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ESSENTIAL PACKAGE OF HEALTH SERVICES COUNTRY SNAPSHOT: UGANDA

July 2015
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The Health Finance and Governance Project
USAID's Health Finance and Governance (HFG) project helps to improve health in developing countries by expanding people's access to health care. Led by Abt Associates, the project team works with partner countries to increase their domestic resources for health, manage those precious resources more effectively, and make wise purchasing decisions. As a result, this five-year, $209 million global project increases the use of both primary and priority health services, including HIV/AIDS, tuberculosis, malaria, and reproductive health services. Designed to fundamentally strengthen health systems, HFG supports countries as they navigate the economic transitions needed to achieve universal health care.

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Photo: Smiling children in Mpoma, Uganda.
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ACRONYMS

EPHS	Essential Package of Health Services
HC	Health center
RMNCH	Reproductive, maternal, newborn and child health
UNMHCP	Uganda National Minimum Health Care Package

ABOUT THE ESSENTIAL PACKAGES OF HEALTH SERVICES COUNTRY SNAPSHOT SERIES

An Essential Package of Health Services (EPHS) can be defined as the package of services that the government is providing or is aspiring to provide to its citizens in an equitable manner. Essential packages are often expected to achieve multiple goals: improved efficiency, equity, political empowerment, accountability, and altogether more effective care. There is no universal essential package of health services that applies to every country in the world, nor is it expected that all health expenditures in any given country be directed toward provision of that package. Countries vary with respect to disease burden, level of poverty and inequality, moral code, social preferences, operational challenges, financial challenges, and more, and a country's EPHS should reflect those factors.

This country snapshot is one in a series of 24 snapshots produced by the Health Finance & Governance Project as part of an activity looking at the Governance Dimensions of Essential Packages of Health Services in the Ending Preventable Child and Maternal Death priority countries. The snapshot explores several important dimensions of the EPHS in the country, such as how government policies contribute to the service coverage, population coverage, and financial coverage of the package. The information presented in this country snapshot feeds into a larger cross-country comparative analysis undertaken by the Health Finance & Governance Project to identify broader themes related to how countries use an EPHS and related policies and programs to improve health service delivery and health outcomes.

Each country snapshot includes annexes that contain further information about the EPHS. When available, this includes the country's most recently published package; a comparison of the country's package to the list of priority reproductive, maternal, newborn and child health interventions developed by the Partnership for Maternal, Newborn and Child Health in 2011 (PMNCH 2011), and a profile of health equity in the country.

THE ESSENTIAL PACKAGE OF HEALTH SERVICES (EPHS) IN UGANDA

Uganda's EPHS is referred to as the Uganda National Minimum Health Care Package (UNMHCP). The UNMHCP was first established in the *1999/2000 National Health Policy*, accompanied by the country's first *Health Sector Strategic Plan*. Health sector policy documents have continued to center around the concept of the UNMHCP. The most recent revision of the UNMHCP is included at a high level in the *Second National Health Policy*. The high-level package is restated in the country's *Health Sector Strategic and Investment Plan 2010/11– 2014/15*. Annex A is a selection from this policy document. The selection contains the high-level UNMHCP, which states four main categories of health services, and the specific priority interventions under each category. The four main categories of the UNMHCP are:

A. Health promotion, environmental health, disease prevention, and community health initiatives, including epidemic and disaster preparedness and response

B. Maternal and Child Health

C. Prevention, management, and control of communicable diseases

D. Prevention, management, and control of noncommunicable diseases

Additionally, the selection from the *Health Sector Strategic and Investment Plan 2010/11– 2014/15* in Annex A includes a slightly different list of priority categories for financial investment by the government and donors, which some may interpret as a separate version of the country's EPHS:

- **Sexual and reproductive health:** in recognition of the slow progress being made toward attaining good health outcomes relating to this area of services
- **Child health:** in recognition of the need to accelerate implementation of cost-effective interventions to improve child health
- **Health education:** in recognition of the critical role that addressing health factors plays in attaining the overall health goals
- **Control and prevention of communicable diseases** (HIV, AIDS, malaria, and tuberculosis): in recognition of their major contribution to the overall disease burden

According to the *Health Sector Strategic and Investment Plan 2010/11–2014/15*, the above categories should have first priority above other investments by both government and donors.

Priority Reproductive, Maternal, Newborn and Child Health Interventions

To see a comparison of Uganda's EPHS and the priority reproductive, maternal, newborn and child health (RMNCH) interventions (PMNCH 2011), refer to Annex B.

Status of Service in EPHS	Status Definition	# of Services
Included	The literature on the essential package specifically mentioned that this service was included.	37
Explicitly Excluded	The literature on the essential package specifically mentioned that this service was not included.	1
Implicitly Excluded	This service was not specifically mentioned, and is not clinically relevant to one of the high-level groups of services included in the essential package.	0
Unspecified	The literature on the essential package did not specifically mention this service, but this service is clinically relevant to one of the high-level groups of services included in the essential package.	22

The following priority RMNCH intervention is explicitly excluded from Uganda's EPHS:

- Safe abortion

Use of Selected Priority Services

The table below presents the country's data on common indicators.

Indicator	Year	Value	Urban Value	Rural Value
Pregnant women sleeping under insecticide-treated nets (%)	2011		55.5	45.7
Births attended by skilled health personnel (in the five years preceding the survey) (%)	2011		89.1	52.8
BCG immunization coverage among one-year-olds (%)	2013	93		
Diphtheria tetanus toxoid and pertussis (DTP3) immunization coverage among one-year-olds (%)	2013	78		
Median availability of selected generic medicines (%)– private	2004	80		
Median availability of selected generic medicines (%)– public	2004	20		

Source: Global Health Observatory, World Health Organization.

How the Health System Delivers the EPHS

RMNCH services from the EPHS are delivered through:

- ✓ government-sponsored community health workers
- ✓ public sector primary care facilities
- ✓ public sector referral facilities

Health sector management rests mainly with local governments at the district level. The local government plans, budgets, and implements health policies; manages and supervises the public sector health facilities; and regulates private sector health facilities in the district. The UNMHCP was developed for all levels of the health system and for both the public and private sector. According to the *Health Sector Strategic and Investment Plan 2010/11-2014/15*, private sector health facilities account for about 50 percent of health sector outputs in Uganda. Private not-for-profit health facilities are more structured, and are prominently present in rural areas; and the (less-structured) private for-profit sector is growing rapidly in urban centers. The government has subsidized some private sector facilities.

The public sector health care delivery system includes hospitals, health centers, and village health teams. Village health teams facilitate health promotion, service delivery, and community participation and empowerment in access to and use of health services. Health centers (HCs) are classified as HC II-IV. HC IIs provide the first level of interaction between the community and the health system, and provide only outpatient services, outreach, and linkages with village health teams.

As of 2010, the country had two public sector national referral hospitals, which operated semi-autonomously; 11 public sector regional referral hospitals; and 52 public sector general hospitals. There were also 56 private not-for-profit hospitals and nine private for-profit hospitals. The government owns about half of the health care facilities in Uganda, and has been trying to scale up the infrastructure in recent years.

Delivering the EPHS to Different Population Groups

The government's strategy for implementing the EPHS includes specific activities to improve equity of access for specific populations; these include:

- ✓ women, and
- ✓ rural populations

See Annex C for the World Health Organization's full health equity profile of Uganda based on data from a 2011 Demographic and Health Survey.

Key findings from the health equity profile include:

- Antenatal care coverage is similar across wealth quintiles, education levels, and places of residence (urban versus rural).
- Percentage of births attended by skilled health personnel is positively associated with wealth, higher education, and urban place of residence. Only 55 percent of rural births are attended by skilled health personnel compared to 90 percent of urban births.
- Immunization coverage is also similar between wealth quintiles, education levels, and place of residence.

The *Second National Health Policy* specifies the following populations to be targeted for improving their access to the UNMHCP: mothers, children, and vulnerable populations.

Additionally, the government has been working to establish village health teams in all districts across the country to better serve hard-to-reach populations. In 2010, coverage of village health teams was still low nationally (*Health Sector Strategic and Investment Plan 2010/11-2014/15*).

Recently, the Ugandan and international community have expressed concerns related to marginalization of certain vulnerable groups and equitable access to health services *(http://www.hrw.org/node/129329).*

Providing Financial Protection for the EPHS

- ✓ Community-based insurance is available in parts or all of the country.
- ✓ All services included in the EPHS are legally exempt from user fees on a national scale.

The government formally abolished user fees in public sector facilities in 2001, but the government is aware that unofficial fees demanded by public sector health workers are still a financial barrier to accessing health services for much of the population (*Health Sector Strategic and Investment Plan 2010/11-2014/15*).

Social health insurance for formal or informal sector workers is not currently available in Uganda. The National Health Insurance Bill 2007 would require civil servants and formally employed Ugandans to make mandatory contributions to the National Social Health Scheme. However, this bill has not become law at this time. Dr. Asuman Lukwago, the Permanent Secretary in the Ministry of Health, stated that the scheme will start operating this year since they are in the final stages of drafting the law (The Independent 2015). While tax revenue is equitable, the remaining financing mechanisms for Uganda are inequitable due to their regressive nature, their lack of financial protection, and limited cross-subsidy. A few community-based insurance initiatives cover about 2 percent of the catchment population, but most of them face severe sustainability problems (Zikusooka et al. 2009).

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ANNEX A. UGANDA'S EPHS

Ministry of Health

HEALTH SECTOR STRATEGIC & INVESTMENT PLAN

Promoting People's Health to Enhance Socio-economic Development

2010/11 – 2014/15

July 2010

4: Improve efficiency and budget effectiveness	REC 3: Better understanding of investments needed to achieve the health outputs being sought. REC 7: A comprehensive Health Financing Strategy	NHP 7: Increasing motivation, productivity, performance, integrity and ethical behaviour of HR NHP 8: Ensuring that essential, efficacious, safe, quality and affordable medicines are available, and used rationally NHP 9: Providing, and maintaining functional, efficient safe, environmentally friendly and sustainable health infrastructure NHP 10: Mobilizing sufficient financial resources to fund the health sector programmes
5: Deepen health stewardship	REC 5: Comprehensive knowledge management approach is needed in the sector REC 8: Scale up sector coordination and partnership.	NHP 1: Strengthening the organization and management of the national health systems NHP 3: Building a harmonized and coordinated national health information system NHP 4: Creating a culture in which health research plays a significant role in guiding policy NHP 5: Reviewing and developing relevant acts and regulations governing health NHP 10: Mobilizing sufficient financial resources to fund the health sector programmes NHP 11: Effectively building and utilising the full potential of the public and private partnerships NHP 12: Strengthening collaboration between the Health Sector, and other Government Ministries and departments NHP 13: Implementing the National Health Policy and HSSP's within the Sector Wide Approach and IHP+ framework,

5.2 Strategic Interventions

Within each Strategic objective, the priority deliverables strategies, interventions, targets and the implementation arrangements are defined.

5.2.1 Objective 1: Scale up critical interventions

The sector will work towards scaling up critical interventions that will impact on health.

Because of the limited resource envelope available for the health sector the NHP II recommends that a minimum health care package be delivered to all people in Uganda. This package should consist of the most cost-effective priority health care interventions and services addressing the high disease burden that are acceptable and affordable within the total resource envelope of the sector. The package as defined in the NHP II consists of the following clusters:

(i) Health Promotion, Disease Prevention and Community Health Initiatives, including epidemic and disaster preparedness and response;

(ii) Maternal and Child Health;

(iii) Prevention, Management and Control of Communicable Diseases; and

(iv) Prevention, Management and Control of Non-Communicable Diseases.

