes.

Another important mile stone has been the successful collaboration with Health Metrics Network (HMN) on the introduction and rolling out of the District Health Information System (DHIS). This information system has enhanced the ministry's capacity to generate and harness health information for use in health planning, implementation and monitoring.

This M&E and review framework is based on the goal of the NHSSP, which is to reduce inequalities and improve the health of the people, especially mothers and children, through strengthening national health systems to enhance health related outcomes and impact indicators. This goal translates the overall mission and vision of the National Health Policy into policy objectives that are in line with the "Agenda for Change", the Ouagadougou Declaration and the MDGs. The sector evaluation will be based on impact indicators measured at baseline, midpoint and in the 6th year of NHSSP implementation. Data used to evaluate coverage and utilisation of service delivery interventions and impact will be collected through the Demographic and Health Survey (DHS), Multiple Indicator Cluster Survey (MICS), National Health Accounts (NHA), Core Welfare Indicator Questionnaire Survey CWIQ, Public Service Survey (PS) and District Health Information System (DHIS). Ongoing monthly, quarterly and yearly monitoring of programme inputs and outputs will be used to guide programme implementation.

It is hoped that this framework will serve broader ends, providing an alert and early warning capability, supporting patient and health facility management, enabling planning, supporting and stimulating research, permitting health situation and trends analysis, supporting global reporting, and underpinning communication of health challenges to diverse users in a timely manner.

1.1 Policy Environment

The NHSSP set as a goal to reduce inequalities and improve the health of the people of Sierra Leone, particularly mothers and children, through strengthening national health systems to augment health related outcomes and impact. This goal translates the overall mission and vision of the National Health Policy into policy objectives that are in line with the "Agenda for Change", the Ouagadougou Declaration and the MDGs. The general objective is to strengthen the functions of the national health system of Sierra Leone so as to improve the health sector performance criteria, in terms of access to health services, quality of health services, equity in health services, efficiency of service delivery, and inclusiveness in health services

delivery. The inputs required to influence the above performance criteria form the basis for the specific objectives of the NHSSP, and they correspond to the national health priority areas as articulated in the “Agenda for Change”.

The National Health Policy of Sierra Leone¹ specifies the goals, objectives and priorities for investment to maintain and improve the health of the population of the country. The national health policy recognises the role of M&E in ensuring efficient health services delivery. For example, Section 13.1 of the National Health Policy notes that

"The monitoring of progress of policies and plans is dependent on the availability of reliable and standardised information. The Ministry of Health and Sanitation will develop, in conjunction with key partners, a unified Health Management Information System to meet these needs. A technical policy on Health Management Information will be developed which will specify reporting requirements from all providers to the Ministry of Health and Sanitation and appropriate feedback processes."

In addition to the national health sector plan, there exists specific national policies and plans for specific programmes and or diseases (Table 1).

Table 1. List of Sectoral Policies and Plans

<i>Name</i>	<i>Period</i>	<i>Area</i>
National Health policy	2002	General Policy
National Blood transfusion Policy	Final 2006	Blood transfusion
Child Health policy	Draft 2007	Child health
Revised Health Services cost recovery policy guidelines	Final draft 2006	Health financing
National Environmental Health Policy 2000	Revised draft 2007	Environmental Health
<i>National food and Nutrition Policy</i>	<i>2003-2008</i>	<i>food and Nutrition</i>
National Health Care waste management Programme Policy (NHCWMP)	Final draft August 2007	Waste Management
Health Education Policy	May 2000	Health Education
National HIV/AIDs Policy	June 2010	HIV/AIDs
Human Resources for Health Policy (Draft)	2011	Human Resources
National Malaria Control Policy document	August 2011	Malaria
National Medicines Policy of Sierra Leone second edition	2004	Medicines
National Policy on Immunization	November 2002	Immunization
National Policy on traditional medicine	2005	Traditional Medicine
Reproductive Health Policy and Strategy	2008	Reproductive Health
Non Governmental Organization Policy National Laboratory Services Policy	2010	Laboratory Services

1. Republic of Sierra Leone Ministry of Health and Sanitation, National Health Policy, October 2002

1.2 Situational Analysis of the existing health information system

Monitoring and evaluation in the health sector is characterised by a multiplicity of frameworks fostered under multilateral and bilateral donors, United Nations agencies and Non Governmental Organisations (NGOs). The sector has made much effort to create a unified M&E system, through the use of integrated data collection tools, establishment of a District Health Information System in all districts, producing Quarterly Bulletins and sharing data with stakeholders.

In spite of these efforts, the M&E in the sector is still weak. Contributing factors include the limited skills and capacity of M&E staff at national and sub-national levels. There is fragmentation of M&E at National level with multiple programme staff setting up parallel systems to collect programme specific data. There are still many tools for data collection, which undermine quality. This is also reflected at national level where data aggregation, analysis and reporting is also programme focused. At all levels, there has been no feedback to lower levels. Other problems include lack of coordination of M&E systems across ministries, districts and communities, lack of systematic use of monitoring results and absence of structures in the decentralized institutions. There has also been frequent malfunctioning of computers due to viruses and problems with electricity supply. This scenario created a vicious cycle of incompleteness of data, poor quality of data and subsequently non use of such data. Another major issue affecting sector wide monitoring is absence of partnership with all stakeholders, particularly those from the NGOs and the private sector

Since 2007 the MoHS, with support from the Health Metrics Network (HMN), has championed reforms in creating a district based database. This is an important aspect of M&E. The MoHS/DPI now collates district data through an electronic District Health Management Information System (DHIS). In 2007, a National Health Accounts Survey was also completed in collaboration with DFID and WHO. With the development of the NHSSP, partners in the health sector have rallied around developing an all encompassing sector plan for monitoring and evaluation. Data generated by the Results and Accountability Framework will be analysed and be part of health information for use by the whole sector.

Mechanisms are being put in place to improve data collection to ensure quality, validity and accuracy. Existing data collection mechanisms are being enabled and new systems are being developed to respond to the data needs imposed by the plan. Data collection, validation and use from the service point level up to the national office rely on existing expertise, commitment and dedication of members of the health team to use data collection tools and report data. Information on indicators will be available incrementally as the data collection systems mature and grow over time. Current efforts are expended to ensure information on a primary set of selected input, output, process and impact indicators are made available. In particular, this Information will play a central role in supporting strategic goals and in underpinning the principles of the NHSSP.

1.3 Goals and objectives of the Results and Accountability Framework

1.3.1 Goal

The overall goal of the Results and Accountability Framework 2010-2015 is to provide a comprehensive and robust health sector wide framework for monitoring evaluation and review of the NHSSP 2010-2015 that serves as the common platform for tracking progress and performance at national and district level, with alignment of specific disease /health programmes as well as all key stakeholders and partners.

1.3.2 Specific Objectives

The specific objectives of the NHSSP Results and Accountability Framework 2010-2015 are:

- To establish a strong, integrated and well coordinated country health information system, including implementing a regular and coordinated programme of population-based surveys and facility assessments, strengthened routine HMIS and administrative databases (logistics and human resources), and strengthened civil registration systems supported by a functional Information technology infrastructure that generates high quality and timely information on core indicators of the NHSSP.
- To strengthen institutional capacity in all aspects of M&E including data collection, management, analysis, synthesis, data quality assessment, performance reviews, reporting and data dissemination.
- To enhance use of results for planning and decision-making, including policy development and corrective action as the basis for mutual accountability between country citizens, decision-makers and international community.

1.3.3 Outputs

- An integrated and well functioning national health management information system that provides timely and accurate monitoring at district and national level.
- A regular and well-coordinated programme of population based surveys and facility assessments, including quality assessments.
- A vital registration system that functions well, with increased quality of data and capacity for analysis (sufficiently reliable estimates of age, sex, geographic region, specific fertility and cause-specific mortality rates).
- A well functioning logistics management information system and Human Resource Management Information System for enhanced service delivery and to ensure equitable and efficient allocation and use of health sector resources.
- Strengthened maternal death surveillance and response mechanism including regular assessments of quality of care in health services.
- A regular mechanism for data quality assessment, including regular data quality reports.

- Strengthened capacity at national and district levels in all aspects of M&E
- Enhanced availability and use of high quality data for robust analytical health sector reviews, including equity analyses, production of district and national progress and performance reports, statistical summaries and bulletins
- Improved transparency of data, methods and analyses through the development of a national health resource centre, including a national observatory and portal
- Regular and transparent evidence based performance review meetings as a mechanism to hold all stakeholders to account, including district and national teams of the MoHS, bilateral donors, private sector, civil society, etc.
- Establishing a Health Demographic Sentinel Surveillance (HDSS) Site
- Resource tracking, including NHA and Sub-NHA survey Reports

The MoHS will need data for planning and to report on results achieved. Results from the Results and Accountability Framework will be used by central level agencies such as the MoHS and the Ministry of Finance and Development to mobilise resources for the health sector. Multilateral and bilateral development partners will also need health information to plan their Country Assistance Strategies (CAS). In addition, these organisations will use this data to report results of their previous CASs to their headquarters. International NGOs and local NGOs will use M&E data for developing areas of assistance, planning on-going programmes and reporting results. Local councils will also use the Results and Accountability Framework to monitor and evaluate their Comprehensive District Plans, while civil society groups will use M&E data to advocate for neglected service areas, neglected groups and to assist communities to request services from local governments.

1.4 Development process of the Results and Accountability Framework

The Monitoring and Evaluation Plan was developed taking into consideration the goals and objectives of the NHSSP 2010-2015, as well as other national policy objectives, including the Sierra Leone Poverty Reduction Strategy Paper II (The Agenda for Change) the Free Health Care Policy, the Basic Package of Essential Health Services, the Ouagadougou Declaration and the Millennium Development Goals (MDGs). The focus is clearly on improved health outcomes and impact, with particular attention paid to the reduction of high mortality rates in mothers and young children.

The process and the Results and Accountability Framework take into consideration mutual accountability for the commitments entered into in the Sierra Leone health Compact. The indicators that were identified as part of that process are monitored through this framework. In addition, a review of a wide range of national and health sector documents, including a review of programme specific Results & Accountability Frameworks, was also carried out.

The Directorate of Planning and Information (DPI) within the Ministry of Health and Sanitation was responsible for the initial drafting of the plan, which has gone through several iterations with input and feedback from various MoHS officials, health development partners and civil society.

1.5 Implementation of the Results and Accountability Framework

The activities and outputs specified in the Results & Accountability Framework will be implemented as part of the Joint Programme of Work and Funding (JPWF) 2012-2014. The JPWF has been developed in order to operationalise the NHSSP in a more coordinated and effective manner. The JPWF outlines the priority health activities to be implemented by the MoHS, development partners and major NGOs and the first 3 year rolling plan will de facto become the annual operational plan. The key outputs, activities, inputs and budget for the Results & Accountability Framework are integrated into the JPWF and will be monitored as part of an evaluation of that process.

1.6 Alignment /harmonization of disease and programme specific monitoring, evaluation and review

Efforts will be made to align/ harmonise the M&E components of the disease and programme-specific Results & Accountability Frameworks with the M&E framework of the NHSSP. Conversely, all disease and programme specific M&E should aim to use the same technical framework as that of the NHSSP. This implies that data collection, transfer and analysis are well coordinated and include a common plan for household surveys and facility assessments as well as cross-cutting efforts to strengthen the routine collection of data.

1.7 Risks and Assumptions

The formulation of the NHSSP has identified risks and was based on assumptions. These include continued government commitment to political and funding support of the health sector. It was also based on the assumption that Sierra Leone's Development Partners (DP) will continue to advocate for technical and financial support to the health sector. Other assumptions include availability of management and fiduciary capacity at both central and district levels. It is also assumed that communities will cooperate in running those parts of data collection that require their input. Mitigation measures for all anticipated risks are suggested in the Log Frame.