The composition of the package shall be revisited periodically depending on changes in disease burden, availability of new interventions to address these conditions, changes in the cost-effectiveness of interventions and the total resource envelope available for service delivery and shall be based on available evidence. Greater attention shall be paid to ensure equitable access to the minimum package including affirmative action for underserved areas, vulnerable populations and continuum of care.

The package, in HSSIP, will focus on implementing the priorities outlined in the table below.

Table 5.2: Intervention areas for services in the HSSIP

Service cluster	Intervention areas
Cluster 1: Health Promotion, Environmental Health, Disease Prevention and Community Health Initiatives, including epidemic and disaster preparedness and response	Promote individual and community responsibility for better health
	Contribute to the attainment of a significant reduction of morbidity and mortality due to environmental health and unhygienic practices and other environmental health related conditions.
	Reducte morbidity and mortality due to diarrhoeal diseases
	Improveme the health status of the school children, their families and teachers and to inculcate appropriate health seeking behaviour among this population.
	Ensure equitable access by people in PRDP districts [in conflict and post-conflict situations] to Health Services
	Prevent, detect, and promtly respond to health emergencies and other diseases of public health importance.
	Scale up delivery of nutrition services
Cluster 2: Prevention, Management and Control of Communicable Diseases	Prevent STI/HIV/TB transmission and mitigation of the medical and personal effects of the epidemic.
	Reduce the morbidity, mortality and transmission of tuberculosis.
	Sustain the elimination of leprosy in all the districts.
	Reduce the morbidity and mortality rate due to malaria in all age groups.
	Maintain the Guinea Worm free status of the country through maintenance of high quality post-certification surveillance.
	Eradicate onchocerciasis and its vector in all endemic districts in Uganda
	Achieve the global target for the elimination of trachoma.
	Reduce, and ultimately interrupt transmission of the disease in all endemic communities through the use of chemotherapy with Ivermectin and albendazole.
	Eliminate sleeping sickness as a public health problem in Uganda.
	Reduce morbidity caused by the worms by decreasing the worm burden among communities
	Reduce morbidity and mortality due to Leishmaniasis among the endemic communities
	Reduce morbidity and mortality due to endemic , emerging and re-emerging zoonotic diseases
Cluster 3: Prevention, Management and Control of Non-Communicable Diseases	Prevent Type 1 and Type 2 diabetes and reduce morbidity and mortality attributable to diabetes and its complications.
	Prevent cardiovascular and related diseases and reduce morbidity and mortality attributable to CVDs
	Establish a national framework for cancer control with emphasis on cancer prevention
	Prevent chronic respiratory diseases and reduce morbidity and mortality attributable to COPD and asthma
	Reduce the morbidity and mortality associated with sick cell disease.
	Decrease the morbidity and mortality due to injuries, common emergencies and disabilities from visual, hearing and age-related impairments.
	Ensure increased access to primary and referral services for mental health, prevention and management of substance abuse problems, psychosocial disorders and common neurological disorders such as epilepsy.
	Improve the oral health of the people of Uganda by promoting oral health and preventing, appropriately treating, monitoring and evaluating oral diseases.
	Improve the quality of life of terminally ill patients and their families especially the home carers
Cluster 4: Maternal and Child Health	Reduce mortality and morbidity relating to sexual and reproductive health & rights
	Improve newborn health and survival by increasing coverage of high impact evidence based interventions, in order to accelerate the attainment of MDG 4.
	Scale up and sustain high, effective coverage of a priority package of cost-effective child survival interventions in order to reduce under five mortality.
	Prevent morbidity and mortality due to gender based violence.

The implementation of the minimum package in the HSSP II was limited by inadequate resources, both human as well as financial, at all levels of health care.

To achieve this strategic objective,

- Priority shall be given to interventions proven effective against diseases targeted for control, elimination or eradication, and in conjunction with the private sectors provide in an integrated manner, promotive, preventative, curative and rehabilitative services that have been proven effective, cost effective and affordable.
- Ensuring that all people in Uganda, both users and providers of health services, understand their health rights and responsibilities through implementation of comprehensive and gender sensitive advocacy, communication and social mobilisation programs.
- Improving people's awareness about health and related issues in order to bring about desired changes in knowledge, attitudes, practices and behaviours regarding the prevention and control of major health and nutrition problems in Uganda. In order to achieve this, government will promote the use of social marketing and establish a clear marketing plan that will be pro-active in targeting groups with the greatest need and use varying media according to the target audience.
- Strengthening responsible self-care, especially at primary care level, for selected health problems and patient categories through carefully planned and evaluated- pilot phases.
- Strengthening community health services.
- Prevention, management and control of communicable diseases.

The specific issues, objectives, strategies, interventions, targets and the implementation arrangements for each of the clusters are now elaborated.

Cluster 1: Health promotion, environmental health and community health initiatives

There are 4 elements of the health promotion and disease prevention cluster namely: HPE, environmental health, school health and epidemic and disaster prevention, preparedness and response. As a result, there are four priorities defined, one for each of the elements.

5.2.1.1 Promote individual and community responsibility for better health

Prevailing cultural beliefs, attitudes and practices constitute some of the major determinants of health seeking behaviour in most African countries. Uganda is no exception with 60% of the people seeking care from TCMPs before resorting to modern health facilities. People might be ignorant about the aetiogy of disease and how to prevent ill health. HPE helps to address these issues and should therefore be a component of all health programmes as it promotes behavioural change.

The major thrust in health promotion and disease prevention has been the establishment of VHTs at community level to facilitate creation of awareness, community participation and delivery of efficient and effective health interventions at community level. In addition to VHTs, during the HSSP II the MoH worked with the media available in all districts to disseminate health messages to promote behaviour change. As of November 2009 31% out of the districts had functional VHTs. Inadequate funding has led to delayed implementation of the VHT strategy. At district level there is also inadequate capacity for planning and implementation of HPE activities mainly due to shortage of health educators. While demand for information has been created at community level, the need for IEC materials is not being met because of the lack of funding.

During HSSIP these shortfalls shall be addressed through mobilisation of adequate resources for rolling out the VHT strategy to all districts in Uganda. The MoH and other stakholders will continue working with the media. In this period the MoH will also work with universities to train health educators in order to address the shortage of these professionals in both the public and private sectors. The training of health educators is necessary because the number of districts has increased and the training institutions cannot match the

demand. Currently half of the districts have health educators while most of the new ones only have one or none. The MoH will also revitalise the health education printing unit and funds mobilised for dissemination of messages on the FM radio stations.

Strategies and interventions

- *Strengthen IEC initiatives to bring about changes in health and related behaviours among people in Uganda.*
  - Provide leadership in setting standards and guidelines for the production and delivery of IEC messages among institutions that are responsible for such activities.
  - Develop and disseminate IEC messages on health issues through VHTs, print and electronic media.
  - Liaise with Department of Human Resource Development and Institutions of Higher Learning to build capacity for health education and promotion and provide incentives for HRH to take up the training.
- *Roll out the VHT strategy in all districts in Uganda.*
  - Complete the establishment and training of VHTs in all the districts in Uganda.
  - Provide adequate tools (e.g. registers, IEC materials) to make the VHTs operational.
  - Provide the necessary incentives to VHTs as detailed in the NHP II.
  - Pool resources from programs for the common functions of VHT which cut across programs.
- *Initiate and implement advocacy programmes to influence provision of effective preventive health services.*
  - Promote the development and enforcement of byelaws by district local governments in conjunction with other line ministries..
- *Strengthen intersectoral linkages for health promotion.*
  - Identify and exploit the potential, existing in other sectors such as gender, education, water and environment.

Indicators with targets

- Standards and guidelines (including criteria for gender sensitivity) for the production and delivery of IEC messages developed and disseminated among institutions by 2011/2012.
- The proportion of districts with trained VHTs increased from 31%to 100% by 2014/2015.
- The proportion of health facilities with IEC materials maintained at 100%.

Implementation arrangements

At the national level, the Division of Health Promotion and Education at the MoH headquarters will take the lead and stewardship role in implementing HPE programmes. The Division will:

- In conjunction with the private sector, CSOs and other relevant Government agencies develop and review a strategic plan for HPE and related activities.
- Collaborate with specific technical programmes in the review/development of policy, overall coordination and guidance on HPE activities countrywide and it will also provide technical support and supervision to DHS including the CSOs and the private sector.
- Liaise with other Government agencies and NGOs to establish and review standards and regulations pertaining to HPE and monitor and supervise activities.

At district level the District Health Office shall be responsible for planning, management, monitoring

and coordinating IEC activities and will work with all agencies including the District Information Office, community development officers, private health institutions, religious and cultural institutions and civil society organisations. Operational plans will also be developed for HPE with the leadership of the DHO. At health centre level HPE activities will be carried out by available health professionals and VHTs and this will be based on need and health problems most prevalent at household and community level. The effective implementation of this component of the health promotion and disease prevention cluster will depend on effective coordination and a multisectoral approach to programming of HPE activities.

5.2.1.2 Contribute to the attainment of a significant reduction of morbidity and mortality due to environmental health and unhygienic practices and other environmental health related conditions.

Environmental factors such as availability of safe water, pit latrines and safe disposal of waste facilities are major determinants of health outcomes. The Health Promotion, Environmental Health and Community Initiatives Cluster therefore focuses on improving the above environmental health factors. Poor hygiene and other environmental health factors which are often linked to disease and poverty are the major causes of ill health in Uganda. The 2006 UDHS shows that 59% of the households have pit latrines; 77% have access to safe water sources; 75% live in houses made of temporary materials; and 14% of persons wash hands with soap. Only 25% of the districts are implementing water quality surveillance. There are a number of factors that are responsible for this situation: inadequate allocation of resources for environmental health activities; inadequate human resource; high levels of poverty; and inadequate facilitation especially transport. Climate change which is related to global warming has significant impact on human health, environment and health service delivery. The increase in temperatures has an influence on the geographical range of diseases e.g malaria and diarrhoeal related illnesses. Climate patterns such as El Nino result into flooding which exacerbates the spread of waterborne diseases like cholera, typhoid and dysentery. Uganda has experienced some of these impacts of climate change; hence the need to pay attention to climate change and related issues. During the implementation of HSSIP priority shall be given to the provision of adequate resources for environmental health programmes and the private sector in particular shall be mobilised to be involved in these activities. Special attention shall be given to addressing poor sanitation and hygiene to move households up the sanitation ladder from slums to facilities that can be cleaned and having hand washing facilities next to them, water quality surveillance, food hygiene and safety, occupational health and safety and increasing awareness about climate change and its impacts.

Strategies and key interventions

- *Advocate and promote improved sanitation and hygiene as detailed in the Kampala Declaration on Sanitation.*
    - Conduct home improvement campaigns and establish model villages in all districts in Uganda.
    - Sensitize political, religious and cultural leaders on the importance of sanitation and hygiene promotion.
    - Implement Participatory Hygiene and Sanitation Transformations (PHAST) and Community Led Total Sanitation (CLTS).
    - Update skills of staff in the Environmental Health Division and the private sector on emerging technologies dealing with the promotion of sanitation and hygiene.
- *Support and encourage Local Governments to formulate ordinances and bye-laws on environmental health and ensure that they are enforced.*
    - Sensitize local governments on formulation and implementation of environmental health bye laws and ordinances.
    - Orient local governments in the development and implementation of environmental health bye laws and ordinances.