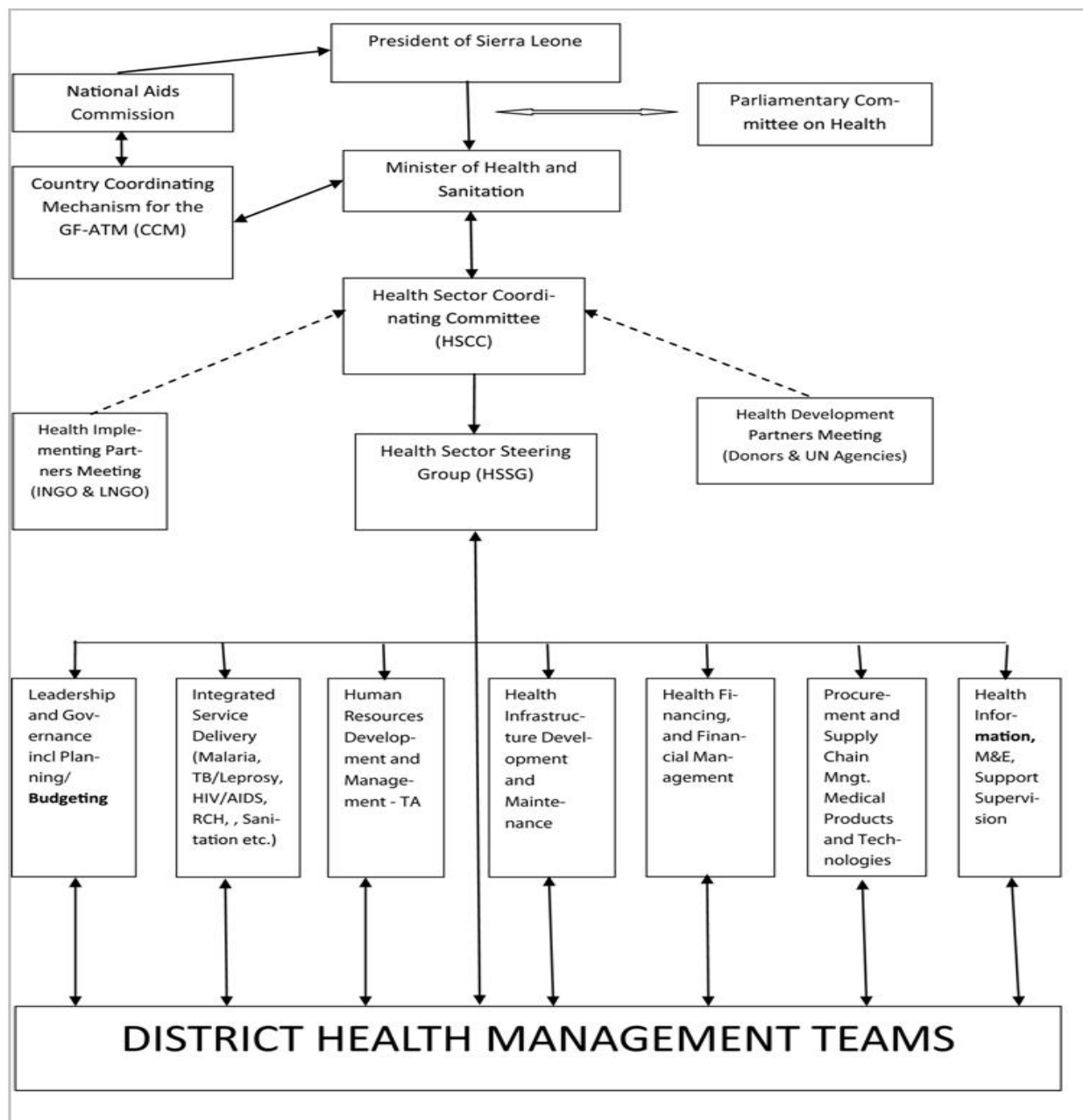
Chapter 2

Institutional Structures and Responsibilities for M&E and Review

2.1 Country-Led Coordination Mechanisms

This Results & Accountability Framework will be executed by all partners in the health sector. Overall guidance will be provided by the MoHS through the DPI. National level committees will have specific roles and responsibilities in coordinating the implementation of this framework.

Figure 1. Coordinating Mechanism in Health Sector



2.1.1 Ministry of Health and Sanitation

The Ministry of Health and Sanitation (MoHS) will be the overall executing agency through the Directorate of Planning and Information (DPI), which will ensure that there are enough resources to carry out activities necessary to implement the Results & Accountability Framework . The DPI will house the central Health Management Information System that will be used to track Key Performance Indicators and will also guide the process of conducting annual sector reviews. It will guide the selection and recruitment of consultants for the midterm and end of term evaluation and will provide a secretariat to the National Monitoring and Evaluation Technical Committee.

2.1.2 Health Sector Coordination Committee

The Health Sector Coordination Committee (HSCC) is the overall multi-sectoral committee that will oversee the implementation of the NHSSP at policy/upstream level. The HSCC will set the agenda for Annual Reviews and decide on focus areas. The National Monitoring and Evaluation Committee will provide technical advice to the HSCC. This advice will include formulating ToRs for reviews, identifying consultants, ensuring relevant data is available and reviewing Annual Review Reports before presenting them to the HSCC.

2.1.3 Health Implementing Partners Committee

The Health Implementing Partners Committee (HIPC) is the overall multi-sectoral committee that will oversee implementation of the NHSSP through fostering partnerships and sharing of activities being implemented at beneficiary level. The HIPC will be responsible for monitoring the partnership arrangements in the health sector. This will include ensuring that data (programme and financial) for outcome evaluations are systematically collected from all partners. The HIPC will also be a conduit for fostering and facilitating collation of key performance indicators and evaluation information from all partners.

2.1.4 Private Sector

As part of the health sector, the private sector will feed into the national health information system through providing service related and financial data. This will contribute towards obtaining the national picture of health service provision in the country. It is necessary that the private sector provides such data accurately if there should be a meaningful **outcome evaluation** of the NHSSP.

2.1.5 Civil society organizations and NGOS

Civil Society Organisations (CSOs) are currently playing a critical role in the monitoring of health care services. They have been involved in advocacy for additional support for the sector, ensuring that drugs and other health commodities reach their intended targets as well as helping communities to set up structures for monitoring health services delivery. They have also been working on setting up social accountability structures at community level. CSOs will be encouraged to continue working with DHMTs and at National Level in establishing these systems.

2.1.6 Local government team – District Health Management Teams

At the district level, District Health Management Teams (DHMT), led by the District M&E Officer, will take the lead in ensuring that data needed to generate Key Performance Indicators are captured in the DHIS and reported monthly to the DPI. DHMT will take the lead in organising district quarterly reviews, participate in Annual Reviews and will be instrumental in providing and analysing district wide data (including for services provided by NGOs). DHMTs will also participate in Mid Term and End of Term evaluations through providing the required data to evaluation teams.

The following are the key stakeholders at district level

- District Health Management Teams
- Local Council Health Committees
- NGOs
- CBOs
- Private Facilities
- Health training Institutions
- Civil Society Organisations
- Traditional leaders

PHU level

- PHU Staff
- Community Leaders
- Facility Management Committees
- Community Health workers

Community level M&E activities

M&E Activities at community level include:

- Reporting information on service provided at community level
- Reporting information on deaths and births at community level
- Providing data for household surveys
- Participating in community monitoring systems

2.2 Roles and responsibilities for key country institutions and stakeholders

Certain institutions have a critical role in the implementation of the Results & Accountability Framework . These include, the MoHS, Statistics Sierra Leone (SSL), University of Sierra Leone, Private Institutions, NGOs, FBOs, CSOs and Development Partners.

The MoHS will monitor the implementation of the plan as well as create a monitoring system that starts from the community, through the facility, the district to the national level. The

Ministry will also ensure that information collected through the country M&E system is disseminated and available to all partners.

SSL, in line with its mandate, will support all the household and facility surveys. Some surveys will be out-sourced to it, while for others SSL will be requested to provide technical support for specific aspects, such as sample, data entry and analysis.

The University of Sierra Leone and its constituent colleges will be responsible for providing basic, in-service and post-graduate training of staff in Monitoring and Evaluation. It will also have the responsibility for conducting various assessments and research.

Private Institutions, with comparative advantage in conducting evaluations and research, will be contracted to conduct such studies. They will also be contracted to provide training for staff in M&E and in the use of Information communication Technology (ICT).

Non-Governmental Organisations (NGOs) and Faith-Based Organisations (FBOs) will work with the MoHS to set up functional Monitoring systems at community, facility and district levels. Staff of these organisations will be required to provide technical support for the development of the National HMIS.

CSOs will be trained to support data collection at community level, conduct data verification and use the information from the HMIS for advocacy. They will also be supported to set-up community monitoring systems and use data collected through the system to motivate staff to improve performance.

Development partners and Donors will provide both technical and financial support for setting up the national M&E system and sustaining it.

2.3 Capacity Development

Improvements in the health information system cannot be achieved unless attention is paid to the training, deployment, remuneration and career development of human resources at all levels. At the national level, skilled epidemiologists, statisticians and demographers are needed to oversee data quality and ensure appropriate analysis. At peripheral levels, health information staff should be accountable for data collection, reporting/transmission and analysis. Those service providers responsible for primary data collection must be appropriately trained and supported. The following key strategies will be employed to build capacity and improve data quality:

- Capacity for M&E is low at system level, organisational level and individual level. The sector will engage a consultant to conduct a capacity assessment for M&E in the health sector. The assessment will be done at system, organisational and individual level.
- Monitoring and Evaluation Officers will continue to play a key role in data management and data quality assurance. Currently, each district has two such M&E Officers and several public

health programs also employ them at national level. Current numbers (about 40) of these Officers will be maintained while their skills will be upgraded through an in-service course of approximately 4 weeks duration. M&E Officers will meet annually for one week at national level and will benefit from quarterly on-site supervisory visits.

- The capacity of the Ministry of Health and Sanitation (including both the Directorate of Planning and Information and the Directorate for Disease Prevention and Control) to support the health information system will be strengthened with the addition of several health information specialists as summarized in the following table:
- Additional health information specialists (demographers, epidemiologists, statisticians, data base managers) will be recruited for key roles in the Ministry of Health and Sanitation (DPI, DPC, Births and Deaths Registry) and Statistics Sierra Leone.

Table 2: Health information specialists within the Ministry of Health and Sanitation - current number and planned additional staff

Designation	Current number of staff	Additional number
<i>Demographer</i>	0	1
<i>Epidemiologist</i>	1	1
<i>Statistician</i>	1	2
<i>Data / software manager</i>	0	2
<i>M&E Officers</i>	11	15
<i>Assistant M&E Officers</i>	9	212
<i>Data Entry Clerks</i>	13	13
<i>Web Administrator</i>	0	1
<i>Information Technology staff</i>	1	5

2.4 Costed Results and Accountability Framework Implementation Plan

To operationalise this Results & Accountability Framework, a costed Implementation plan has been developed. See Annex 1. This three year costed Implementation Plan will be used by the MoHS and its development partners to ensure that relevant M&E activities are undertaken and that there are enough resources to undertake them. This Implementation Plan will be reviewed every year (as part of the JPWF process).

Chapter 3

Monitoring and Evaluation Framework

Over the course of the NHSSP, data will be collected to monitor trends towards achievement of the targets of the Key Performance Indicators of the NHSSP. Three levels of monitoring will be undertaken, namely: (a) context or risks and assumptions monitoring; (b) inputs and outputs, and (c) outcomes and impact monitoring.