- Sensitise law enforcers on new bye laws and ordinances.

- *Strengthen the capacity of public and private health care providers in health care waste and industrial waste management.*
  - Develop guidelines for health care waste and industrial waste management.
  - Sensitize health workers and private health care providers in health care waste management.
  - Sensitise industrial managers on safe industrial waste management.
  - Enforce the provision of industrial waste management services.
  - Provide facilities at all health facilities for health care waste management.
- *Support and advocate for food hygiene and safety, safe water chain and hand washing with soap and mass hand washing campaigns.*
  - Disseminate the food hygiene and safety, safe water chain and hand washing guidelines.
  - Support local governments to enforce food hygiene and safety, safe water chain and hand washing standards.
- *Mitigation of effects of climate change and health*
  - Sensitize staff at the MoH and local governments on effects of climate change on health.
  - Develop early warning systems and disseminate weather forecasts to health managers to improve preparedness and response.
  - Coordinate climate change response interventions in the health sector and collaborate with relevant line ministries and agencies.
- *Strengthen, support and improve Environmental Health Management Information System in both Public and Private sector service delivery.*
  - Build capacity for all the Environmental Health staff at all levels of government and CSOs.
  - Develop guidelines on EHMIS, operation, maintenance and utilisation.
  - Establish early warning systems on environmental health related risk factors e.g water quality, food safety and sanitation and hygiene related disease out breaks.
  - Support Environmental Health research and documentation.

Indicators with targets

- The proportion of households in Uganda with pit latrines increased from 67.5% to 72% by 2015.
- Percentage of households with access to safe water.
- The proportion of districts implementing water quality surveillance and promotion of safe water chain/ consumption increased from 30% to 50% by the year 2015.
- The proportion of households with hand washing facilities with soap increased from 22% to 50% by 2015.

Implementation arrangements

The implementation of the environmental health component of the Health Promotion, Environmental Health and Disease Prevention Cluster needs a multi-sectoral approach and participation of line ministries, Development Partners and CSOs involved in Water, Environment and Sanitation (WES). The Environmental Health Division in the MoH shall:

- Be responsible for coordinating environmental health programmes.

- Be responsible for policy, guidelines and standards development and periodical reviews on all environmental health aspects. This will be carried out in liaison with key stakeholders.
- Be responsible for technical support supervision, monitoring implementation of environmental health interventions.
- Build capacity of Environmental Health staff, CSOs, private sector involved in Environmental health.
- Shall carry out operational research, data collection, utilisation and documentation of best practices.

At district level, the DHO will be responsible for coordinating these activities with technical support from the MoH headquarters. At HSD level, the in-charge with support from the Health Inspectors will coordinate activities. The Health Assistant shall coordinate the environmental health activities at sub-county level while at community level VHTs shall be responsible for creating awareness about these interventions. Monitoring at community level shall be the responsibility of a technical staff from the sub-county.

5.2.1.3 Reduce morbidity and mortality due to diarrhoeal diseases

Diarrhoeal diseases including acute watery diarrhoea that is not cholera, cholera, dysentery and persistent diarrhoea are the third leading causes of attendances at health facilities, after malaria and acute respiratory infection. Diarrhoeal diseases are the second leading cause of childhood death after malaria. During HSSP II epidemic diarrhoeal diseases (cholera and dysentery) outbreaks were controlled in all parts of the country. The outbreaks were due mainly to poor sanitation, low safe water coverage, poor domestic and personal hygiene practices and mass movement of populations - refugees and internally displaced persons owing to disasters such as landslides, floods, and post-election violence.

As has been mentioned in Chapter 3 overall there was a decrease in the incidence of diarrhoeal diseases and the CFR for diarrhoea and cholera during the period of the HSSP II. There is continuing need for strengthening national capacity at all levels to prevent and effectively control epidemics of diarrhoea. During HSSIP, emphasis shall be placed on integration of interventions for IMCI, environmental health, health promotion and education, capacity building of service providers especially with regard to the new diarrhoea management policies (e.g. use of zinc) and community based health activities.

Strategies

- *Strengthen initiatives for control and prevention of diarrhoea at all levels.*
  - Train health workers at central, district and community levels in the management and prevention of diarrhoeal diseases.
  - Provide technical support supervision, monitoring and evaluation of CDD interventions
  - Conduct advocacy and social mobilisation for control of diarrhoeal diseases.
  - Make available medicines and supplies for control of diarrhoeal diseases.
  - Conduct diarrhoeal diseases surveillance, epidemic preparedness and response.

Indicators with targets

- The incidence of annual cases of cholera reduced from 3/100,000 to 1.5/100,000 by 2014/2015.
- The incidence of annual cases of dysentery reduced from 254/100,000 to 1.5/100,000 by 2014/2015.
- The cholera specific case fatality rate from 2.1% to <1.0% by 2014/2015.
- The dysentery specific case fatality rate from 0.08% to 0.01% by 2015.
- The acute watery diarrhoea specific case fatality rate from 0.9% to 0.4% by 2015.

Implementation arrangements

The control of diarrhoeal diseases is multisectoral. It is based on the involvement of various sectors including Health, Water, Education, Local Government, Information and Office of the Prime Minister (disaster preparedness and response). The MoH headquarters will develop or review relevant policies and guidelines; mobilise resources; do national level planning; and carry out technical support supervision, monitoring and evaluation of CDD interventions. However, the actual implementation of CDD interventions is the responsibility of District Local Governments. Strengthening health systems will be useful in order to detect cases early. Involvement of communities and individuals is central in prevention and management of diarrhoeal diseases; and the VHT strategy, therefore, is expected to contribute significantly to the success of reduction in incidence and prevalence of diarrhoeal disease. Diarrhoea specific case fatality rate reduction will be dependent mainly on the use of appropriate treatment guidelines and the availability of relevant medicines and health supplies at service delivery points.

5.2.1.4 Improve the health status of the school children, their families and teachers and to inculcate appropriate health seeking behaviour among this population.

These programmes were introduced in HSSP I to provide comprehensive preventive and promotive health services to school going children and instil healthy habits and practices in children. The full implementation of the school health programmes in HSSP II washampered by the lack of a school health policy and a MoU between the MoE and MoH, insufficient ownership of the programme by the MoES, understaffing at MoH and local government level, absenteeism by teachers and health workers and the poor enforcement of available guidelines in local governments.

During the implementation of the HSSIP focus for school health programmes will be on primary and secondary schools and teachers training institutions. The MoU will be instituted and the School Health Policy will be in place. It is expected that the school health programmes will improve the health of school children, reduce dropout rates and increase school perfomance.

Strategies and interventions

- *Expand the coverage of the school health and nutrition programme to include more schools*
    - Advocate with the MoES for the appointment and retention of School Health Nurses;
    - Make available the required equipment for the establishment of the basic health and nutrition programme.
    - Where there are no school health nurses, implement the Motivation and Retention Strategy for HRH of the MoH, 2009.
- *Strengthen the policy and legal environment for provision of school health services.*
    - Finalise the development of a the MoU with the MoES to govern the implementation of school health programmes.
    - Develop the missing health standards (e.g. nutrition and screening) and operationalise all standards.
- *Strengthen the capacity of districts to implement school health programmes.*
    - Integrate school health programmes into district health plans.
    - Monitor the implementation of school health programmes using a new set of indicators
    - Coordinate school health programmes at intersectoral technical committee level
    - Orient district and lower level staff including teachers and the community on school health programmes.

- *Expand the provision of clean water and improved sanitation to schools, with special emphasis on primary schools*
    - Advocate and work together with MoES to snstall clean and safe water sources in all schools
    - Distribute water treatment chemicals to control outbreaks of waterborne diseases.
    - Support the construction of atrines at schools.

Indicators with targets

- The % of schools in Uganda that provide basic health and nutrition services increased to 25 % by 2015.
- The % of primary and secondary schools with safe water source within 0.5 km radius of the school increased from 61% and 75% resp. to 80% by 2015.
- The % of schools with pupil per latrine stance ratio of 40:1 or better increased from 57% to -70% by 2015.

Implementation arrangements

The implementation of school health programmes will be a joint responsibility of the MoES and MoH but it will also involve other school health stakeholders. The coordination office for the school health programmes will be housed in the Ministry of Education and Sports. Specialised school health interventions will be implemented by relevant sectors and a MoU will be signed by implmenting partners which will include the MoH and other government ministries and departments, the private ssector, CSOs and NGOs. These will be responsible for the development and implementation of the school health programmes.

Clear roles and responsibilities of the implementing partners will be spelt out. The MoH will provide guidelines and technical supervision to all districts while monitoring shall be a joint excercise of the MoH and MoE and other stakeholders. The MoH, MoE and stakeholders shall ensure that all schools are properly equipped to provide health education and health promotional activities. The DHO will coordinate school health programmes at district level but will also work with District Education Office to ensure that these programmes are implemented.

5.2.1.5 Prevent, detect early and promptly respond to health emergencies and other diseases of public health importance.

Over the years Uganda has been prone and has also experienced disasters such as floods, drought, famine and epidemics such as Ebola, Marburg, meningitis and cholera among others which have far reaching social and economic implications including decreased tourism, trade and opportunities for investment both from within and outside of Uganda. The environmental degradation, global warming and climate change are further exacerbating the vulnerability of the population. During the HSSP II mechanisms for disaster preparedness and response in all the districts were established but inadequate resources and logistics, weaknesses in planning for emergencies, understaffing and lack of skills especially at lower levels and the fact that epidemic and disaster prepadness is not given priority at district and national level hampered the country's response system. Furthermore the disjointed approach using various task forces without a focal person to coordinate and over look disaster and emergency preparedness at the MOH level have contributed for the weak coordination and delayed response. The GoU will therefore target to improve its preparedness and response to disasters and epidemics to reduce morbidity and mortality from these events.

Strategies and key interventions

- *Strengthen epidemic, disaster prevention, preparedness, response and management at all levels.*
    - Strengthen the health systems and build the capacity at the community level on preparedness, detection, response, management and mitigation of epidemics and disasters.

- Strengthening intersectoral coordination mechanisms within the country and at inter-country level on management of epidemics.
- Develop emergency preparedness and response plans including stock piling and contingency planning at all levels.
- Conduct vulnerability and risk mapping exercise to guide policy and strategy development.
- Produce and make available Standard Operating Procedures (SOPs), formats and tools at all levels.
- Strengthening capacity for implemementation of International Health Regulations (2005).
- Strengthen integrated disease surveillance, with particular emphasis on the early warning system and linkage with meteorological forecasts.
- Establish and sustain a reliable and functioning early warning system in collaboration with line ministries on meteorology and seismology.
- Expand coverage of the IDSR Strategy.

Indicators with targets

- The proportion of suspected disease outbreaks responded to within 48 hours of notification increased from 52% to 80%.
- The proportion of districts with functional epidemic preparedness and response committees increased from 76% to 100%.
- The proportion of districts with epidemic preparedness plans increased to 100%.
- The timeliness and completeness of weekly and monthly reports maintained at greater than 80%.

Implementation arrangements

At national level the Department of Community Health[42] has the responsibility for the development of the national strategy for prevention and control of epidemics, carrying out national disease surveillance and training of DHMTs and VHTs in disease control. The commissioner community health will be responsible for chairing a working group on Emergency and disaster preparedness which will be established under the Basic packages of HPAC. A new IDSR/EPR/IHR strategic plan corresponding to the HSSIP period has been developed and will be the basis for implementation and monitoring of interventions/activities to strengthen epidemic and disaster prevention, preparedness and response. International Health Regulations (2005) shall be adhered to in the course of EPR. The Department of Community Health:

- In conjunction with the Office of the Prime Minister and other stakeholders such as CSOs and the private sector shall be responsible for development of policy and guidelines on control of epidemics and management of disasters.
- Shall provide all the necessary supervision and technical support to districts in order to ensure that they do their work accordingly.

The DHO shall be responsible for coordinating these activities at district and lower levels including working with communities (and VHTs in particular) in the detection of disease outbreaks. The private sector shall fully be involved in the detection, management and prevention of epidemic.

5.2.1.6 Ensure equitable access by people in PRDP districts [in conflict and post-conflict situations] to Health Services

The insecurity in Northern Uganda (sub-regions of West Nile, Acholi, Lango, Karamoja and Teso and

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neighbouring districts) in the past years resulted in massive displacement of the population into Internally Displaced Peoples camps. The table below shows the affected district as of 2007

Table 5.3: Grouping of the forty[43] districts in Northern Uganda under PRDP as of 2007

Location	Northwest (West Nile)	North Central	North East
Type of Conflict	Armed Rebellion	Armed Rebellion	Deterioration of Law and Order
Districts	Moyo, Adjumani,	Gulu, Kitgum, Pader, Lira,	Kotido, Moroto, Nakapiripirit, Soroti,
	Nebbi, Arua,	Apac, Amuru, Dokolo,	Kumi, Pallisa, Kapchorwa, Mbale,
	Yumbe, Koboko, Maracha	Amolatar, Oyam, Masindi and Buliisa	Sironko, Kaberamaido, Katakwi, Abim, Kaabong, Bukwo, Bukedea, Budaka,

Some of the IDP camps were congested with inadequate social infrastructure. Access to water and education was also inadequate. Most of the trained health workers were in urban areas leaving operation of services in rural areas to unqualified personnel. In addition, the insecurity disrupted the provision of health services leading to closure of some health facilities and stagnation some services.

The table below shows comparison of Health indicators to the national average

Table 5.4: Comparison of health indicators in Conflict and post-conflict region of Uganda

Indicator	National average	Rural areas average	North Region	West Nile Region	IDPs	Karamoja
Infant mortality rate, per 1,000 births	76	88	106	98	123	105
Under 5 mortality rate, per 1,000 births	137	153	177	185	200	174
Total fertility rate	6.7	7.1	7.5	7.2	8.6	7.2
Women using modern contraceptive methods (%)	18	15	8	11	18	0
TT2 coverage in pregnancy (%)	51	50	55	51	63	53
Births with skilled birth attendant (%)	42	37	31	35	34	18
DPT3 coverage in children 12-23 months (%)	64	64	67	61	84	66
Under 5 stunted children (%)	38	40	40	38	37	54
Under 5 wasted children (%)	6	6	7	8	6	11

Source: (UDHS/UBOS 2005/6)

Following the restoration of peace in the Northern region, the government of Uganda in 2007 launched the Peace Recovery and Development Plan for the 40 districts in the region. This is a comprehensive plan whose implementation is coordinated by the Office of the Prime Minister. The plan aims at addressing the causes of conflict and instability in the region, restoring livelihoods and revitalize social sectors. The Health Sector Component of the Peace, Recovery and Development Plan focuses on addressing the disparities in health service delivery and poor health indicators.

Though the launching had been done, full implementation of PRDP could not start immediately due to several reasons one of which was lack funding. However, in financial year 2009/10 funding was availed and implementation of the plan started and will continue into HSSP-III.

Strategies and key interventions

In order to strengthen health services, more health facilities will be constructed, rehabilitated and equipped in

[43] Please note that PRDP focuses on geographical area. Thus, the splitting of PRDP district, increases on the numbers of district in the PRDP plan

conflict regions of Acholi and Lango. This work is guided by service availability mapping which was conducted in Acholi and Lango sub regions.

Initially, priority was centred to areas of high return however; later the whole region will be covered.

In the post conflict areas, the focus will be to improve the quality of existing health facilities and services. This will be in phases which will allow restoration to pre-conflict status and thereafter upgrading of the health services to match those in other parts of the country with better health services.

During implementation of activities priority is given to major causes of mortality and morbidity namely: Malaria Prevention and Control, Reproductive Health, Child Health, HIV/AIDS, Human Resources for Health, Infrastructure and Equipment, Epidemic Preparedness and Response, Mental Health and Disability and Rehabilitation. During implementation both preventive and curative interventions will be promoted. In addition special interest is given to addressing the challenge of attraction and retention of health workers through accelerated recruitment, and incentives.

Similarly, Public Private Partnership will be strengthened to ensure wide coverage of the population.

Indicators and targets.

Investment will be made with the intention of improving the following key indicators:

- Increased access to functional health facilities: this should enable a larger percentage of the population to be within 5km or less of the facility

5.2.1.7 Scale up delivery of nutrition services

The nutritional situation of the population is generally poor especially among under fives, children of school going age, women of reproductive age, the elderly, the displaced and those with communicable and non-communicable diseases. Data from the previous three UDHSs in Uganda report high levels of child and maternal under nutrition that have not changed much over the past 15 years. Although there is widespread consumption of iodized salt, goitre is still commonly seen in the population. Field evidence shows that other micronutrient deficiencies such as zinc and folate exist. Sub-optimal child care and inappropriate feeding practices impact on the health and nutrition of children. Only 60% of infants 0-6 months are exclusively breastfed and at 4-5 months only 35% of infants receive breast milk only and this has been complicated by HIV infection. Timely introduction of complementary feeds is estimated as 77%. Malnutrition starts early in foetal life resulting into foetal retardation in utero which continues throughout infancy, childhood, adolescence and adulthood constituting the vicious cycle of malnutrition if there are no interventions. Most irreversible stunting in children takes place between one and two years of age. Malnutrition makes the population vulnerable to infections and other diseases and contributes to 60% of under five deaths hence the need for its prevention and control.

Despite the implementation of a variety of interventions by the GoU and other stakeholders to address nutrition issues, malnutrition levels remain unacceptably high. During the HSSIP there is a need to create awareness among community members especially women about nutrition and promote appropriate feeding practices, make available appropriately trained health workers (nutritionists) to deal with nutrition issues at all levels, advocate for financial resources for implementation of nutrition programmes, develop and implement a comprehensive policy framework for micronutritient deficiency control, procure appropriate equipment and construct infrastructure for nutrition programmes. The delivery of nutrition services is affected by inadequate financial and human resources, the lack of equipment in nutrition units, lack of infrastructure and the general lack of a comprehensive policy framework for micronutrient management among other issues.

Strategies and interventions

Strategy 1: To reduce the incidence and prevalence macro- and micro-nutrient deficiencies and associated mortality among vulnerable groups.

- ***S**trengthen maternal nutrition interventions to ensure optimal pregnancy outcomes and healthy infancy*
  - Provide micronutrient supplements (iron, folic acid, vitamin A and other relevant) to targeted groups.
  - Encourage and support antenatal care services through health and nutrition education.
  - Promote the consumption of high nutrient density local foods.
- *Integrate infant and young child nutrition interventions into maternal, infant and young child services to ensure growth and development.*
  - Provide infant and young child feeding counselling services during ante-natal and post-natal care.
  - Strengthen growth monitoring and promotion services at facility and community levels.
  - Support infant and young child feeding in the context of HIV.
  - Provide bi-annual Vitamin A supplementation and deworming to targeted groups.
- *Scale up micronutrient initiatives.*
  - Develop a comprehensive policy framework for micronutrient deficiency control.
  - Provide support for implementation of a consolidated policy on micronutrient deficiency control.
  - Promote food fortification by working with relevant public and private stakeholders.
  - Promote food supplementation
- *Promote good quality diets through diet diversification.*
  - Conduct nutrition education and counselling at facility, family and community levels.
  - Promote consumption of locally produced fortified foods.
  - Encourage the production and preparation of a variety of locally available nutritious foods.
- *Integrate the management of malnutrition into the health delivery system.*
  - Integrate identification, screening, referral and management of acute malnurished children into routine service delivery at facility level and community levels using national IMAM protocols.
  - Support and promote national procurement of therapeutic feeds and supplies.
  - Promote local production of therapeutic feeds.
- *Integrate nutrition into the treatment and management of HIV/AIDS, TB and malaria.*
  - Incorporate nutrition support into the management and treatment of HIV/AIDS, TB and malaria interventions.
  - Establish coordination mechanisms among partners involved in food and nutrition and HIV, TB and malaria interventions.
  - Support community involvement in provision of nutrition support to HIV/AIDS and TB patients.

Strategy 2: To improve access and quality of nutrition services at facility and community levels.

- *Support institutional feeding.*
  - Procure equipment for nutrition management like weighing scales, MUAC tapes, height meters, demonstration meters and food preparation equipment.
  - Conduct pre- and in-service training for service providers to promote nutrition interventions.
  - Develop curricula and training manuals for nutrition training.
  - Determine the human resource needs for nutrition services.

- Train trainers and equip the VHTs, community resource persons and other community based organizations with nutrition knowledge and skills.
- Provide technical support supervision and mentoring of health workers.
- Support nutrition response in emergency

Strategy 3: To review, formulate, enforce and coordinate nutrition related policies, regulations, standards and programmes in consultation with other relevant sector stakeholders.

- *Develop and disseminate nutrition policy and implementation guidelines.*
  - Initiate the review and up-date of the 2002 Uganda National Food and Nutrition Policy.
  - Develop implementation guidelines for the reviewed Uganda National Food and Nutrition Policy and other related nutrition policies.
  - Orient stakeholders on the revised Uganda National Food and Nutrition Policy.
- *Strengthen nutrition related standards and regulations.*
  - Review the regulations on salt iodization.
  - Review regulations on maternity protection.
  - Support the development of the Codex on complementary foods and food supplements.
  - Develop a regulatory framework for food fortification.
- *Strengthening inter-sectoral collaboration and public-private partnership in the designing and implementation of nutrition programs.*
  - Operationalise the National Food and Nutrition Council and its secretariat.
  - Conduct national, regional and district coordination and planning meetings.

Strategy 4: To strengthen advocacy and social mobilization for behavioural change.

- *Strengthen advocacy, social mobilization and communication at all levels.*
  - Develop a comprehensive nutrition communication strategy.
  - Develop and disseminate nutrition IEC materials using mass media including audio, visual and print media.
  - Promote nutrition campaign initiatives.

Strategy 5: Strengthen nutrition information management systems for monitoring and evaluating nutrition interventions programs.

- *Strengthen the regular collection of nutrition indicators in HMIS and other systems.*
  - Operationalise the Uganda Nutrition Information System.
  - Establish nutrition sentinel sites to assess nutrition trends.
  - Conduct basic and operational nutrition research.
  - Collaborating with UBOS in collection of nutrition indicators during annual food consumption surveys.
  - Conduct periodic nutrition surveys.

Indicators with targets

- The proportion of underweight in under five year children reduced from 16% to 10%.
- Vitamin A deficiency among children 6-59 months reduced from 20% to 10% and women of reproductive age from 19% to 9%.

- The proportion of stunted children below 5 years reduced from 38% to 32%.
- Vitamin A supplementation coverage increased for children aged 6-59 months from 60% to 80%.
- Deworming coverage for children 1-14 years increased from 60% to 80%.
- Iodine deficiency eliminated.
- The proportion of the households consuming iodised salt increased from 95% to 100%.
- The prevalence of anaemia among children decreased from 73% to 60%, women from 49% to 30% and men from 28% to 15%.
- The proportion of underweight women of reproductive age decreased from 12% to 6%.
- Exclusive breastfeeding at 6 months increased from 60% to 80%.
- Timely complementary feeding increased from 73% to 80%
- Accessibility to appropriate and gender sensitive nutrition information and knowledge increased to 100%.
- Nutrition services to health units and the community scaled up to 100%.