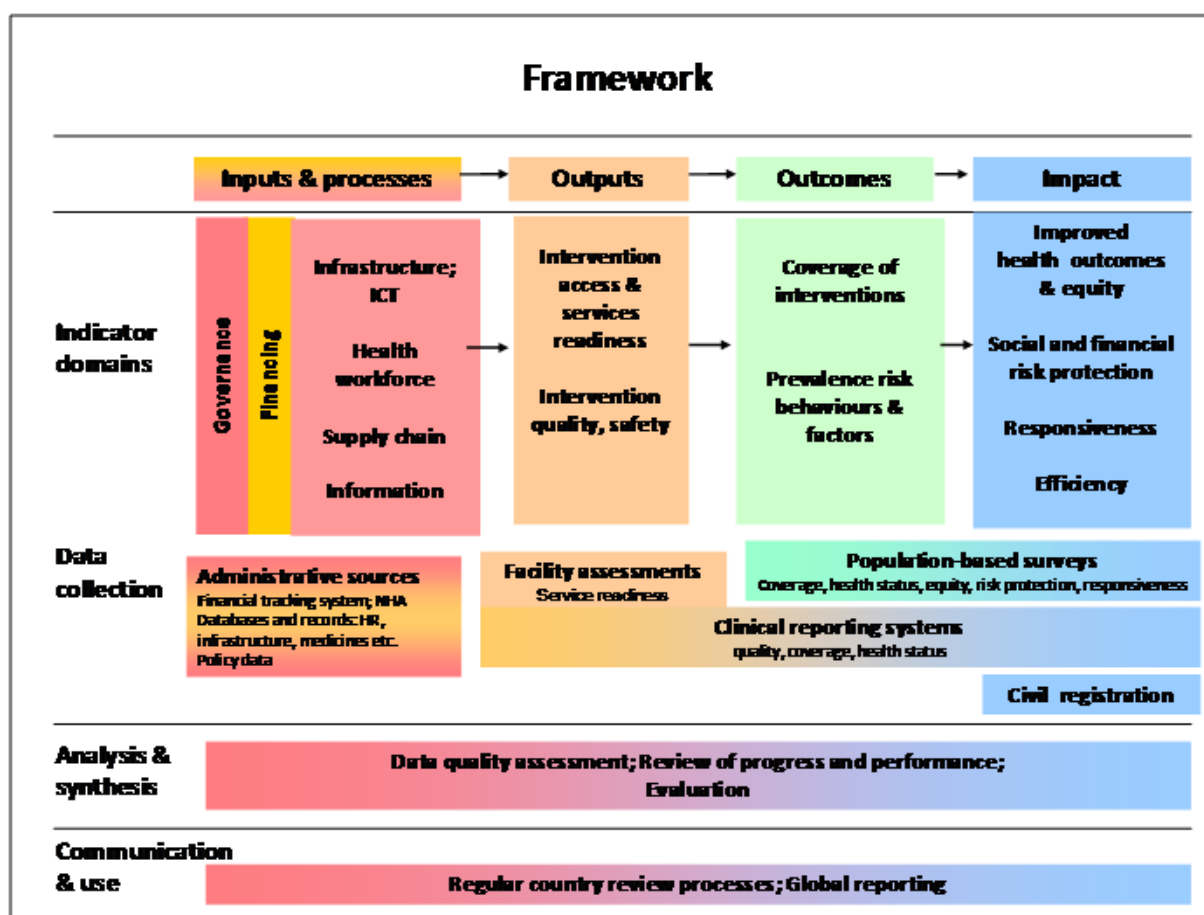
3.1 Context Monitoring

This will involve monitoring the risks identified and assumptions made at the beginning of implementing health programmes on the basis of the NHSSP. The aim of context monitoring is to provide an early warning framework for risks that can derail programme performance so that mitigation measures are undertaken in a timely manner. It will also monitor the validity of assumptions at programme design so that remedial measures can be provided in time, should they prove invalid. Context monitoring will also be carried out to identify other risks that were not obvious at the start of the NHSSP design so that corrective decisions are taken on time. The risks and assumptions that will be monitored are in section 1.7.

Implementation monitoring will monitor financial, physical and organisational issues affecting the implementation of the NHSSP. Physical monitoring will track delivery of inputs to all districts. These inputs include construction and rehabilitation of PHUs, supply of drugs, postings of health staff and provision of training among others. The District Health Information System (DHIS) will be among the major tools to be used for physical monitoring, which will be implemented by Quarterly Supervision Missions. Findings from physical monitoring will be reported through the Annual Health Statistics Report. Staff across the health sector shall be responsible for physical monitoring, guided by their comparative advantages.

3.2 Results monitoring

Table 3: The IHP and M&E Framework



The common IHP+ M&E framework was used to guide the monitoring, evaluation and review work, including the selection of indicators, the identification of critical data gaps, and the identification of needs in analysis, data quality assessment, synthesis, reporting, communication and use.

3.3 Core indicators for monitoring progress and performance of implementation of NHSSP

3.3.1 Core indicators for monitoring NHSSP

Table 4 Core Health Sector Indicators and Targets

	Indicators	Baseline (2008)	2015 Target
1	Infant mortality rate (per 1,000 live births)	89/1,000	50/1,000
2	Under-five mortality rate (per 1,000 live births)	140/1,000	90/1,000
3	Maternal mortality rate (per 100,000 live births)	857/100,000	600/100,000
4	HIV prevalence (15-49 age group)	1.5	1.2
5	Institutional deliveries	24.6%	90%
6	Population coverage of health insurance	0%	50%
7	% of children receiving penta-3 before 12 months of age	54.6%	90%

	Indicators	Baseline (2008)	2015 Target
8	Key Health professionals by cadre per 1,000 population		
	Doctors	0.02/1,000	0.05/1,000
	Nurses	0.18/1,000	0.5/1,000
	Midwives	0.02/1,000	0.1/1,000
9	% of population living within 5Km of a health facility	73%	90%
10	% of population with access to safe drinking water	50.3%	90%
11	% of households with access to improved sanitation	13%	50%
12	Prevalence of underweight among children 6-59 months	21.1%	10%
13	% of PHUs reporting uninterrupted supply of essential drugs	39%	90%
15	Contraceptive prevalence (% of women aged 15-49)	8%	30%
16	Total fertility rate	5.1	4
17	% of children under five years of age who slept the previous night under an insecticide treated net	26%	80%
18	Total public health spending per capita	3.6%	10%
19	Government expenditure on health as % of total national budget	5.6%	15%

3.3.2 Expanded Set of Programme Indicators

District Performance Key indicators

An additional set of Key Performance Indicators (KPI) will be reported once a quarter at district level. The KPIs will also be reported at each Annual Review at national level. These indicators related mainly to input, process and output assessments are routinely tracked and used for the Dash Board Edits and short term performance monitoring.

3.3.3 Programme - Disease Specific Indicators

The Monitoring of Sector performance will be based on selected key performance indicators. However, there are additional indicators that will be used by individual technical programmes to assess progress within their programmes. These indicators are in Annex 4.

3.4 Data Sources

The specific sources of data required for monitoring of implementation of the NHSSP are:

- HMIS
- Health facility surveys (censuses and samples)
- Population based surveys (DHS, MICS, SLDHS, SMART)
- Logistics Management Information Systems
- National Health Accounts
- Human Resource Management Information System
- Civil Registration
- HR Information System

3.4.1 HMIS

The routine health management information system typically yields regular administrative reports on inputs to the health system, including finances, human resources, commodities, equipment and infrastructure. These administrative reports should be supplemented and validated with findings from periodic surveys.

Weaknesses and gaps

- e.g (from accountability assessment) There are problems with timeliness, completeness and quality of data. There are significant capacity issues at the PHU level which are compounded by fragmentation and the burden of reporting systems (HIV, TB, malaria)
- Hospitals not included.
- Challenges in accessing HMIS data at all levels.

Planned activities to address those gaps

- Develop and implement plans for strengthening of nationally integrated routine HMIS that provides timely and accurate monitoring, including convening stakeholders to have a common plan
- Design and implement harmonized data collection forms/tools
- Customisation of DHIS, including revised electronic forms, electronic medical records and improvement of overall performance and functionality
- Strengthen and integrate IDSR into DHIS

Strategic Actions for improving hospital information systems include;

- Development of software to capture information.
- Training of staff in the use of the system.
- Procurement of computers

- Networking of computers for capturing data in hospitals.
- Strengthen ICT for DHMTs and hospitals

3.4.1 Health Facility Surveys

- Health facility censuses will be conducted biannually to assess the availability and geographic distribution of health services nationwide. All private sector facilities (private-for-profit as well as private-not-for-profit) will be covered by these censuses. Maps of the health infrastructure in each district will thus be updated biannually.
- Health facility surveys (SARA) will be conducted biannually to assess a sample of health facilities on service readiness in conjunction with a data quality assessment and record review.
- Quality of care assessment conducted every 2 years (in conjunction with SARA).

3.4.2 Population Surveys

Population-based surveys are an important source of population health information. Household surveys are used to generate statistics on the following: child and maternal health and nutrition; health status; knowledge, beliefs and practices related to disease prevention and transmission; use of services; and household expenditure on health. Of the 23 health-related Millennium Development Goal indicators, 17 are generated through household surveys, such as Demographic and Health Surveys (DHS) and Multiple Indicator Cluster Surveys (MICS).

The DHS and MICS will form the main population-based surveys for health statistics. A DHS will be conducted every 5 years, and MICS surveys will be conducted in between successive DHS surveys. In this way, these two surveys will complement each other.

In addition to these surveys small-scale surveys, such as the Core Welfare Indicator Questionnaire (CWIQ) survey and the Institutional Reform and Capacity Building Project (IRCBP) will be conducted annually. It is expected the questions in these surveys will be expanded to capture information on key health indicators on an annual basis.

Table 5: List of Planned Activities

Survey	Methodology	Implementation Dates	Responsible Institution
Demographic and Health survey (DHS)	National Household surveys	5 years	Statistics Sierra Leone (SSL)
MICS	National Household surveys	5 years	Statistics Sierra Leone (SSL)
SLDHS	District level household survey	2 years	Statistics Sierra Leone (SSL)
SMART	District level household survey	2 years	Statistics Sierra Leone (SSL)
Malaria Indicator Survey	District level household survey	2 years	Statistics Sierra Leone (SSL)
Client Satisfaction Survey	District level household survey	2 years	Statistics Sierra Leone (SSL)
NHA			

3.4.4 Resource Tracking and Institutionalisation of NHA and Sub-Accounts

The MoHS has started the process of developing a health financing policy. It has put in place a system for tracking government budget and expenditure called the IFMIS. The IFMIS however only tracks government expenditure. It does not track donor, FBO or NGOs expenditure. One National Health Accounts (NHA) has been conducted in 2007 to track budgets and expenditure and there is one ongoing. There is a committee to coordinate NHA implementation.

Funding for NHA (two year cycle) has not been regularly available. However, it is planned that National Health Accounts (NHA) will be conducted bi-annually.

3.4.5 Logistics Management Information System

Logistics Management Information System, (LMIS) provides information on the stock status, between levels of the health system. Logistics monitoring is imperative if programs want to know whether logistics operations are enhancing service delivery, providing enough, not enough, or too many products, or whether the logistics organization is aligned with the program goals. LMIS can be either paper or other forms of communication to transfer data which can improve day-to-day management of commodities and inform forecasting and procurement decisions at the district or national level.

As part of the process of strengthening the LMIS, the Ministry of Health and Sanitation, in collaboration with UNICEF, has developed standards for recording the essential data items. These include:

- Stock keeping records such as stock (or bin) cards,

- Transaction records such as requisition and issue vouchers, and,
- Consumption records such as a daily activity record which tallies the amount of each product used or dispensed to patients each day.

In addition to the above, UNFPA has introduced a computerized form of Inventory Control mechanism (CHANNEL), which has been installed in the District and Hospital Medical Stores. However, the system is yet to be used effectively to get consumption data.

To address this situation:

- Additional training will be provided for all health workers that handle drugs, to efficiently perform their respective roles in the LMIS chain.
- Supervision will be heightened to strengthen the capacity of health workers to use the paper-based LMIS.
- An electronic LMIS system will be developed to help automate most of the LMIS processed. This system will be designed to take advantage of the supply distribution process and operate throughout the varying levels of telecommunication available in remote and rural areas.

3.4.6 Human Resources Management Information System

The existing HRH information systems in Sierra Leone are generally not able to adequately support the development, implementation, monitoring and evaluation of evidence based national policies and plans. The data is mostly poor, fragmented and kept by various agencies. The entire systems depend on different sources such as payroll records, district staffing list, health facilities staffing, health training institutions, faith based organizations, censuses or surveys, payroll records and various other services in statistics for which the completeness, timeliness and comparability are widely variable, added with the challenges of combining and compiling information from multiple sources. In addition, other major problems affect the functioning of the existing HRIS.

To address the critical need to improve the existing Human Resource Information System, a properly functioning HR information system will be established. The following will be done to ensure its effectiveness:

- Health workers at district and central levels will be trained in the use of the system.
- A computerized database on the health workforce will be developed using a unique identifier assigned to each health professional to track health professionals from entry into health training institutions, through recruitment into public or private sector institutions, to transfer within the country or movement between public and private sector or emigration, to retirement or death.
- A national database will be launched to track the annual numbers graduating from all health training institutions.

3.4.7 Vital Statistics

Vital statistics are an important input for policy-making and planning of human development in the country. Information on the number of live births occurring over a time period, classified by various characteristics of the women giving birth, constitute the basis for analysis of the dynamics of reproduction. The operation and maintenance of a civil registration system requires the accurate and continuous registration of vital events pertaining to the population from birth to death, recorded at the time they occur on a continuous basis and under strict national standards.

Several more decades will likely pass before civil registration, including medical certification of the cause of death is likely to cover 90% or more of deaths in Sierra Leone. Under these circumstances, statistics from civil registration are not representative. However, estimates of vital statistics can be strengthened if civil registration and hospital mortality data are combined with data from a representative sample of demographic surveillance sites.