Implementation arrangements

In order to address the problem of malnutrition in Uganda a multi-sectoral approach is required. While the MoH and Ministry of Agriculture are the line ministries dealing with food and nutrition security it is necessary that other government ministries and departments, CSOs and the private sector should participate in the fight against malnutrition. The implementation of nutrition activities in Uganda shall be guided by the UFNP and the policy guidelines on infant and young child feeding developed in 2009[44].

At national level the Nutrition Unit at the MoH headquarters shall be responsible for coordinating nutrition activities and lead the process of formulating policies and guidelines relating to nutrition. In order to do this it shall work with other departments within the MoH, other government ministries and departments, the UNFNC and other stakeholders. The Unit shall provide technical support to the DHO including supervision. At district level the DHOs shall be responsible for coordination of nutrition activities. VHTs at community level shall be capacitated to provide the necessary nutrition education and other nutrition related interventions to members of the community and build capacity of the community to become active participants in nutrition programs.

Cluster 2: Control of Communicable Diseases

Communicable diseases account for about 54% of the total burden of disease in Uganda. Malaria, HIV/AIDS and TB are leading causes of ill health and mortality. HSSP II prioritized the prevention and control of communicable diseases in order to reduce the high national disease burden. The priority health care interventions in the Cluster of Prevention and Control of Communicable Diseases include: Prevention and Control of STI/HIV/AIDS, Prevention and Control of Malaria, Prevention and Control of Tuberculosis and elimination and/or eradication of some particular diseases such as Leprosy, Guinea Worm, Onchocerciasis, Trachoma, Lymphatic Filariasis, and Trypanosomiasis soil transmitted helminths and Schistosomiasis. The overall objective for the communicable diseases cluster is to reduce the prevalence and incidence of communicable diseases by at least 50% and thus contribute towards achieving the health related MDGs and the overall goal of the NDP. This section provides details for each disease in this cluster including the objectives, strategies and targets.

5.2.1.8 Prevent STI/HIV/TB transmission and mitigate the medical and personal effects of the epidemic.

Inside a quarter of a decade, HIV/AIDS remains a major health concern. Uganda has made great progress in HIV/AIDS service delivery and prevention since the advent of the epidemic in 1982. By September 2009, HIV

[44] Ministry of Health. (2009). Policy guidelines on infant and young child feeding. Kampala: Ministry of Health.MoH.

testing and counselling services were provided in 1215 of the 1229 eligible health facilities. Between July 2008 and June 2009, 968,157 pregnant women were tested and received their HIV status results. PMTCT services were provided in 66% of all facilities up to HC III while ART services were provided in more than 90% of health facilities up to HV IV by end of 2008/09 FY. By the end of September 2009, there were 200,213 receiving ARVs, 8.5% of them being children. The need to integrate these successful HIV services with others especially TB, RH and MCH is now a glaring issue.

However, albeit the above achievements recent evidence suggests that the epidemic has shifted from the single younger-aged individuals to older individuals aged 30–35, who are married or in long-term relationships. Multiple concurrent partnerships, extra-marital relationships, discordance and non-disclosure are among the key factors driving the spread of HIV in Uganda. There is limited programming for the Most At Risk Populations (MARPs) and yet conspicuous evidence highlights high prevalence rates among these populations[45].

There are also challenges in programme management and coordination of the national response to HIV/AIDS. The multi-sectoral approach brought in very many actors and stakeholders; which simultaneously created parallel systems for service delivery. This phenomenon weakened the existing health support systems. One of the examples is the Health Management Information System (HMIS) of the MoH that has been made more or less dysfunctional by partners and programmes setting up separate systems for recording, reporting, monitoring and evaluation requirements. While this was in response to the need for regular, timely, accurate and reliable data for programme reporting, monitoring and evaluation, it affected the functionality of the HMIS and subsequently rendered it difficult for MoH to ensure equitable and cost-effective availability of HIV/AIDS data for HIV programming and service delivery in the country as a whole.

In addition, in this era of the global recession, financial resources for the HIV response seem to have peaked and flattened. This calls for review of the health sector interventions to ensure that the available resources are optimally used and the GoU needs to allocate more funds for control of the HIV/AIDS epidemic; and contemporary programming should consider health systems strengthening approach.

Strategies and key interventions

- *Strengthen all aspects of HIV prevention namely reduction of sexual transmission of HIV, prevention of MTCT of HIV and prevention of HIV transmission through blood and blood products.*
    - Increase and sustain the distribution of free male and female condoms targeting among others discordant couples and people in stable relationships.
    - Scale up social marketing of condoms to general and high risk populations.
    - Review and harmonise all curricula and materials relevant for HIV and AIDS trainings and ensure that they incorporate strong elements of gender-responsiveness.
    - Provide life skills education targeting both youth in and out of school.
    - Provide HCT services in all HC II and higher level facilities and community HCT especially in high prevalence communities.
    - Promote and scale up safe male medical circumcision.
    - Extend the provision of PMTCT services to all HC IIIs and make it an integral component of antenatal services.
    - Screen all blood and blood products for HIV and other blood transmissible infections before transfusion.
    - Provide PEP to health workers and other eligible persons in line with the existing policy guidelines.
    - Train health workers in the management of STIs.
- *Improve access to quality HIV treatment and care services at all levels including treatment for opportunistic infections.*

[45] CRANE Study 2009

- Provide ART including paediatric ART to all those who are eligible.
- Monitor and improve ART treatment protocols and train health workers accordingly.
- Increase access to treatment of opportunistic infections, including STIs, TB and malaria
- Scale up supportive home based care to ensure that PLHIVs are treated and counselled at home.
- Review, update and disseminate therapeutic feeding guidelines and protocols for PLHIVs.
- Ensure that essential, efficacious, safe, and quality HIV related medicines are available and rationally used.
- Monitor and prevent emergence and transmission of HIV Drug Resistance.

- *Strengthen coordination, management, monitoring and evaluation of HIV programs at all levels*.
  - Facilitate the functionality of the national and decentralised coordination structures.
  - Establish and operationalise a comprehensive National HIV/AIDS monitoring and evaluation framework for proper monitoring and reporting.
  - Put in place a partnership framework to guide private sector participation in delivery of HIV/AIDS services.
  - Mainstream HIV/AIDS in planning and budgeting at national and local government level.
  - Strengthen multi-sectoral collaboration in control of HIV/AIDs i.e. ensure linkages of ACP/MOH with other departments, ministries and institutions to address issues like protection of OVCs, PLHIVs and other vulnerable, as well as establishment of income generating activities
  - Strengthen generation, and use of new evidence (including surveillance and operations research) to improve policy and programming for HIV/AIDS services
  - Develop/strengthen a national system for timely, accurate and complete recording and reporting of data to monitor and evaluate programme performance.
- *Strengthen the policy and legal environment for the national HIV/AIDS response.*
  - Finalise and disseminate the National HIV/AIDS Policy and ensure that it reflects a strong commitment to gender responsiveness.
  - Promote the development and implementation of the sectoral HIV/AIDS policies and guidelines.
  - Enact the HIV/AIDS Bill.
  - Print and disseminate the HIV/AIDS Policy and the HIV/AIDS Bill.
  - Collaborate with Ministry of Justice to train law enforcers on HIV/AIDS legislation and policy.
  - Strengthen IEC and community mobilisation initiatives with emphasis on the ABC principle.
  - Develop and print gender sensitive IEC materials on HIV prevention, treatment and management targetting most at risk populations.
  - Produce and broadcast HIV/AIDS programmes on major radio and television channels.

Indicators with targets

- HIV prevalence among pregnant women (19-24 yrs) attending antenatal clinics reduced from 7% to 4%.
- The proportion of people who know their HIV status increased from 38% to 70%.
- The proportion of people who are on ARVs increased from 53% in 2009 to 75% by 2015 among adults and from 10% to 50% in children less that 15 years of age.
- The proportion of children exposed to HIV from their mothers access HIV testing within 12 months

increased from 29% to 75%.

- The proportion of pregnant women accessing HCT in ANC increased to 100%.
- HCT services available in all health facilities including HC IIs, and at community level (Proportion of health facilities with HCT services; Proportion of community structures with HCT services)
- PMTCT services available in all health facilities up to HC III's and 20% of HC IIs (Proportion of health facilities with PMTCT services; Proportion of HC IIs with PMTCT services).
- ART services available in all health facilities up to HC IV and 20% of HC III by 2015. (Proportion of health facilities with ART services; Proportion of HC IIs with ART services).
- The proportion of males circumcised increased from 25% to 50% (denominator is number of all males in Uganda).
- Reduce the HIV prevalence from 6.7% to 5.5% in the general adult population (15-49 years).

5.2.1.9 Reduce the morbidity, mortality and transmission of tuberculosis.

The burden of Tuberculosis is still high with annual notifications at about 50,000 cases. Decentralized TB care called Community Based DOTS has been expanded to all districts. Challenges however remain: only 50% of cases nationwide are notified for various reasons; under staffing; lack of laboratory equipment; weaknesses surrounding community mobilisation; a high HIV prevalence, emerging drug resistant TB and that even though the cure rate target is at 85% globally in Uganda this has not been achieved – it is still at 73%.

There is need to consolidate the provision of CB DOTS, operationalise the public private mix (PPM) for TB control strengthen laboratory capacity and to integrate TB control in the District health system. The strategies and interventions described below are in line with the Global Plan to STOP TB strategy (2006-2015).

Strategies and interventions

- *Expand and consolidate high-quality DOTS services in all districts by 2015.*
  - Conduct case detection through quality-assured bacteriology.
  - Provide standardised treatment, with supervision.
  - Carry out contact tracing and tracing treatment interrupters.
  - Ensure uninterrupted drug supply and management system.
  - Sustain EQA coverage at all Diagnostic and Treatment Units (DTUs) in the districts.
  - Mobilise communities to participate in CB-DOTS in all districts with involvement of VHTs.
  - Provide TB preventive, diagnosis and treatment services among children in line with international standards (ISTC) and guidelines.
  - Operationalise the TB Infection Control plans at all DTUs nation wide.
- *Expand and strengthen TB/HIV collaborative activities, address MDR-TB and other challenges in special settings and populations.*
  - Consolidate implementation of TB/HIV services nationwide.
  - Operationalise programmatic management of Drug Resistant TB (DR-TB).
  - Develop a policy and legislation for drug resistance TB management.
  - Conduct drug sensitivity testing (DST) on all category II (Retreatment) TB cases reported by 2015.
  - Scale up TB control services in high risk population groups such as prisons, UPDF, Police, IDPs, and Refugees.
- *Contribute to the Strengthening of health systems.*

- Actively participate in efforts to improve sector-wide policy, service delivery, medicines and supplies management, information systems, health workforce, financing, Leadership & Governance at all levels of the NTLP.
- Adapt innovations from other fields: - integration within community, PHC outreach, social mobilization like HIV/AIDS, regulatory actions and financing schemes, PIA

- *Engage all care providers in TB care.*
  - Enhance public-public and public-private mix in TB control.
  - Maintain Village Health Teams (VHTs) participation and involvement in implementing DOTS as informal care providers in TB care.
  - Re-invigorate ACSM activities so as to increase Central and Local Government commitment, community awareness and demand for TB services.
  - Promote the application of International Standards of TB Care (ISTC).
  - Strengthen the Uganda Stop TB Partnership.
- *Empower people with TB and the communities to participate in TB care.*
  - Advocate at national and district level for increased resources allocation (dedicated budget) for TB control.
  - Mobilise communities to participate in CB-DOTS in all districts
  - Improve ACSM activities for TB using VHTs, CBOs, patient organisations, communities – allocate roles for each beyond formal health sector.
  - Develop patients' Charter for Tuberculosis care.
- *Enable and promote operational and other research.*
  - Train NTLP staff to perform and oversee OR.
  - Conduct research to develop new diagnostics, drugs and vaccines.
  - Promote evidence based interventions as well as the practice of turning evidence into action.
- *Build capacity for TB control.*
  - Carry out a training needs assessment on DOTS management for laboratory staff, clinicians and SCHWs at DTUs.
  - Train general health workers in performance improvement approach and quality in the eyes of the clients for TB control activities.
  - Train microscopists in peripheral laboratories.