To address this situation, the following activities will be conducted:

- An in-depth assessment will be carried out of the civil registration system. This will lead to development of a plan of action for improving the coverage of civil registration, the attribution of cause of death and the analysis, dissemination and use of the resulting statistics.
- Staff at sub-national and national levels who are responsible for births and deaths registration will receive in-service training and supportive supervision.
- Physicians and clinical officers will receive training in classification of deaths based upon the system for International Classification of Diseases (ICD)
- At the central level, the process and the capacity for compilation and analysis of birth and death certificates and other information on vital events (hospital mortality data +/- data from a demographic surveillance site) will be strengthened with the addition of computers and high level health information specialists.

The first Demographic Surveillance Site (DSS) will be established in Sierra Leone by 2013. National estimates of age, sex and cause-specific mortality rates will then be derived from synthesis of data from multiple sources of incomplete or non-representative data: hospital mortality, civil registration +/- demographic surveillance.

3.4.8 Maternal Death Reviews and Response

There is a system of maternal death reviews/audits that works well (facility, community). This system has been developed but implementation is just beginning. Hospital investigations are taking place but there have been only a few investigations in communities. Hospital reporting of with accurate cause of maternal deaths is nearly complete. However, the maternal death review and response system is not regularly reviewed and the results are not always used for advocacy and community mobilization. The system as a whole is not yet well established.

3.4.9 Research

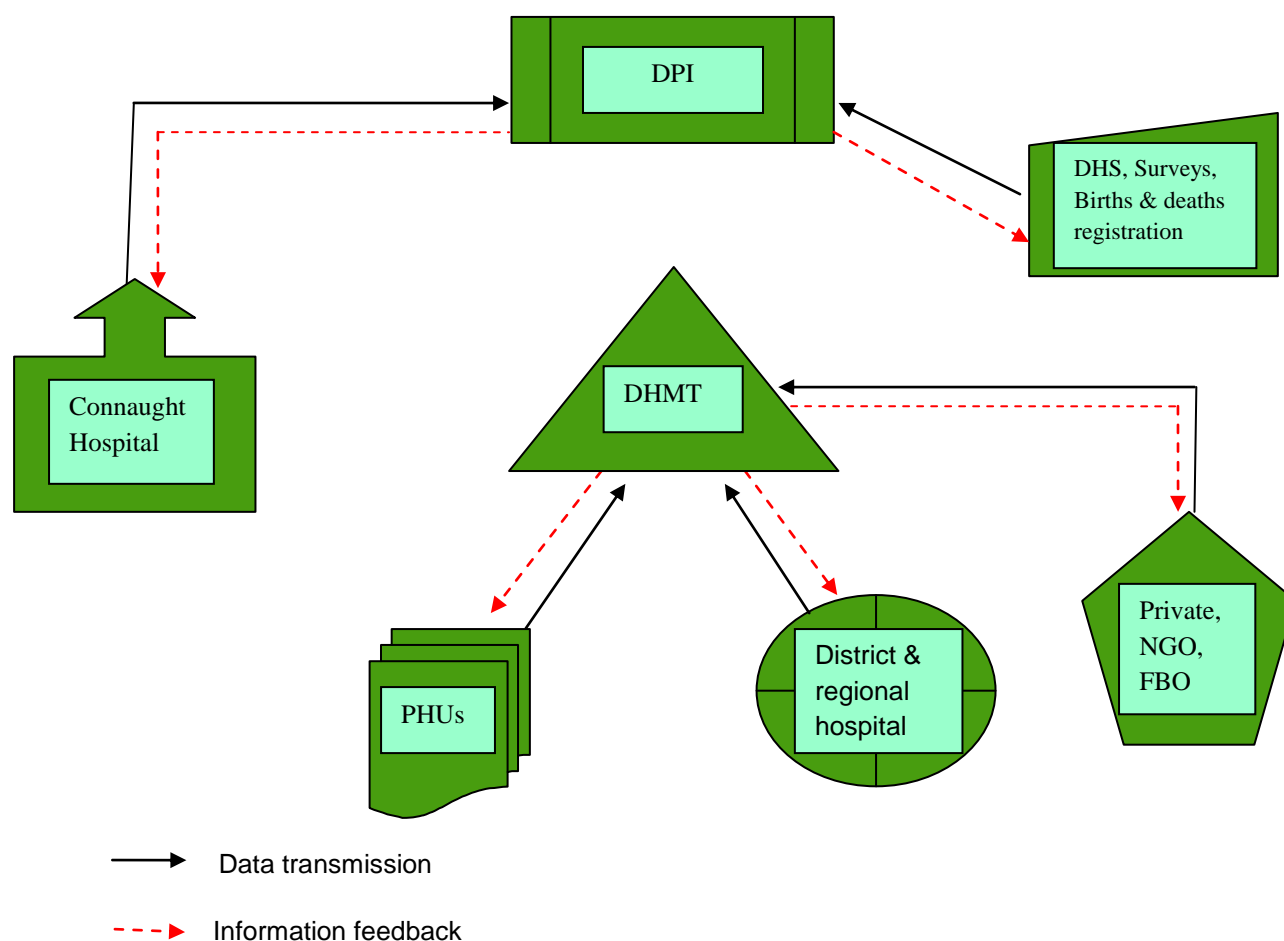
Various types of research will be supported over the course of the NHSSP. The Directorate of Post Graduate Training, Research and Non Communicable Diseases will develop a Health Research Strategic Plan. This will guide research to fill knowledge gaps in the provision of health facilities in Sierra Leone. Research results will be used to improve programming and service delivery.

3.5 Data Management, Storage, Feedback and ICT

3.5.1 Data management

Routine data is collected in the public sector through a network of some 1,080 Peripheral Health Units (PHUs), and 25 hospitals that are distributed throughout the country across 13 districts. The PHUs and hospitals gather data from client/patient registration forms, using tally sheets. These are collated onto paper based integrated reporting forms which are sent to the district office. Data from the community is included in the PHU's reporting forms. DHMT capture this data into an electronic District Health Information System (DHIS) and the electronic data is forwarded to the Directorate of Planning and Information in the MoHS. The electronic DHIS database also allows integration of Open MRS software that will permit development of a Hospital Information System. This electronic medical recording process has started with data for anti-retroviral patients being recorded at the nation's teaching hospital and will be scaled up to all hospitals as a second step. The DHIS database will progressively be extended to capture data from other sources such as specific surveys, civil registration (births and deaths), research, supervision, private sector, civil society, resources and administrative records to give a broad picture of the country. Data and reports on key indicators and reports of National reviews will be stored in a National data repository/observatory.

Figure 2: Data Flow in the health sector



The Results & Accountability Framework will generate information that will enable both implementation and results monitoring. Figure 2 is the schematic presentation of the data flow in the health sector. The final repository of health information is the Directorate of Planning and Information in the Ministry of Health and Sanitation. In the short term, partners in the health sector will keep track on a periodic basis using a set of Key Performance Indicators (KPI) that have been agreed on.

3.5.2 Data storage

Data is received and stored at all levels:

- At PHU level, monthly paper based data reports are stored locally in files
- At district level, data is captured into a district database application using the DHIS 2.0 and stored in the district's Integrated Data Warehouse (IDW).
- At central level, DPI electronically compiled raw data (pivot tables) received from the 13 districts is stored in the central Integrated Data Warehouse (IDW).

The DHIS database is capable of producing standardized reports, providing monthly feedback to each health facility and each district on its performance, thus giving an overall national health picture.

3.5.3 Reporting and Feedback

The success of reporting on Key Performance Indicators will depend on feedback between and amongst the various levels of service delivery in the health sector. Table 6 is indicative of feedbacks required within the sector.

Table 6: Reporting and Feedback processes for KPIs

Feedback process	Deadline	Responsible party
Facility monthly reports received by district M&E office	5th	Facility Head Nurse
District monthly data received by DPI	15th	DMO
Feedback report received by facility from District	30 th	M&E officer
Feedback report received by district from National	30th	DPI
District monthly data received by programs (EPI, RCH, Malaria, HIV, TB etc)	25 th	DPI
Feedback report from DPI/National to districts	30th	HMIS
Notifiable diseases and diseases under epidemic alert, reports received by DPC	weekly	M&E Officer

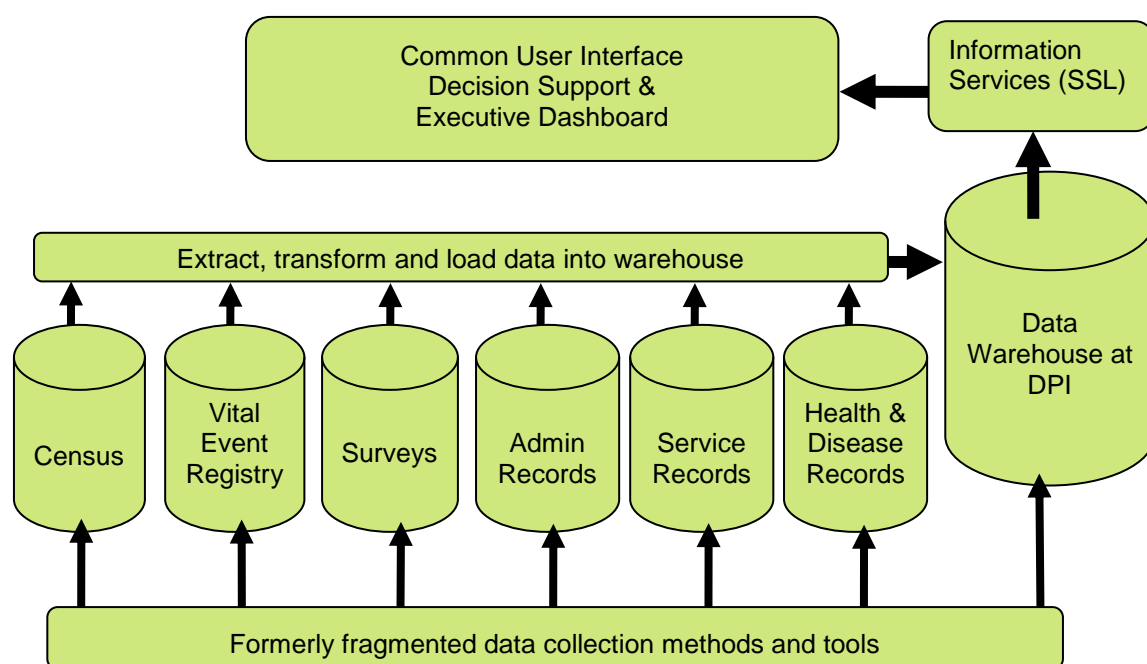
3.5.4 Information and communication technology (ICT)

Integration of health information is important for data from various programs at all levels to be managed as a whole in a well coordinated and transparent fashion.

Computers and internet communication facilities are already in use in most offices at national and district levels to permit rapid compilation and transmission of health data as well as automatic analysis and report generation. A fully integrated health data warehouse will be designed and installed at national and district levels. This will pull together data from all key health programmes and activities (routine services, surveillance, human resources, drug supply, maternal and child health services, HIV/AIDS control, tuberculosis control) and other data sources essential for health decision making (census, household surveys, vital statistics) and provide decision makers at all levels with user friendly reports and access to essential statistics.

The supply of paper forms, paper, pencils, and other office supplies (printer cartridges) will be budgeted for and ensured.

Figure 3: An integrated data warehouse



3.6 Analysis, synthesis and quality

3.6.1 Analysis and synthesis

Analysis of data will be done at various levels of the health sector. The products from the M&E system are shown in Table 7.

Data will be analysed and presented in the form of tables, charts and graphs. Data from routine HMIS will be disaggregated by district/local Councils and when required by chiefdom or facility. Data from surveys will further be disaggregated by sex, urban/rural and wealth quintiles. The main focus of analysis will be for:

- Tracking progress and trends (based on measurement of baselines and targets for core indicators (as in the progress and performance report)
- Equity analysis (main stratifiers: region, district, level of income, gender etc)
- Efficiency (value for resources)

3.6.2. Data quality

This could be expanded to provide more details on data quality assurance processes: this could include.

- Involvement of independent groups (national institutes, universities) for data quality ascertainment
- Processes for data quality assessment and adjustment including assessment of completeness of reporting, assessment of denominators,- comparison/analysis of results from facility

data and from population surveys data, and use of well documented methods for adjustment .