Indicators with targets

- TB case detection rate increased from 57.3 to 70%.
- TB cure rate increased from 32% to 80% (Treatment success to 85%).
- TB associated death rate reduced from 4.7 to 2.5%
- The proportion of TB cases on supervised DOT increased from 48% to 100%.
- DST uptake among smear positive Relapse cases (CAT II) increased to 75%.
- High False Negative (HFN) prevalence at DTUs reduced to less than 5% in all districts.
- Proportion of TB patients tested for HIV increased from 71% to 100%
- Proportion of TB/HIV patients started on cotrimoxazole increased from 88 to 100%

- Proportion of TB/HIV patients started on ART increased from 18.5% to 50%
- Proportion of MDR TB patientsstarted on treatment increased from 0% to 100%

5.2.1.10 Sustain the elimination of leprosy in all the districts.

During HSSP II, the elimination status of prevalence of less than 1 leprosy patients per 10,000 populations which was achieved in 1994 nationally and a system of monitoring leprosy elimination at national and district levels have been maintained. Rehabilitative services like foot wear, prosthesis and socio-economic activities for persons affected by leprosy has been maintained in all the six national centres. This success could be hampered by elimination of the position of District TB and Leprosy Supervisors (DTLS) during the Local Government restructuring exercise with the potential to lower the quality of support supervision to units and sustaining knowledge and skills for Leprosy amongst the general health workers with reduced prevalence remains a challenge.

There is need for sustained funding for leprosy control activities at national and district level as well as for establishing at least one Health Centre III per HSD for continued diagnosis and treatment of leprosy patients as an integral part of health care. This will increase case detection, reduce delay in diagnosis and further reduce disabilities amongst new cases.

Strategies and key interventions

- *Strengthen the capacity of health workers to diagnose and treat leprosy cases.*
  - Train health workers in diagnosis, treatment and referral of leprosy cases.
  - Equip program officers and managers with skills for advocacy, resource mobilisation and leadership.
  - Create awareness among community members to identify and refer cases of leprosy to health facilities.
  - Promote self care among persons affected by leprosy.
- *Conduct a sustained leprosy elimination and treatment campaign.*
  - Conduct active case finding in high burden areas.
  - Carry out systematic surveillance of contacts of new leprosy cases.
  - Build synergies with CBR teams at district and sub-county levels to address the rehabilitation needs of people with rehabilitation needs after completion of leprosy treatment.
  - Procure and distribute MDT and rehabilitative appliances.
  - Conduct surveillance for drug resistance.
  - Conduct periodic examination of school children

Indicators with targets

- The prevalence of leprosy reduced to less than 1 case per 10,000 people.
- At least one “Skin Clinic” per Health Sub District (HSD) held on a weekly basis in all HSDs across the country.
- The rate of grade II disability in newly diagnosed leprosy cases reduced to less than 5 per cent.

5.2.1.11 Reduce the morbidity and mortality rate due to malaria in all age groups.

Malaria remains one of the major causes of morbidity and mortality in Uganda. During HSSP II progress was made in terms of seeking treatment within 24 hours after the onset of fever as well as coverage of IRS, ITNs and availability of antimalarials in health facilities at all levels. These modest gains were underpinned

by several challenges and constraints such as: poor coordination and harmonization of partners to embrace the "three ones" principle; inadequate procurement and delayed delivery of malaria commodities especially ACTs (Coartem); inadequate trained health workers in health facilities; and weak laboratory infrastructure for malaria diagnosis among other issues. In the current strategic plan, the sector will focus on a rapid scale up for impact, providing an enabling environment for implementation of key Malaria interventions. There will also be deliberate efforts to implement a comprehensive policy on malaria diagnostics and treatment, strengthen the procurement and delivery of malaria commodities, and strengthen RBM coordination mechanisms as well as M&E and general health systems. The goal for this component is to halt by 2015 and begin to reverse the incidence of malaria and thereby minimise the social effects and economic losses attributable to malaria in Uganda.

Strategies and interventions

- *Strengthen measures to control malaria transmission.*
  - Procure and distribute LLINs and contribute to achieving universal coverage.
  - Expand coverage of indoor residual spraying to both epidemic prone and endemic districts, as well as to institutions.
  - Improve environmental control methods for malaria'(propose specific mechanisms)
  - Ensure malaria epidemic preparedness and response.
- *Strengthen the implementation of a comprehensive policy on malaria diagnostics and treatment.*
  - Promote effective case management of malaria in all population groups including pregnant women and underf-five year children.
  - Expand parasitological diagnosis up to HC IIIs, and use of RDTs up to HC IIs and community level.
  - Ensure that all pregnant women access IPTp and ITNs at service points.
  - Strengthen home based management of fevers through VHTs for prevention and management of cases at community level.
- *Strengthen coordination and management of malaria activities in the country.*
  - Strengthen the RBM partnership at national level
  - Facilitate the functionality of decentralized coordination structures like NGO fora.
  - Strengthen multi-sectoral collaboration in control of malaria i.e. to ensure linkages of Malaria programme/MOH with other departments, ministries and other institutions.
- *Strengthen IEC/BCC for malaria prevention and control*
  - Design and print gender sensitive IEC/BCC materials for malaria control and prevention.
  - Distribute IEC/BCC materials for malaria prevention.
  - Promote the use of electronic and other media in prevention and management of malaria.
  - Promote involvement of NGOs and the private sector in malaria control.
- *Build the capacity of health workers for malaria control, prevention and treatment.*
  - Train and supervise health workers in the management of malaria.

Indicators with targets

- Reduce the prevalence of malaria among under fives from 44.7% to 20%.
- The proportion of under-fives with fever who receive malaria treatment within 24 hours from a VHT increased from 70% to 85% by 2015.

- The proportion of pregnant women who have completed IPT2 uptake increased from 42% to 80% by 2015.
- The percentage of under-fives and pregnant women having slept under an ITN the previous night increased from 32.8% to 80% and from 43.7% to 80%
- Proportion of households sprayed with insecticide in the last 12 months increased from 5.5% to 30% by 2015.
- The case fatality rate among malaria in-patients under five reduced from 2% to 1% by 2015.
- Proportion of households with at least one ITN increased from 46.7% to 85% in 2015.
- The percentage of public and PNFP health facilities without any stock outs of first line anti-malarial medicines increased to 80% throughout the strategic plan period.
- The percentage of government and PNFP health centres IIs and IIIs without stock out of rapid diagnostic tests.
- 100% of planned RBM partnership review meetings held.

Implementation arrangements for communicable conditions

The MoH, through the Department of National Disease Control, will be responsible for coordination of activities aimed at the control of STIs/HIV/AIDS, tuberculosis and malaria. The Department will work with the entire health sector and other government departments including NGOs in development of policies and guidelines for the prevention and control of communicable diseases. The Department of National Disease Control will work specifically with disease programmes in these efforts namely:

- The National Malaria Control Programme for the prevention and control of malaria.
- The National TB and Leprosy Control Programme for tuberculosis and leprosy.
- UAC for STIs and HIV and AIDS.

These disease programmes will take the lead in the coordination and implementation of their respective diseases. At district level the responsibility for coordinating and implementing communicable disease control programmes will be with the DHO who will in turn support and provide guidance to HSDs to develop their annual operational plans and budgets. At community level the VHTs will play an important role in the mobilisation of their respective communities for the prevention and control of communicable diseases.

Diseases targeted for elimination

There are a number of diseases that have been targeted for elimination or eradication by the international community. Uganda as a signatory to the treaties and conventions for the elimination of certain diseases is committed to these processes. The diseases targeted for elimination and/or eradication are as follows: poliomyelitis, guinea worm, onchocerciasis, measles, leprosy, trachomalymphatic filariasis, trypanosomiasis and schistosomiasis.

During the HSSIP emphasis will also be to strengthen crossborder disease control initiatives if Uganda will be on track to eliminate these diseases. The overall objective for this cluster of diseases is to achieve national and global targets for elimination or eradication of targetted diseases. There are gender dimensions affecting incidence, access to management and rehabilitation for several of these diseases. This section gives details on objectives, strategies, targets and implementation arrangements for the control and prevention of diseases targetted for elimination. Efforts will be made to incorporate gender responsiveness to programming as much as is possible.

5.2.1.12 Maintain the Guinea Worm free status of the country through maintenance of high quality post-certification surveillance.

During HSSP II period guinea worm status of no indigenous transmission was maintained and 100% containment of imported guinea worm patients was achieved, and Uganda was certified as free of Guinea Worm Transmission. With reduced conflict in northern Uganda it is hoped that this good situation will be maintained within the period 2011 to 2016 provided that there is continued financial support to the programme by the Government and Partners to maintain high quality surveillance in the post-certification period and repair and maintenance of non functional boreholes in the villages of formerly endemic districts, is undertaken and more sources of safe drinking water are provided especially in areas with former internally displaced peoples' camps that have returned to their homes.

Strategies and key interventions

- *Strengthen the existing surveillance systems for elimination of guinea worm*
  - Conduct and maintain high quality community-based surveillance through VHTs and sub-county supervisors.
  - Carry out prompt and in-depth investigation of all rumors of suspected cases and containment of any imported cases.
  - Implement an enhanced and nation-wide reward scheme for the improvement of sensitivity of surveillance.
  - Work with neighbouring countries to ensure eradication of guinea worm.
- *Expand the treatment and control of guinea worm in Uganda*
  - Manage and contain all cases of guinea worm.
  - Work with other stakeholders such as the Ministry responsible for water and CSOs to increase access to safe water supply in endemic districts and repair of broken down boreholes.
  - Control vectors through application of Abate to ponds and other water bodies.
- *Build the capacity of health workers for control and prevention of guinea worm.*
  - Provide refresher training for health workers involved in the treatment, control and prevention of guinea worm.
  - Conduct regular training of VHTs and community members.

Indicators with targets

- Timely reporting of guinea worm from villages at risk of importation maintained at 100%.
- All (100%) rumours of suspected guinea worm cases investigated.
- Case containment of imported guinea worm cases maintained at 100%.
- A MoU signed with neighbouring countries on elimination of guinea worm.

5.2.1.13 Eradicate onchocerciasis and its vector in all endemic districts in Uganda

Onchocerciasis is endemic in 29 districts of Uganda mainly those bordering the Democratic Republic of Congo, where more than 2. 5 million people are at risk of acquiring the disease. During HSSP II 100% of all affected communities were treated with more than 75% of all eligible individual receiving the drug. In addition, 90% of endemic districts integrated CDTI activities within their district health plans.