- An annual system of verification through annual facility surveys (combined with the service readiness surveys - as described above)
- Development of data quality report cards
- Sharing of data, reports, and methods in the public domain,
- training and supervision

3.7 Evaluation

Evaluation will be carried out periodically to assess the health status of Sierra Leoneans as a result of implementing the NHSSP. The major evaluations will be (i) Annual Programme Reviews; (ii) Mid Term Evaluation; (iii) End of Term Evaluations and (iv) Participatory Community Monitoring and Accountability Evaluations. Specific questions in these evaluations will focus on:

- Relevance of programme (s) objectives
- Relevance of strategies employed
- Effectiveness of the programmes
- Efficiency of implementation
- Sustainability of programme(s)
- Gender mainstream in programme(s) implementation
- Human rights approach to programme(s) implementation

3.8 Data Dissemination and Access

3.8.1 Analytical outputs

These products will report on; i) achievements/progress relative to planned targets, ii) assess development impact; and iii) performance of sector, districts and agencies. These will be shared with stakeholders to facilitate use during the course of planning and implementing their support to health care. Dissemination of M&E products will be as in Table 7 below.

Table 7: Dissemination of M&E Products

M&E Product	Reporting Frequency	Responsibility
√ National Quarterly Bulletin	Quarterly	Director, DPI
√ Baseline Data/End line – DHS – MICS – Census	Every 4 years Every 4 years Every 10 years	Director, DPI
√ Quarterly Report – Summary of completed outputs (target, achievement in the quarter and cumulative total from KPIs)	Quarterly	Principal M&E Officer, DPI
√ Annual Reports (Summary of completed outputs (target, achievement in the year and cumulative total from KPIs)	Annually	Principal M&E Officer, DPI
√ Supervision reports	Quarterly	Principal M&E Officer, DPI
√ Briefs	On demand	Principal M&E Officer, DPI
√ Evaluation Report	On Demand	Principal M&E Officer, DPI
√ Feedback meetings reports with stakeholders	After meetings	Principal M&E Officer, DPI
√ Performance of management bodies in the health sector	Half Yearly	Director, DPI
√ Beneficiary Report – satisfaction with services from community score cards	Yearly	Principal M&E Officer, DPI

In order to facilitate use of information for decision-making among the different stakeholders, a number of communication and feedback mechanisms will be instituted as part of the M&E system. Table 8 shows the stakeholders and the M&E products that they will require. M&E products will be disseminated as appropriate through:

- Email
- Post
- Courier
- Delivered by hand
- Presentations

Table 8: Health sector M&E lines of communication and feedback mechanisms

Stakeholder	M&E information requirements and Use	Communication and Feedback mechanism
District Councils	Performance of the district to assess progress, experiences, challenges and how they have been resolved	National Quarterly Bulletin, Quarterly and Annual Reports; Briefs, meetings
DHMTs	Performance of the project to assess progress, experiences, challenges and how they have been resolved	National Quarterly Bulletin, Quarterly and Annual Reports; Briefs, meetings
PHUs	Performance of the facilities/PHUs to assess progress, experiences, challenges and how they have been resolved	National Quarterly Bulletin, Quarterly and Annual Reports; Briefs, meetings
HSCC, HSSG	Compliance with the NHSSP, rules and regulations. Challenges impacting project implementation	National Quarterly Bulletin, Quarterly and Annual Reports; Briefs, meetings
MoHS	Contribution in progress towards MDG indicators 4, 5 and 6. Compliance with rules and regulations. Challenges impacting project implementation	National Quarterly Bulletin, Quarterly and Annual Reports; Briefs, meetings
Funding development partners	Compliance with NHSSP rules and regulations. Challenges impacting project implementation	National Quarterly Bulletin, Project supervision missions, Quarterly and Annual Reports; Briefs, meetings
Non funding development partners (e.g. NGOs, CBOs, FBOs)	Compliance with NHSSP, rules and regulations. Challenges impacting project implementation	National Quarterly Bulletin, Quarterly and Annual Reports; Briefs, meetings

The health sector with leadership from the DPI will actively seek to create knowledge products from experiences, lessons learned and best practices observed during project/programme implementation. This will position the health sector as a “*Learning*” sector.

3.8.2 Data Access

- At the district level, the integrated data warehouse will automatically generate user-friendly bulletins, other reports and maps to feedback to health facilities and inform DHMTs and local councils. These will show comparisons between facilities and districts through indicators on coverage and efficiency (e.g. outpatient attendances per health professional).
- Multiple agencies, partners and other information consumers (researchers, the media, civil society organizations) will have web-based access to statistics via the portal of the integrated warehouse

- Government health services statistics and surveys and census data collected by public agencies will, in principle, be regarded as being in the public domain once the data has been rendered anonymous. Public access to this data should be guaranteed by law.

Chapter 4

Country Mechanisms for Review and Action

4.1 Review

As Partners are increasingly showing commitments to the health sector, regular annual multi-stakeholder review meetings will be conducted, as scheduled below. The reviews will be informed by a good synthesis of the available monitoring data. The results of the review meetings will be used extensively in the planning process.

The national reviews will have a strong sub-national focus which is well informed by data. Programme specific reviews (e.g MNCH reviews) will also be aligned with, and the results/decisions fed into the annual sector review.

The National Annual review will culminate in an Annual Health Summit to which all stakeholders will be invited to discuss progress and agree on the way forward. The Summit will consist of Local Council representatives, District Health Management Teams, selected facility representatives, representatives of Parliament, NGOs, CSOs, the private sector, donor partners and other stakeholders. The summit will involve other key inter-sectoral ministries and partners in health, including ministries the of Education, Science and Technology; Finance and Economic development; Local Government; Gender and Children's Affairs; Youth and Sports; Agriculture, Forestry and Food Security; Defence (ONS); and Information. The Government will coordinate and chair the Summit.

In order to provide information to guide strategic direction, data from the HMIS will be used to assess coverage. Surveys and assessment will be conducted to ascertain service availability and readiness. This, together with other administrative data, will form the basis of a draft sector performance report for the previous year that is expected to be completed by the end of May each year.

The Health Sector Steering Committee will review the sector performance review report and validate the initial findings through deliberation and field assessment during June. The Health Sector Steering Committee field assessment findings report and sector performance report will form the basis of the Health Sector Review Summit deliberations.

Table 9. Timelines for Reviews

Milestone	Timeframe
Sector performance report	May
Joint review mission by Health Sector Steering Committee	June
Health Sector Review Summit	July
District Reviews	March, June, September, December
Programme Reviews	March, June, September, December

4.1.1 Reviews

Quarterly and Annual reviews will assess progress of various health interventions guided by the NHSSP towards achieving the objectives of the NHSSP. The major assessments during reviews will be to find out whether the inputs are sufficient and whether the outputs are performing sufficiently to achieve the desired outcomes and impacts.

The Health Sector Strategic Plan sets the targets for several years into the future. Annual Operations Plans will identify annual targets, based on past performance and availability of resources. Addressing every issue/service area for improvement in the Annual Operations Plan may not be possible every year. Therefore, the performance review based on health information will identify the priority areas using criteria such as seriousness of the problem, community concern, feasibility, etc in a transparent way, involving all stakeholders, led by the HSCC. The Directorate of Planning and Information (DPI) will take the lead in organising Annual Reviews. These reviews will be held in the first quarter of each year and there will be an Annual Review Report as the key output of the review. This report will detail results to date, challenges, Lessons learned, best practices and recommendations. The findings of the annual review will feed into Comprehensive District Plans for the following year.

4.1.2 Mid Term Evaluation

This will be conducted mid way through the implementation of the NHSSP in July 2012. The Mid Term Evaluation (MTE) will be used to inform mid-implementation adjustments to improve programming and delivery in the remaining half of the NHSSP. The MTE will assess programme performance and management capacities at central and district level and amongst major partners. The MTE will be undertaken by external consultants.

4.1.3 Final/End of Term Evaluation

This will be done at the end of 2015 to assess the impacts generated by programmes implemented through guidance by the NHSSP. This assessment will compare the health situation in Sierra Leone before and after the implementation of the NHSSP 2010-2015. Independent consultants will undertake the evaluation.

4.2 Decision making processes for remedial action and financial disbursement

The Ministry of Finance, Donors, HSSG Members as well as the Local Council representatives will be part of the review process. They will be encouraged to translate results/evidence from the review meetings into action by making necessary resource allocation decisions. In addition, there will be a planning meeting in November of each year to ensure that the agreed actions from the Annual summit are factored into the annual plan for the following year.

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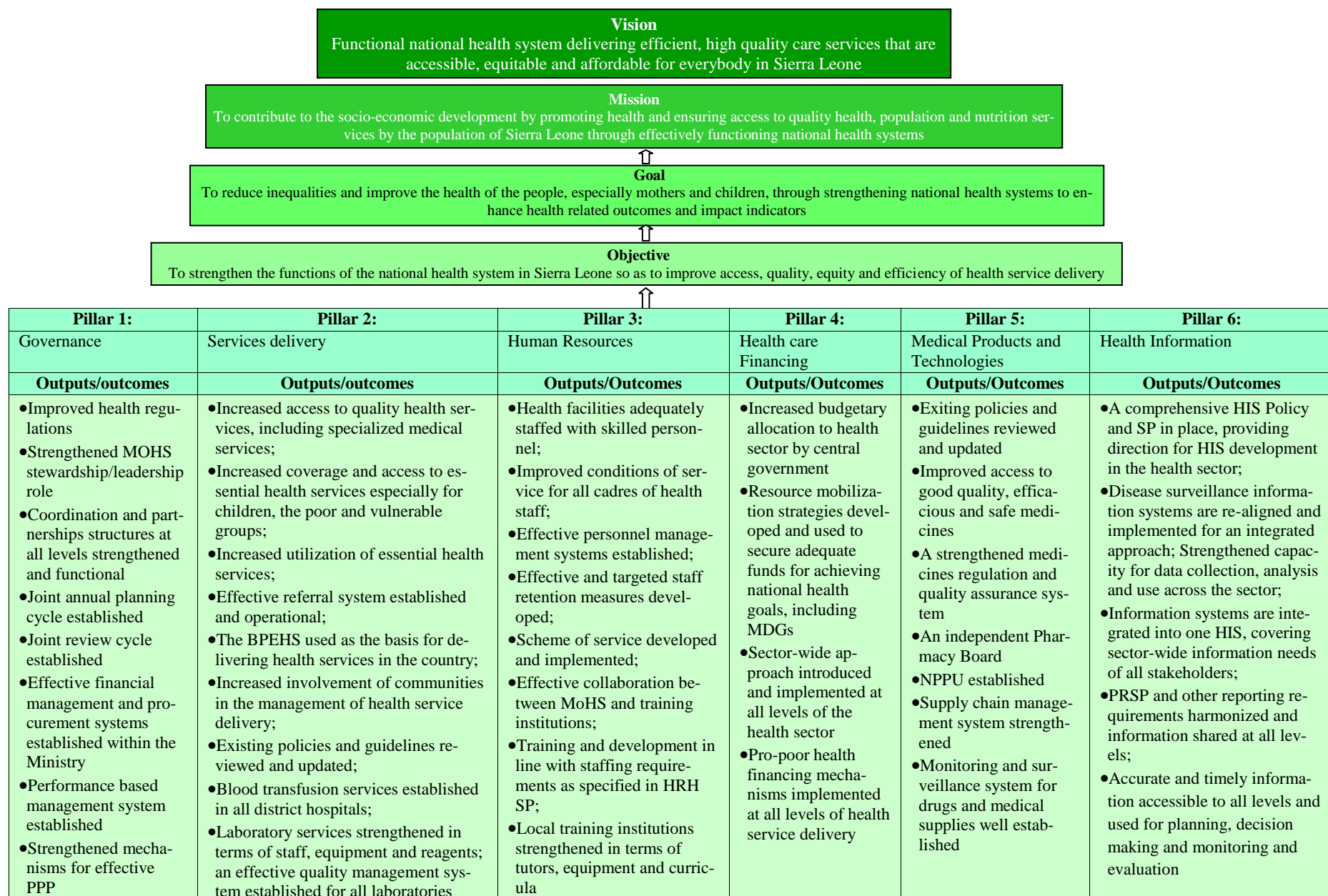
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Annex 1 - Monitoring and Evaluation Logical Framework