In spite of these successes, challenges remain for the control of onchocerciasis: districts have only continued to contribute minimally to CDTI activities due to inadequate funds at this level; as the burden of onchocerciasis is progressively reduced, policy makers and health service managers reduce the financial and other logistical inputs for CDTI support; inadequate motivation and the presence of many community development and health interventions constrain community medicine distributors (CMDs). As a result, the CMDS fail to do adequate community mobilization. There is therefore a need for sustained advocacy for CDTI implementation at all levels and to integrate implementation and supervision of all community interventions.

Strategies and interventions

- *Strengthen IEC activities for the control and elimination of onchocerciasis at all levels.*
  - Conduct advocacy campaigns for CDTI support at all levels.
  - Develop and print IEC materials on onchocerciasis prevention and treatment and distribute them in all endemic districts.
- *Conduct capacity building at district and community levels and in schools for prevention and management of Onchocerciasis.*
  - Train health workers and teachers at district and lower levels on onchocerciasis prevention and treatment.
  - Scale up the role VHTs in onchocersiasis control and prevention in all endemic districts.
- *Expand treatment and vector elimination in all endemic districts.*
  - Implement integrated control with other neglected tropical diseases and other health interventions such as LLIN and IRS.
  - Conduct biannual treatment and vector elimination in all endemic districts.
  - Promote CDTI for the control of onchocerciasis.

Indicators with targets

- Simulium nivae eliminated in all endemic districts in Uganda.
- At least 75% therapeutic coverage in all affected communities and 100% geographic coverage achieved in endemic districts.
- CDTI activities integrated within their district health plans in all endemic districts to sustain integration.

5.2.1.14 Achieve the global target for the elimination of trachoma.

Uganda is a signatory to the WHO alliance for the Global Elimination of Trachoma (GET) by 2020. Trachoma is known to be endemic in 24 districts where about 700,000 children below the age of 10 years have active disease and about 7 million people are at risk of being infected. Predominantly trachoma affects people with poor access to water, sanitation and health services. It is also estimated that overall, 47,000 people in Uganda are blind from various forms of trachoma.

During HSSP II a survey was done to quantify the burden of trachoma in 19 districts. The prevalence of active and non-active Trachoma in all the surveyed districts was more than 20% and more than 4%, respectively, which are above the threshold set by WHO for massive antibiotic distribution, with three being hyperendemic (TF>65%)[46]. The control of trachoma is hindered by shortage of HRH, low funding levels and low priorities accorded to the disability sector in general at all levels. As a signatory to GET Uganda is committed to eliminate trachoma through the SAFE strategy[47] as developed and recommended by WHO.

[46] Ministry of Health. (2007). *Trachoma Control Strategic Plan 2007-2010.* Kampala: Ministry of Health

[47]SAFE is an acronym for a comprehensive strategy which combines treatment with public health education and environmental health

Strategies and interventions

- *Build the capacity of health workers to provide services to patients suffering from trachoma.*
  - Train lid rotation surgeons to increase access to trachoma treatment.
  - Provide requisite equipment for performing surgery.
  - Improve accessibility of the blind and visually impaired to existing rehabilitation programmes.
- *Build the capacity of schools and communities for prevention and control of trachoma.*
  - Train teachers and VHTs on the prevention, control and treatment of trachoma.
  - Teach children in schools on facial hygiene practices to prevent spread of infection.
  - Promote family sanitation and improved water supply through the school health programs to sustain prevention of trachoma.
- *Improve access to treatment for trachoma.*
  - Implement mass community distribution of tetracycline and azithromycin in all endemic districts to reduce prevalence.

Indicators with targets

- Prevention and control measures for trachoma *fully* integrated within the district work plans in all endemic areas during all years of the strategic plan.
- All endemic districts reached with mass distribution of Tetracycline and Azithromycin during the years of the strategic plan.
- The provision of surgical services to patients with trichiasis increased from 10% to 30% by 2015.
- Number of lid rotation surgeons trained.

5.2.1.15 Reduce and ultimately interrupt transmission of the disease in all endemic communities through the use of chemotherapy with Ivermectin and albendazole.

During HSSP II mass medicine administration was scaled up from 2 pilot districts to 24 districts with a population of 7.2 million people being reached. Disability management initiated, in the form of *hydrocelectomies and lymphoedema managem*ent, was undertaken in two districts. A training of trainers' manual, field guide for Community Medicine Distributors, Registers and IEC materials were developed, printed and distributed. The major challenges included lack of funds for mass medicine distribution (MMD) at district level and insecurity in some districts. There is still need of mapping for lymphatic filariasis in those districts where it has not yet been done; Scaling- up of MMD to cover all the eligible districts and to develop a comprehensive disability management programme to be implemented alongside MMD.

Strategies and key interventions

- *Improve access to chemotherapy, disability management programmes and control measures in all endemic districts.*
  - Procure and distribute ivermectin and albendazole in all endemic districts through integrated NTD control.
  - Conduct mapping of areas for lymphatic filariasis in districts where it has not been done.
  - Develop and implement a comprehensive disability management programme.
  - Integrate control activities for lymphatic filariasis into district workplans and with other control strategies such as LLINs.

improvements: S: Surgery; A: Antibiotics; F: Face washing; and E: Environmental change.

- *Strengthen IEC activities for the control and prevention of lymphatic filariasis.*
  - Develop, print and disseminate ender sensitive IEC materials on prevention and control of lymphatic filariasis.
  - Engage VHTs and other community members in creating awareness about lypmphatic filariasis at community level.

Indicators with targets

- Therapeutic coverage for the affected people with single annual dose of Ivermectin and Albendazole increased from 93% to 100% by 2015.
- Mapping of areas with lymphatic filariasis completed in all endemic districts conducted by 2011/12.
- Morbidity and disability associated with lymphatic filariasis reduced by 25% by 2015.

5.2.1.16 Eliminate sleeping sickness as a public health problem in Uganda.

During HSSP II, the MoH in consultation with Ministries of Agriculture developed a draft national policy and plan of action on control of tsetse & trypanosomiasis. Seven (7) new sleeping sickness diagnostic and treatment centres were established and operationalised. Over 100,000 people were screened for sleeping sickness in the newly affected districts (Soroti, Kumi and Kaberamaido) and drugs for sleeping sickness were availed 100% of the time. However, there is lack of transport for the surveillance staff in the field; inadequate Social mobilization; graduall threatening of geographical overlap of the chronic disease with the acute disease and resistance to Melarsoprol (Mel.B) is escalating year by year.

There is therefore need to strengthen disease surveillance and community participation and mobilize financial resources for programme implementation. During HSSP II, the focus was on scaling up efforts to interrupt transmissions through integrated vector management and active case detection and management.

Strategies and key interventions

- *Strengthen the capacity of health institutions to control and prevent sleeping sickness.*
  - Train health workers in control and prevention of sleeping sickness.
  - Set up surveillance systems for sleeping sickness.
- *Improve access to drugs for the control and treatment of sleeping sickness.*
  - Conduct mass chemoprophylaxis of human populations.
  - Conduct active screening of communities at risk to identify patients at an early stage.
  - Procure adequate quantities of NECT for effective management of sleeping sickness.
- *Strengthen advocacy and social mobilisation at all levels.*
  - Develop and disseminate IEC materials using different media channels.
  - Advocate for an increase in resources allocated for the control and prevention of sleeping sickness.
  - Strengthen sleeping sickness control and management at community level using VHTs.

Indicators with targets

- Access to diagnostic procedures and treatment of sleeping sickness for communities to increase from 40% to 80% by 2015.

5.2.1..17 Reduce morbidity caused by the worms by decreasing the worm burden among communities

The implementation of HSSP II focused on scaling up core interventions to reach the new population at risk in addition to re-treatment of previously treated populations in both the communities and schools. During HSSP II control was scaled up from 20 districts to cover 42 districts and it was integrated with Child Days plus (CDP). Capacity building for school teachers and community medicine distributors (CMDs) for mass chemotherapy has continued. A number of health units in geographical areas which don't qualify for mass chemotherapy, were stocked with praziquantel and albendazole for selective chemotherapy. IEC materials were designed, produced and distributed to schools and communities in affected districts for social mobilization.

Control is however still faced with some challenges such as: Inadequate funding, particularly at the district level to facilitate the implementation of activities that lead to mass chemotherapy; and inadequate manpower at the health unit level to monitor, evaluate and supervise implementation of the programme. There is need for a comprehensive programme on sanitation and domestic water sources that should be initiated and implemented alongside mass chemotherapy; improving staffing levels at health units should be stepped up and funding increased for the programme particularly at the district level.

Strategies and interventions

- *Strengthen advocacy and social mobilisation at all levels for the control and prevention of schistomiasis.*
  - Develop and disseminate IEC materials on schistosomiasis.
  - Integrate schistosomiasis control with child plus days.
- *Improve access to treatment and control of schistosomiasis.*
  - Implement periodic mass chemotherapy at community level.
  - Conducting systematic regular treatment in school-age children at risk of morbidity.
  - Conduct selective vector (snail) control.
- *Capacity building in communities and schools to address the prevention and control of Schistosomiasis.*
  - Orient VHTs and teachers in the prevention and control of schistosomiasis.
  - Provide IEC materials to VHTs and schools on prevention and control of schistosomiasis.

Indicators with targets

- Coverage with mass chemotherapy in all the endemic districts increased from 74% to 100% by 2015[48].
- All endemic districts integrate prevention and control measures within the district work plans during all the years of the strategic plan.

5.2.1.18 Reduce morbidity and mortality due to Leishmaniasis among the endemic communities

The control of this disease in the area where it is endemic in the country was undertaken by Medicins Sans Frontiers (MSF) of Switzerland between 2000 and 2006 when they (MSF/Switzerland) relocated to Kacheliba, Kenya, leaving a vacuum until August 2007 when the Drugs for Neglected Diseases Initiative (DNDi) took over the programme at the request of the MoH. DNDi is currently supporting control activities in order to attract patients for a drug combination study at Amudat Hospital. Leishmaniasis is the collective name for a number of diseases which have diverse clinical manifestations. The form that is most deadly, visceral leishmaniasis (VL) is the one that is endemic in Uganda. This disease (VL) if left untreated, invariably leads to death, thus making early diagnosis and treatment a matter of paramount importance. The circumstances of the transmission of this disease are continually changing in relation to environmental, demographic and human behavioural factors. Changes in the habitat of the natural host and vector, HIV Infection, and the Consequences of conflict,

[48]This is based on 9 districts in 2008/09.

all contribute to the changing leishmaniasis landscape. Tools available for the control of the disease are not properly validated. The sector will work towards reducing morbidity and mortality due to Leishmaniasis among the endemic communities, through empowering the endemic communities to participate in the prevention and control of the disease.

Strategies and interventions

- **Strengthen the control and prevention strategies for leishmaniasis**
  - Deploy Intergrated vetor Management (IVM), using, e.g. ITNs.
  - Conduct mapping for the disease to establish its magnitude and extent in the country.
  - Conduct social mobilization and advocacy campaigns.
  - Develop National and District Capacity for the prevention and control of the disease

Targets

- The magnitude and full extent of the disease in the country is established by 2010/2011
- Increase early case detection to 60% by 2015.

Implementation arrangements for diseases targeted for elimination

The Department of Community Health in the MoH shall coordinate this prevention and elimination and shall work with other departments within the MoH and the entire health sector to develop policies and guidelines for the diseases targetted for elimination or eradication. CSOs and other government sectors shall be involved. It will have responsibility as well to provide technical support and supervise the DHOs which will in turn supervise and support lower level efforts. The VHTs at community level will be capacitated to educate members of the community about the control and prevention of diseases targeted for elimination.