Pillar 1: Objectives	Pillar 2: Objectives	Pillar 3: Objectives	Pillar 4: Objectives	Pillar 5: Objectives	Pillar 6: Objectives
<ul style="list-style-type: none"> • To review the legal framework and provide the necessary capacities for implementation; • To strengthen capacities of senior health managers at national and district levels; • To establish a RBM system for management contracting, performance reviews, staff evaluation and system's improvement initiatives • To provide a viable oversight, sector planning, monitoring and supervision system from national to district levels • To establish dynamic interactions between health care providers and consumers with the view to improving the quality, accountability and responsiveness of services by 2013 • To strengthen coordination, collaboration, alignment and harmonization with development partners, implementing agencies and MDAs • To develop a sector-wide coordination mechanism for ensuring that all funding for the sector supports a single policy and expenditure programme, under government leadership and adopting common approaches across the sector 	<ul style="list-style-type: none"> • To increase the utilization of health services especially for children, the poor and other vulnerable groups from 0.5 contacts per person per year to at least 3 contacts per person per year by 2015; • To improve quality of service; • To strengthen management capacities of district health services; • To strengthen the delivery of quality specialized, advanced and emergency care in secondary and tertiary health facilities; • To strengthen community based health services; • To develop a comprehensive national health laboratory services policy; • To build HR capacities in laboratory services delivery at national, district and peripheral levels; • To establish a sustainable laboratory supplies system as part of the essential medicines and health supplies management which will ensure steady availability of laboratory equipment, reagents and supplies at all levels; • To establish an effective management structure in the MoHS to provide stewardship, coordination and management of laboratory services; • To expand the blood transfusion infrastructure to operate adequately within a decentralized health care delivery system; • To increase the annual blood collection necessary to meet the blood requirements of all patients in the hospitals throughout the country; • To test all blood for TTIs and operate an effective, nation-wide Quality Assurance programme that ensures security of the entire blood transfusion process; • To ensure continuous education and training in blood safety; • To generate information and build a database on the status of medical equipment in the health facilities; • To procure, install and utilize appropriate medical and diagnostic equipment within the health facility 	<ul style="list-style-type: none"> • Provide and maintain a policy and strategic framework to guide HR development and management • Strengthen institutional capacity for HR policy, planning and management • Enhance capacity and relevance for training of health workers, in partnership with other stakeholders • Upgrade and enhance competencies and performance of health workers • Promote research into HRH interventions to provide evidence based information for the improvement of service delivery 	<ul style="list-style-type: none"> • To secure adequate level of funding needed to achieve national health development goals including the MDGs • To ensure equitable access to quality health services free from financial catastrophe and impoverishment • To ensure adequate, equitable and efficient allocation and use of health sector resources 	<ul style="list-style-type: none"> • To review existing policies and develop new policies and guidelines with respect to medicines, medical supplies and equipment, vaccines, health technologies and logistics • To improve access to good quality, efficacious, safe and affordable medicines, medical supplies and equipment, vaccines and health technologies • To strengthen the medicines regulation and quality assurance system • To promote rational and cost effective use of medicines, medical devices, biological and other medical supplies at all levels of the health care delivery system 	<ul style="list-style-type: none"> • To provide a policy framework for establishing a functional HIS • To strengthen institutional framework for implementing a functional HIS • To improve routine data collection quality, management, dissemination and use • To strengthen monitoring and evaluation, research and knowledge management capacity in the health sector

Monitoring, Evaluation, Research and Knowledge Management Framework

Level of monitoring	Area of monitoring	Key questions	Key Indicators	Frequency of assessment
IMPACT Attaining the Goal of reducing inequalities and improve the health of the people, especially mothers and children, through strengthening national health systems to enhance health related outcomes and impact indicators	Morbidity, mortality, socio-economic well-being	Is the majority of the population and in particular the poorest of people, women and children in better health and well-being as a result of the NHSSP	IMR	Each 2.5 yrs
			U5MR MMR TFR	Each 2.5 yrs
OUTCOMES: To strengthen the functions of the national health system in Sierra Leone so as to improve access, quality, equity and efficiency of health service delivery	People on treatments and care, people benefiting from preventive interventions, etc.	Is there increased utilization and effectiveness of services, especially by the poorest of people, women and children?	CPR	Each 2.5 yrs
		Is there increased availability of quality services, particularly to the poorest of people, women and children?	Prevalence of underweight among children 6-59 months	Each 2.5 yrs
			% of population with access to safe drinking water	
			Exclusive breastfeeding for 6 months	Each 2.5 yrs
	Changed behaviour	Are increased numbers or proportion of target population (especially the poorest of people, women and children) adopting behaviours, which reduce their vulnerability to infection, morbidity, and/or mortality?	% of under fives with diarrhoea in the last 2 weeks who received ORT	Monthly/2.5 yrs

Level of monitoring	Area of monitoring	Key questions	Key Indicators	Frequency of assessment
			% of under fives with fever in the last 2 weeks who received appropriate anti-malarial treatment within 24 hours from onset of fever % of under fives with fast breathing in the last 2 weeks who were treated by a health professional Percentage of pregnant women making at least 2 antenatal visits Percentage of deliveries attended by a skilled birth attendant Percentage of children under five years of age who slept the previous night under an insecticide treated net Percentage of pregnant women making at least 4 antenatal visits	
OUTPUTS: From different Programme Areas of NHSSP such as services, numbers reached	Service delivery, technologies	Are health services accessible in the majority of districts and in particular to the very poor, women and children?	% population residing within 5 km of a health facility	Each 2 yrs
		Are routine operations at service delivery level including for women and children adequately carried out?	% of population living within 5 km of facility offering comprehensive essential obstetric services	Each 2 yrs
		Is the supply chain including for RH & IMCI service delivery functioning adequately?	Percentage of children receiving Penta-3 before 12 months of age	Each 2 yrs
		Are drugs (including for mothers and children) consistently available to consumers at right time and place?	Percentage of smear-positive pulmonary tuberculosis cases treated successfully	Each 2 yrs
		Have standard treatment guidelines and utilization manuals (including for RH & IMCI services) been developed and produced?	Percentage of people with advanced HIV infection receiving anti-retroviral combination therapy	Each 2 yrs

Level of monitoring	Area of monitoring	Key questions	Key Indicators	Frequency of assessment
			% of births delivered by caesarean section	Each 2 yrs
			No/Percentage of infants with fever in the last 2 weeks given an approved anti-malarial within 24 hours of onset of fever	Annually
			No/Percentage of pregnant women receiving at least 2 doses of TT	Annually
			No/Percentage of children with diarrhoea in last 2 weeks treated with ORS (at time of measles immunisation)	Annually
			No/Percentage of HIV-infected pregnant women receiving a complete course of antiretroviral prophylaxis for PMTCT	
			No/Percentage of children receiving Penta-3 before 12 months of age	
			No/Percentage of smear-positive pulmonary tuberculosis cases detected	
			No/Percentage of infants who slept the previous night under an ITN	
			Percentage of pregnant women receiving at least two doses of intermittent presumptive treatment (IPT) for malaria.	
			No/Percentage of smear-positive pulmonary tuberculosis cases treated successfully	
			No/Percentage of people with advanced HIV infection receiving anti-retroviral combination therapy	
			Children fully immunized before 12 months of age	

Level of monitoring	Area of monitoring	Key questions	Key Indicators	Frequency of assessment
			HIV-infected pregnant women receiving a complete course of anti-retroviral prophylaxis for PMTCT	
			Pregnant women receiving second intermittent presumptive treatment for malaria	
			Pregnant women receiving at least two doses of TT during a pregnancy	
			Pregnant women making second antenatal visit	
			People with advanced HIV infection receiving antiretroviral combination therapy	
			Health professionals trained in IMCI standard course and followed up	
			Health professionals trained in emergency obstetric care (EOC) standard course	
			Health professionals trained in PMTCT standard course	
INPUTS (policies, strategies, guidelines, coordination and financing)	Governance	Are services of greatest potential benefit to the poorest of people, women and children being targeted?	Existence of an up to date national health strategy linked to national needs and priorities	One time by annual review
			Existence of an essential medicine list updated within the last five years and disseminated annually	
	Human Resources	Are human resources for service delivery and supervision (especially for RH & IMCI services) recruited, adequately motivated, trained and deployed?	Key health professionals by cadre per 10,000 population	Annually & Quarterly
		Are staffing norms including for RH & IMCI service delivery obtained at all health facilities		Quarterly

Level of monitoring	Area of monitoring	Key questions	Key Indicators	Frequency of assessment
	Health Financing	Is the entire health sector, including health centres and community care funded adequately?	Total public health spending per capita	Annually
			Percentage of Government of Sierra Leone revenue budgeted/ disbursed to the health sector	
			The ratio of household out-of-pocket payments for health to total health expenditures	Annually
			General government health expenditure as a proportion of total government expenditure (GGHE/GGE)	
			Proportion of informal payments within the public	
			Proportion of government funds which reach district-level facilities	
	Medical Products and Technologies	Is essential medical equipment (including essential obstetric and paediatric equipment) available at all health facilities?	% of health facilities without stock-outs of TT vaccine, Oxytocin, SP, ORS and cotrimoxazole for more than a week at a time	Quarterly
			% of PHUs reporting uninterrupted supply of tracer drugs	
	Health Information		% of monthly ICS reports submitted on time by PHUs to districts	
			% of Districts organising a review meeting each quarter	
			% of PHUs supervised at least once in the last three months using a nationally approved checklist	

Table 3.1 Key Performance Indicators (Outputs)

	Indicator	Data Source	Frequency		Responsible Entity	Person/
1	% of under fives with diarrhoea in the last 2 weeks who received ORT	ICS/ DHS & MICS	Monthly/ yearly	2.5	District M&E Officer	
2	Percentage of children under five years of age who slept the previous night under an insecticide treated net	ICS/ DHS & MICS	Monthly/ yearly	2.5	District M&E Officer	
3	% of under fives with fever in the last 2 weeks who received appropriate anti-malarial treatment within 24 hours from onset of fever	ICS/ DHS & MICS	Monthly/ yearly	2.5	District M&E Officer	
4	% of under fives with fast breathing in the last 2 weeks who were treated by a health professional	ICS/ DHS & MICS	Monthly/ yearly	2.5	District M&E Officer	
5	Percentage of pregnant women making at least 2 antenatal visits	ICS / DHS,MICS	Monthly / yearly	2.5	District M&E Officer	
6	Percentage of pregnant women receiving at least two doses of intermittent presumptive treatment (IPT) for malaria.	ICS,	Monthly / yearly	2.5	District M&E Officer	
7	Percentage of pregnant women receiving at least 2 doses of TT	ICS	Monthly / yearly	2.5	District M&E Officer	
8	Percentage of children with diarrhoea in last 2 weeks treated with ORS (at time of measles immunisation)	ICS	Monthly / yearly	2.5	District M&E Officer	
9	Percentage of HIV-infected pregnant women receiving a complete course of antiretroviral prophylaxis for PMTCT	ICS	Monthly / yearly	2.5	District M&E Officer	
10	Percentage of deliveries attended by a skilled birth attendant	ICS / DHS,MICS	Monthly / yearly	2.5	District M&E Officer	
11	Percentage of children receiving Penta-3 before 12 months of age	ICS / HHS	Monthly / yearly	2.5	District M&E Officer	
12	Percentage of smear-positive pulmonary tuberculosis cases treated successfully	TbIS	Yearly		District M&E Officer	
13	Percentage of people with advanced HIV infection receiving antiretroviral combination therapy	AIS	Yearly		District M&E Officer	
14	% of births delivered by caesarean section	HMRFO1 / HFS	Monthly / 2 yearly		District M&E Officer	

Table 3.2 Key Performance Indicators (Process)

No	Indicator	Data Source	Frequency	Responsible Person/Entity
1	No of monthly ICS reports submitted on time by PHUs to districts	ICS	Quarterly	M&E Officer/DPI
2	No of PHUs supervised at least once in the last three months using a nationally approved check-list	District reports	Quarterly	M&E Officer/DPI
3	Number of quarters during which the district held at least one review meeting in the last year?	District reports	Yearly	M&E Officer/DPI

Table 3.3 Key Performance Indicators (Inputs)

No	Indicator	Data Source	Frequency	Responsible Person/Entity
1	% of PHUs reporting uninterrupted supply of tracer drugs	ICS / HFS	Quarterly	District M&E Officer
2	Key health professionals by cadre per 1,000 population	District Reports	Annual	District M&E Officer

Indicator Matrix for NHSSP

Level	Indicator	Purpose	Data Source	Monitoring Frequency	Aggregation	Baseline 2008	Target 2010-11	Target (2011-12)	Target (2012-13)	Target (2013-14)	Target (2014-15)
To reduce inequalities and improve the health of the people, especially mothers and children, through strengthening national health systems to enhance health related outcomes and impact indicators	- IMR	Impact	DHS / MICS	Each 2.5 yrs	National	89/1000		70 /1,000	-	-	50/1000
	- IMR	Impact	DHS / MICS	Each 2.5 yrs	National	89/1000		70 /1,000	-	-	50/1000
	- IMR	Impact	DHS / MICS	Each 2.5 yrs	National	89/1000		70 /1,000	-	-	50/1000
	TFR	Impact	DHS/MICS	Each 2.5 yrs	National	5.1		4.5	-	-	4
	-% of children that are under-weight	Impact	DHS/MICS	Each 2.5 yrs	District/ National	21.10%	17%	15%	13%	11%	10%
		HIV prevalence among population aged 15-49 years	Impact	DHS/ Surveillance	Each 2.5 yrs	District/ National	1.5				
Pillar I: Governance	% of partners who sign up to Sierra Leone Country Health Compact	Output	Annual Review Report	Annually	National	Dec 2011 - first signing					90%
	% of jointly agreed and approved Central & LC AoP	Output	Annual Review Report	Annually	National	First in 2011		100%	100%	100%	100%
	% of jointly reviewed & approved National & LC performance reports	Output	Annual Review Report	Annually	National	First in 2011		100%	100%	100%	100%
	Number of parallel project implementation units	Output	Annual Review Report	Annually	National	2012 mapping result			reduced by one-third	Reduced by half	Reduced by two-third

Level	Indicator	Purpose	Data Source	Monitoring Frequency	Aggregation	Baseline 2008	Target 2010-11	Target (2011-12)	Target (2012-13)	Target (2013-14)	Target (2014-15)
Pillar II: Service delivery	CPR (modern methods)	Outcome	DHS/MICS	Each 2.5 yrs	National	8%		12%			30%
	Percentage of pregnant women making at least 4 antenatal visits	Outcome	DHS/MICS	Each 2.5 yrs	National	74.30%	80%	85%	85%	90%	90%
	Percentage of pregnant women receiving at least two doses of intermittent presumptive treatment (IPT) for malaria.	Outcome	DHS/MICS	Each 2.5 yrs	National	16.80%	40%	50%	60%	70%	80%
	Pregnant women receiving the at least two doses of TT during a pregnancy	Outcome	DHS/MICS	Each 2.5 yrs	National	74.50%	80%	85%	90%	92%	95%
	Percentage of HIV-infected pregnant women receiving a complete course of antiretroviral prophylaxis for PMTCT	Outcome	HIV HMIS	Annually	National	15.50%	18%	22%	22%	25%	25%
	Percentage of births attended by a skilled health personnel	Outcome	DHS/MICS	Each 2.5 yrs	National	42%	50%	55%	60%	70%	75%
	Caesarean sections as a proportion of all births	Outcome	HMIS	Each 2.5 yrs	National	0.01%	0.50%	1%	1.50%	2%	3.00%
	Percentage of lactating women and newborns received PNC within 2 days after delivery	DHS/MICS	HMIS	Each 2.5 yrs	National	58%	65%	70%	75%	75%	80%

Level	Indicator	Purpose	Data Source	Monitoring Frequency	Aggregation	Baseline 2008	Target 2010-11	Target (2011-12)	Target (2012-13)	Target (2013-14)	Target (2014-15)
Pillar II: Service delivery (cont.)	Proportion of exclusive breast-feeding 0-6 months	Output	DHS/MICS	Each 2.5 yrs	National	11%	20%		30%		40%
	Percentage of children receiving Penta-3 before 12 months of age	Outcome	DHS/MICS	Each 2.5 yrs	National	54.60%	65%	70%	80%	85%	90%
	Percentage of 1 year-old children immunized against measles	Outcome	DHS/MICS	Each 2.5 yrs	National		40%	50%	60%	70%	80%
	Percentage of 1 year-old children fully immunized	Outcome	DHS/MICS	Each 2.5 yrs	National	30.50%	40%	50%	60%	70%	80%
	% of U5 with diarrhoea in the last 2 weeks who received ORT and Zinc	Outcome	DHS/MICS	Each 2.5 yrs	National	73%	80%	85%	90%	95%	95%
	% of under fives with fast breathing in the last 2 weeks who were treated by a health professional	Outcome	DHS/MICS	Each 2.5 yrs	National	45.80%	50%	60%	70%	80%	90%
	Percentage of children under five years of age who slept the previous night under an insecticide treated net	Outcome	DHS/MICS	Each 2.5 yrs	National	26%	40%	45%	50%	55%	60%
	% of children U5 with fever in the last 2 weeks who are treated with appropriate anti-malarial drugs within 24 hours from onset of fever	Outcome	DHS/MICS	Each 2.5 yrs	National	15%	20%	30%	40%	50%	60%

Level	Indicator	Purpose	Data Source	Monitoring Frequency	Aggregation	Baseline 2008	Target 2010-11	Target (2011-12)	Target (2012-13)	Target (2013-14)	Target (2014-15)
Pillar II: Service delivery (cont.)	% of confirmed uncomplicated malaria cases in patients U5s treated with ACT within 24 hrs at the health facility	Outcome	DHS/MICS	Annually	National	N/A	30%	50%	60%	70%	80%
	Percentage of smear-positive pulmonary tuberculosis cases detected	Outcome	TBHMIS	Each 2.5 yrs	National	28%	32%		36%	40%	40%
	Percentage of smear-positive pulmonary tuberculosis cases treated successfully	Outcome	TBHMIS	Each 2.5 yrs	National	78%	80%		83%	85%	85%
	No of people with advanced HIV infection receiving anti-retroviral combination therapy	Outcome	HIV HMIS	Annually	National	2585	4222	4830	5441	6052	6700
	Bed Occupancy Rate	Output	HMIS	Annually	National						70%
	Average Length of Stay	Output	HMIS	Annually	National						5 days
	Availability of emergency obstetric care: basic and comprehensive care facilities	Output	HFS	Annually	National						100%
	Contacts per person per year	Output	DHS/MICS	Annually	National	0.5	1	1.5	2.0	2.5	3
	% population residing within 5 km of a health facility	Output	HFS	Annually	National	73%	80%	82%	85%	87%	90%

Level	Indicator	Purpose	Data Source	Monitoring Frequency	Aggregation	Baseline 2008	Target 2010-11	Target (2011-12)	Target (2012-13)	Target (2013-14)	Target (2014-15)
Pillar II: Service delivery (cont.)	% of population with access to safe drinking water	Output	DHS/MICS	Annually	National	50.30%	60%	65%	70%	80%	90%
	% of households with access to improved sanitation	Outcome	Survey	Each 2 years	National	13%		30%			50%
Pillar III: Human Resources for Health	-# students graduating from health training institutions (category-wise)	Input	HR RHIS	Annually	National						
	Doctor/ population and Nurse/ population ratios	Input	HRH M&E database	Annually	National	Doctors = 0.02 /1,000, nurses = 0.18 /1,000; Midwives = 0.02 /1,000	Doctors = 0.03 /1,000, nurses = 0.35 /1,000; Midwives = 0.035 /1,000		Doctors = 0.04 /1,000, nurses = 0.4 /1,000; Midwives = 0.045 /1,000		Doctors = 0.05 /1,000, nurses = 0.5 /1,000; Midwives = 0.1 /1,000
Pillar IV: Health Care Financing	Total public health spending per capita	Input	NHA survey	Each 2 years	National	\$ 12.2	\$ 16.5	\$ 20.9	\$25.3	\$ 29.6	\$ 34.0
	General government health expenditure as a proportion of total government expenditure (GGHE/ GGE)	Input	GOSL Finance record	Annually	National	8%	10%	12%	13%	14%	15%
	% of health sector aid provided through multi-year commitments	Input	Annual Review Report	Annually	National						90%
	% of health sector aid disbursement released according to agreed schedule in annual or multi-year framework	Input	Annual Review Report	Annually	National						66%

Level	Indicator	Purpose	Data Source	Monitoring Frequency	Aggregation	Baseline 2008	Target 2010-11	Target (2011-12)	Target (2012-13)	Target (2013-14)	Target (2014-15)
	% of health sector aid that uses public financial management systems	Input	Annual Review Report	Annually	National						50%
	Total Health Expenditure	Input	NHA survey	Each 2 years	National	Le266.5 bn	Le376bn	Le484 bn	Le597 bn	Le715 bn	Le836 bn
Pillar V: Medical Products and technologies	% of PHUs reporting uninterrupted supply of tracer drugs	Input	HMIS	Annually	National	39%	50%	60%	70%	80%	90%
	Essential medicine list update within the last five years and disseminated periodically	Output	Annual Review Report	Two years	National	2005	revised			Revised	
Pillar VI: Health Information	% of monthly reports submitted on time by PHUs to districts	Process	HMIS	Annually	National	61%	70%	80%	90%	95%	98%
	No. and % of Districts organising a review meeting each quarter	Process	HMIS	Annually	National	2 (15.4%)	7 (53.8)	13 (100%)	13 (100%)	13 (100%)	13 (100%)
	% of PHUs supervised at least once in the last three months using a nationally approved checklist	Process	HMIS	Annually	National	30%	60%	70%	80%	90%	90%
	Data quality	Process	HMIS	Annually	National			70%	80%	85%	90%

Annex 2 - Indicator Definitions / Meta Data

Indicator	Indicator Definition	Numerator/Denominator	Unit of measurement	Data Source	Data collection			Comments
					Approach/ Methods	Schedule / Frequency	Person/ Entity Responsible	
- IMR Infant Mortality Rate	The number of deaths to children under 12 months of age per 1,000 It is the probability of a child born in a specific year or period dying before reaching the age of 1, if subject to age-specific mortality rates of that period	Total number of deaths of children under 12 months in a specified period* 1000/Total number of expected U1 children in a specific period	Rate	DHS	Population based survey	4-5 years	SSL	
- U5MR Under five Mortality Rate	The number of deaths among children under 5 years of age per 1,000 It is the probability of a child born in a specific year or period dying before reaching the age of five, if subject to age-specific mortality rates of that period.	Total number of deaths of children under 5 years in a specified period *1000/Total number of expected U5 children in the specific period	Rate	DHS	Population based survey	4-5 years	SSL	
- MMR Maternal Mortality Ratio	Number of maternal deaths per 100,000 live births during a specified period usually 1 year	Number of maternal deaths in a specified period *100,000/Total number of live births in a specified period	Ratio	DHS	Population based survey	4-5 years	SSL	
TFR Total Fertility Rate	The Total fertility rate represents the average number of children that would be born to a woman if she were to live to the end of her childbearing years and bear children in accordance of current age specific fertility rate.	Numerator: annual births to women at a given age Denominator: population of women of the same age.	Children per woman	DHS, MICS	DHS/ MICS	5 Years	SSL	
-% of children that are under-weight	Proportion of under5 children that fall below minus two standard deviations from the median weight-for-age of the WHO Child Growth Standards	Number of under5 children that fall below minus two standard deviations from the median weight-for-age of the WHO Child Growth Standards / Total number of U5 children that were measured	Ratio	DHS HMIS	Survey Health statistics	4-5 years (DHS) Monthly-annually (HMIS)	SSL DPI	
% of partners who sign up to Sierra Leone Country Health Compact	Proportion of health partners signatories to the country Compact	No of partners who sign up to the Sierra Leone Country Health COMPACT / total number of health partners expected to sign the COMPACT	Ratio	Report	National Health Report	Yearly	SSL DPI	

Indicator	Indicator Definition	Numerator/Denominator	Unit of measurement	Data Source	Data collection			Comments
					Approach/Methods	Schedule / Frequency	Person/Entity Responsible	
% of jointly agreed and approved Central & LC AoP	Proportion of plans jointly developed and agreed at central and local council levels	Number of plans jointly developed and agreed/ Total central and LC plans	Ratio	Report	National Health Report	Yearly	SSL DPI	
% of jointly reviewed & approved National & LC performance reports	Proportion of performance reports jointly prepared and agreed at central and local council levels	Number of performance reports jointly prepared and agreed / Total central and LC performance reports	Ratio	Report	National Health Report	Yearly	SSL DPI	
-CPR (modern methods) Contraceptive Prevalence Rate	Proportion of women accessing contraceptives	Total number of women accessing contraceptives in a specific period/ Total number of women in the reproductive age group 15-49 in the specific period & area	Percent	DHS MICS HMIS	Population survey Health statistics	2-5 years (Survey) Monthly-annually (HMIS)	SSL DPI	
Exclusive breastfeeding under 6 months	Proportion of infants 0-5 months of age who are fed exclusively with breast milk	Number of infants 0-5 months of age who are fed exclusively with breast milk in a given period/Total infants 0-5 months included in the survey in a given period	Percent	DHS MICS HMIS	Population survey Health statistics	2 -5 years (Survey) monthly-annually (HMIS)	SSL DPI	
% of population with access to safe drinking water	The proportion of households using an improved water source as their main source of drinking water.	The number of households using a safe water source as their main source of drinking water divided by the total number of households included in the survey or all households in the catchment area.	Ratio	DHS	Household survey	4-5 years	SSL	
% of U5 with diarrhoea in the last 2 weeks who received ORT	Proportion of U5 children who had diarrhoea and received oral rehydration therapy	Number of U5 children who had diarrhoea and received oral rehydration therapy/Total number of children who had diarrhoea in the last two weeks that were included in the survey	Percent	DHS MICS HMIS	Population survey Health statistics	2 -5 Years (Survey) Monthly-Annually (HMIS)	SSL DPI	

Indicator	Indicator Definition	Numerator/Denominator	Unit of measurement	Data Source	Data collection			Comments
					Approach/Methods	Schedule / Frequency	Person/Entity Responsible	
% of U5 with fever in the last 2 weeks who received appropriate anti-malarial treatment within 24 hours from onset of fever	Proportion of U5 who had fever and fever at any time in the last two weeks and were treated with appropriated anti malaria drugs on the same day or next day	Number of U5 children who had fever at any time in the last two weeks treated with appropriated anti malarial on the same day or next day/Total number of U5s who had fever at any time in the last two weeks that were included in the survey	Percent	MICS HMIS	Survey Health statistics	2 Years (Survey) Monthly & Annually (HMIS)	SSL DPI	
% of U5 with fast breathing in the last 2 weeks who were treated by a health professional	Proportion of U5 children with fast breathing (ARI) in the last two weeks who were treated by health professional	Number of U5 children with fast breathing in the last two weeks who were treated by health professional /Total number of children with fast breathing that were included in the survey	Percent	DHS MICS HMIS	Survey statistics	2-5 Years (Survey) Monthly Annual (HMIS)	SSL DPI	
Percentage of pregnant women making at least 4 antenatal visits	Proportion of pregnant women attended, at least 4 ante natal visits during the current pregnancy.	Number of pregnant women in a catchment area at a particular time period who attended at least 4 ANC visits during their pregnancy/Total expected number of pregnant women in a catchment area at a particular time period	Percent	HMIS	Health statistics	Monthly Annual	DPI	
Percentage of deliveries attended by a skilled birth attendant	Proportion of deliveries at health facilities attended by skilled birth attendance	Number of deliveries at health facilities attended by skilled birth attendance /Total number of expected deliveries in the catchment area	Percent	DHS MICS	Health survey	2-4 years	SSL	
Percentage of children under five years of age who slept the previous night under an insecticide treated net	Proportion of children under 5 who slept under an ITN the previous night	Number of U5 children who slept under an ITN the previous night/ Total number of children under 5 that were included in the survey	Percent	DHS MICS HMIS	Population based survey Health statistics	2-5 years (Survey) Monthly annually (HMIS)	SSL DPI	

Indicator	Indicator Definition	Numerator/ Denominator	Unit of measurement	Data Source	Data collection			Comments
					Approach/ Methods	Schedule / Frequency	Person/ Entity Responsible	
% population residing within 5 km of a health facility	Proportion of population residing within walking distance of 5 km from a health facility	Population living within walking distance of 5 km from a health facility /Total number of population of the catchment area	Percent	DHS	Population based survey	4-5 years	SSL	
% of population living within 5 km of facility offering comprehensive essential obstetric services	Proportion of population living within walking distance of 5 km from a health facility offering comprehensive essential obstetric services	Population living within walking distance of 5 km from a health facility offering comprehensive essential obstetric services /Total number of population of the catchment area	Percent	DHS	Population based survey	4-5 years	SSL	
Percentage of children receiving Penta-3 before 12 months of age	The proportion of children who received Penta 3 vaccine before they are 12 months of age	Number of under 1 children administered Penta 3 vaccine over total number of under 1 children in the catchment area	Percent	HMIS	Health statistics	Monthly / Annual	SSL/DPI	
Percentage of 1 year-old children immunized against measles	The proportion of children who received Measles vaccine before they are 12 months of age	Number of under 1 children administered Measles vaccine over total number of under 1 children in the catchment area	Percent	HMIS	Health statistics	Monthly / Annual	SSL/DPI	
Percentage of 1 year-old children fully immunized	The proportion of children who received all doses of vaccine before they are 12 months of age	Number of under 1 children administered all doses of vaccine over total number of under 1 children in the catchment area	Percent	HMIS	Health statistics	Monthly / Annual	SSL/DPI	
Percentage of smear-positive pulmonary tuberculosis cases treated successfully	percentage of new smear-positive TB cases registered in a specified period that were successfully treated	Number of new smear-positive TB cases registered in a specified period that were successfully treated Divided by total number of new smear-positive TB cases registered in a the same period in the catchment area	Percent	HMIS	Health statistics	Monthly / Annual	DPI/NTBLCP	
Percentage of people with advanced HIV infection receiving antiretroviral combination therapy	percentage of people with advanced HIV infection who received antiretroviral combination therapy	Number of people with advanced HIV infection who received antiretroviral combination therapy Divided by total number of people with advanced HIV infection in a the same period in the catchment area	Percent	HMIS	Health statistics	Monthly / Annual	DPI/HIVNCP	

Indicator	Indicator Definition	Numerator/Denominator	Unit of measurement	Data Source	Data collection			Comments
					Approach/Methods	Schedule / Frequency	Person/Entity Responsible	
% of births delivered by caesarean section	The proportion of births delivered by Caesarean sections among the total number of live births in given area.	The number of births delivered by Caesarean Sections done in a given period divided by the total number of live births during a given time period in a given area	Percent	HMIS	Health statistics	Monthly / Annual	DPI/RCH	
No/Percentage of pregnant women receiving at least 2 doses of TT	Number/ Percentage of pregnant women who received 2 doses of TT	Number of pregnant women who received 2 doses of TT/Total number of expected pregnant women in a catchment area at a particular time period	Percent	HMIS	Health statistics	Monthly/ Annual	DPI/SSL	
No/Percentage of HIV-infected pregnant women receiving a complete course of antiretroviral prophylaxis for PMTCT	Number/ Percentage of pregnant women HIV infected receiving a complete course of antiretroviral prophylaxis for PMTCT	Number of pregnant women HIV infected who received a complete course of antiretroviral prophylaxis for PMTCT/Total number of expected pregnant women HIV infected in a catchment area at a particular time period	Percent	HMIS	Health statistics	Monthly/ Annual	DPI/HIVNCP	
No/Percentage of smear-positive pulmonary tuberculosis cases detected	Number/percentage of new smear-positive TB cases detected in a specified period	Number of new smear-positive TB cases smear positive detected in a specified period Divided by total number of expected TB smear-positive new cases in a the same period in the catchment area	Percent	HMIS	Health statistics	Monthly / Annual	DPI/NTBLCP	
No/Percentage of infants who slept the previous night under an ITN	Number/Percentage of infants who slept under an ITN the previous night	Number of infants who slept under an ITN the previous night/Total number of children under 1 in the catchment area that were included in the survey	Number/ Percent	DHS MICS HMIS	Population survey, Health statistics	2-5 years (Survey) Monthly-annually (HMIS)	SSL/DPI	
Percentage of pregnant women receiving at least two doses of intermittent presumptive treatment (IPT) for malaria.	Percentage of pregnant women who received at least 2 doses of IPT	Number of pregnant women who received 2 doses of IPT/Total number of expected pregnant women in a catchment area at a particular time period	Percent	HMIS DHS MICS	Survey; Health statistics	2-5 years (Survey) Monthly-annually (HMIS)	SSL/DPI	
Children fully immunized before 12 months of age	<i>Full immunization coverage</i> is the proportion of infants who receive all doses of EPI antigens before their first birthday	number of infant who receive all doses before their first birthday divided by the total number of U1 infants in the catchment area during a given time period	Percent	HMIS	Health statistics	Monthly/ Annual	DPI/SSL	

Indicator	Indicator Definition	Numerator/Denominator	Unit of measurement	Data Source	Data collection			Comments
					Approach/Methods	Schedule / Frequency	Person/Entity Responsible	
-Doctor/ Nurse/ population ratios	Number of population that have access to Doctors or Nurses	Number of population in a catchment area/Total number of doctors or nurses serving the catchment area	ratio	HR data	Health statistics	Annual	DPI/HR	
Total public health spending per capita	Total public health spending per head. This indicator provides information on overall availability of funds.	<ul style="list-style-type: none"> • Numerator: The sum of all public health spending (ideally from National Health Accounts and Including all sources of funds – external, government, and non-government including household OOPs). • Denominator: Total population. 	Percent	DHS	Full survey of household spending	4-5 Years	DPI	
Percentage of Government of Sierra Leone revenue budgeted/ disbursed to the health sector	This indicates the budget disbursed to health as a proportion of total budget in the government's budget.	Budget allocated to health divided by the total budget in a given fiscal year and then multiplied by 100	Percent	DHS	Survey	4-5 years	DPI/MOFED	
The ratio of household out-of-pocket payments for health to total health expenditures	Percentage of households where direct out-of-pocket payments to providers for health during the past 12 months was more than 40% of their household income net of subsistence, or 10% of their total income.	<ul style="list-style-type: none"> • Numerator: Household out of pocket expenditure for health during the past 12 months. • Denominator: Household income. (As argued above, in most developing countries it is accepted that self-reported total health expenditure is a more reliable indicator of household purchasing power than self-reported income, so this should be used as the denominator in those settings) 	Percent	DHS	Household interview survey	5 years	SSL/DPI	
General government health expenditure as a proportion of total government expenditure (GGHE/GGE)	Level of general government expenditure on health (GGHE) expressed as a percentage of total government expenditure (Reflects government commitment to the Abuja Declaration of 2001 to ensure 15% goes to health).	Government expenditure on health Divided by total Government expenditure	Percent	MICS, DHS	Survey	2-5 years	DPI/MOFED	
Proportion of informal payments within the public	Proportion of informal or under-the-table payments made by patients for public health services which are intended to be provided free-of-charge	Direct payments made by patients for free public health services (included cash & in kind) Divided by all health services payment	Percent	MICS DHS	Household survey	2-5 years	DPI	

Indicator	Indicator Definition	Numerator/Denominator	Unit of measurement	Data Source	Data collection			Comments
					Approach/Methods	Schedule / Frequency	Person/Entity Responsible	
Proportion of government funds which reach district-level facilities	Governance in health financing can be assessed by monitoring overall levels of health spending efficiency in ensuring that spending reaches health facilities and the poor.	Government funds that reach the district level facilities divided by Government budget	Percent	MICS DHS	Public Expenditure tracking Surveys (PETS)	2-5 years	DPI/MOFED	
% of PHUs reporting uninterrupted supply of tracer drugs	Proportion of PHUs that reported uninterrupted supply of tracer drugs	Number of PHUs that reported uninterrupted supply of tracer drugs /Total number of PHUs in the district	Percent	HMIS	Health statistics	Monthly Annual	DPI	
Essential medicine list updated within the last five years and disseminated annually	List of essential drugs that satisfy the priority care needs (infectious diseases, maternal and child health, and non communicable Diseases) disseminated	A national list of essential medicines based on priority care updated within the last five years and disseminated.	Number			2 years	MOHS	
% of monthly HIS reports submitted on time by PHUs to districts	Proportion of routine health information reports that were received by district within the time specified	Number of PHUs reports received by district within a given time period divided by the number of reports expected (= number of PHUs) in the district	Percent	HMIS/	Health statistics	Monthly Annually	DPI	
% of Districts organising a review meeting each quarter	Proportion of Districts which organized at least a review meeting each quarter	Number of Districts which organized at least a review meeting each quarter divided by total number of districts	Percent	HMIS	Health statistics	Quarterly annually	DPI/DMO	
% of PHUs supervised at least once in the last three months using a nationally approved checklist	Proportion of PHUs supervised at least once in the last three months using a nationally approved checklist	Number of PHUs supervised at least once in the last three months using a nationally approved checklist divided by total number of PHUs in the district	Percent	HMIS	Health statistics	Quarterly, annually	DPI/ DMO	
Data quality	Correspondence between data reported and data recorded in registers and patient / client records, as measured by a Lot Quality Assurance Sample (LQAS)	Proportion of samples within 80% / Total no. of samples within 80% / Total no. of samples taken	Percent	HMIS	Health statistics	Quarterly, annually	DPI/ DMO	