Endemic, emerging and re-emerging Zoonotic Diseases

5.2.1.19 Reduce the morbidity and mortality due to endemic, emerging and re- emerging zoonotic diseases

Globally, in the last 15 years almost all newly emerging and re-emerging human infections have been of animal origin or zoonotic in nature. There are over 150 known zoonotic diseases with potential for transmission and spread from animals to humans. The most notable are; Highly Pathogenic Avian influenza (H5N1), pandemic influenza H1N1, Severe Acute Respiratory Syndrome (SARS), Bovine Spongiform Encephalopathy / variant-Creutzfeld-Jakob Disease (Mad Cow Disease). In Uganda, outbreaks of Ebola Heamorrhagic fever (HF) and Marburg HF have occurred with increasing frequency in the last five years.

There has also been a re-emergency of anthrax, mange and plague which occur sporadically in wildlife and domestic animals and they occasionally spill over and spread into the human populations. At the same time long established zoonotic diseases such as rabies, bovine TB, brucellosis, cysticercosis and hydatidosis have remained endemic among the population in most developing countries including Uganda. There is need to build enough capacity in the country for early detection, prevention and control of these newly emerging and endemic zoonotic diseases as well as to reduced animal-related ill health among the Ugandan population.

Strategies and interventions

- Strengthen the policy environment for prevention and control of zoonotic diseases.
  - Develop and disseminate zoonotic diseases prevention and control technical guidelines and operational manuals.
- Strengthen IEC activities on the major zoonotic diseases of public health importance.

- o Train health workers, VHT together with Veterinary Extension Workers and wildlife staff in creating awareness about these diseases.
- o Develop and disseminate IEC materials on zoonotic diseases to raise awareness about their transmission, animal and human risk factors and appropriate means of prevention and control.
- o Give prominence to rabies prevention and control through commemoration of World Rabies Day on 28th September annually.

- Develop capacity for collaboration, investigation and management of zoonotic diseases.
  - o Conduct in-service training for health workers, veterinarians and wildlife staff and other stakeholders.
  - o Conduct operational research, situational analysis and field assessment to identify risk factors and disease burden for selected zoonotic diseases in the country.
  - o In collaboration with laboratory services, develop diagnostic capacity for selected zoonotic diseases at HC IVs, general hospitals and RRHs.
  - o Promote closer collaboration with animal and wildlife health sectors, research institutions and laboratories to embrace the concept of "One Health" as a viable strategy to address existing and emerging zoonotic disease threats.

Specific targets

- Zoonotic diseases technical guidelines, developed and disseminated by 2011/2013.
- The proportion of General Hospitals and RRH conducting proper laboratory diagnosis of brucellosis increased by 20% and 50% by 2015 respectively

Implementation arrangements for zoonotic diseases and diseases targeted for elimination

The Department of Community Health in the MoH shall coordinate this prevention and elimination and shall work with other departments within the MoH and the entire health sector to develop policies and guidelines for the diseases targeted for elimination or eradication. The department will liaise closely with ESD, UVRI and CPHL in prevention and control of zoonotic disease. CSOs and other government sectors shall be involved. It will have responsibility as well to provide technical support and supervise the DHOs which will in turn supervise and support lower level efforts. The VHTs at community level will be capacitated to educate members of the community about the control and prevention of zoonotic diseases and diseases targeted for elimination.

Cluster 3: Non-communicable diseases/conditions cluster

Uganda is experiencing dual epidemics of communicable and non-communicable diseases. The Cluster on Prevention and Control of Non-Communicable Diseases/Conditions. These include Cardiovascular Diseases, cancers, Diabetes, Chronic Obstructive Pulmonary Diseases and sickle cell disease. This section examines each of these elements.

Non-communicable diseases, particularly diabetes, cardiovascular diseases, cancers, chronic respiratory diseases caused over 60% of all deaths globally in 2005 (estimated at 35 million deaths). Total deaths from NCDs are projected to increase by a further 17% over the next 10 years. Low-income countries like Uganda are the worst affected by these diseases, which are largely preventable by modifying their common risk factors through Primary Health Care interventions. Uganda lacks precise data on the prevalence of NCDs and their risk factors. During HSSP II, the MoH initiated the process of conducting a baseline study on risk factors and magnitude of non-communicable diseases in the country. The survey is yet to be completed due to financial constraints. Among the *challenges to* NCD control in Uganda are; lack of baseline data on the prevalence of NCDs and their risk factors; lack of community awareness; high prevalence of unhealthy

lifestyles; inadequate capacity of the existing health system to provide quality NCD services, and the high cost of medicines/supplies for treatment.

The lack of baseline data has delayed the formulation of evidence based national NCD policies and strategies as well as the development of a comprehensive and integrated action plan against NCDs in our population. *The priority actions shall include; obtaining baseline data through a national NCD survey, raising public awareness and promoting healthy lifestyles; screening for early disease detection and provision of quality treatment; surveillance of NCDs and their risk factors in the communities. The overall objective of the non-communicable diseases cluster is to reduce* the morbidity and mortality attributable to NCDs through appropriate interventions targeting the entire population of Uganda.

5.2.1.20 Prevent Type 1 and Type 2 diabetes and reduce morbidity and mortality attributable to diabetes and its complications.

Almost 80% of diabetes deaths occur in low- and middle-income countries such as Uganda. WHO projects that deaths related to diabetes will double between 2005 and 2030. In Uganda precise data on the prevalence of diabetes is lacking. Data available is incomplete and facility based. Type 2 Diabetes accounts for over 80%of the total cases of diabetes in Uganda and this is related to unhealthy lifestyles. Type 1 Diabetes is largely under diagnosed and is associated with a high mortality. The existing interventions are curative oriented and are poorly coordinated and supported. The major challenges facing the control and prevention of diabetes in Uganda include insufficient adequately trained human resource, lack of standards and guidelines for diabetes interventions and inadequate supply of screening, diagnostic and monitoring equipment. Community awareness on diabetes and its risk factors is unacceptably low hence it affects the choice of therapy. Medicines for the treatment of diabetes are expensive and are not readily available particularly at lower health level facilities. The World Diabetes Foundation (WDF) has extended support to the MOH to establish a National Diabetes Prevention and Control Program. This program is supporting improvement in the quality of diabetes care through the training of health workers, supplying diagnostic and monitoring equipment and developing a tool for improved data collection and documentation. The program is also supporting the on-going national survey on Diabetes. During HSSIP there will be a need to strengthen the existing program particularly in the areas of improving data collection, increasing public awareness, diabetes control and prevention, early diagnosis and quality treatment and care for diabetes and its complications.

Strategies and interventions

- *Strengthen public awareness programmes for the control, prevention and management of diabetes in Uganda.*
  - Develop a gender responsive community oriented communication strategy to increase public awareness about diabetes and its associated risk factors utilizing appropriate media channels.
  - Commemorate World Diabetes Day annually.
- *Promote healthy lifestyles in schools, work places and communities.*
  - Develop and implement gender responsive national guidelines on physical activity, appropriate diet, tobacco and alcohol use.
  - Design and implement community-based interventions for diabetes prevention and control.
  - Conduct targeted screening for populations at risk in selected workplaces.
- *Improve early diagnosis, treatment and care of diabetes and related complications including its prevention.*
  - Establish integrated clinics for NCD prevention and control from HC IV and above.
  - Supply clinics with appropriate equipment, medical supplies and medicines for NCD screening, diagnosis, treatment and care.

- Establish specialised services for attending to children with Type 1 diabetes from HC IV and above.
- Screen pregnant women to facilitate earlier identification, treatment and diagnosis of gestational diabetes.
- Develop and implement gender responsive guidelines for NCD screening in patients on Anti retroviral therapy (ART).
- Conduct needs assessment for prevention and control of diabetes in health facilities at all levels
- Develop and implement a gender responsive package for prevention, screening, diagnosis, treatment and care of diabetes and its complications at different levels of health care in schools
- Conduct appropriate training courses for health workers in diabetes prevention, care and counseling at all levels of health care

- *Strengthen partnerships for the control, prevention and treatment of diabetes.*
  - Establish partnerships and strengthen collaboration with key stakeholders e.g. Ministries, Health Development Partners, CSOs, NGOs, the private sector, professional organisations, to create an enabling environment for diabetes interventions and to scale up diabetes prevention and control activities.
  - Organise annually the National NCD Symposium for key NCD stakeholders.
- *Establish and strengthen routine data collection systems for diabetes.*
  - Integrate diabetes surveillance within the existing disease surveillance system.
  - Review existing HMIS tools to accurately capture the burden of diabetes in the country.
- *Conduct a national survey to obtain baseline data on the prevalence of diabetes and its risk factors as well as their social determinants.*
- *Develop standard diabetes files for use in all health facilities.*

Indicators with targets (Baseline surveys to be conducted)

- Public awareness on diabetes and risk factors increased by 5% by 2015.

- *Percentage of HCIVs and hospitals equipped with equipment to diagnose diabetes increased by 5% by 2015.*
  - Standard diabetes files utilized in 30% of health facilities HCIVs and hospitals by 2015.

5.2.1.21. Prevent cardiovascular and related diseases and reduce morbidity and mortality attributable to CVDs

In Uganda CVDs are on the rapid increase. Records at the Uganda Heart Institute have shown an increase in outpatient attendance due to heart related conditions of 500% over 7 years (2002 – 2009). In Mulago Hospital there has been an increase in cases of ischaemic heart disease from 1.8% out patient in 2002 to 7% in 2009. Hypertension is the leading cardiovascular disease accounting for over 50% of all cases seen annually. People in low- and middle-income countries are more exposed to risk factors leading to CVDs and other non-communicable diseases and are less exposed to prevention measures than people in high-income countries. Modifiable CVD risk factors include physical inactivity, inappropriate diets which are high in calories, salt and sugar but low in fruit and vegetable content, alcohol abuse, tobacco consumption, high blood pressure, high blood sugar, and obesity. Non modifiable risk factors include genetic predisposition, age and black race. In 2009 The Uganda Heart Institute became an autonomous body under the MoH. It is mandated to provide super-specialized tertiary cardiovascular and chest surgical care. At the RRH and general hospitals CVD health care services are being provided by specialist physicians and medical officers respectively. During the HSSIP priority will be given to creating awareness about CVDs, improving access to prevention and treatment and

ensuring that data is available for informing programming.

Strategies and interventions

- *Create awareness about CVDs and associated risk factors amongst policy makers and the community.*
  - Conduct community sensitization about CVD and associated risk factors.
  - Develop national standards and guidelines for CVD prevention and management.
- *Improve access to early diagnosis, quality treatment and care of CVDs and their complications including prevention.*
  - Develop/review and implement management guidelines for CVDs and related diseases.
  - Conduct Continuing Professional Development sessions on CVDs.
  - Avail equipment, essential medicines and supplies for management of CVDs.
  - Develop and implement national guidelines for interventions against CVD risk factors.
  - Conduct targeted screening for populations at CVD risk in selected workplaces.
- *Strengthen data collection systems for CVDs.*
  - Develop and avail appropriate tool for data collection at all health facilities.
  - Conduct a National Burden of CVD survey and operational research on risk factors for CVDs

Indicators with targets by 2015

- Standards and guidelines for CVD prevention and management developed by 2014/15.
- Public awareness on CVDs and their risk factors increased by 10% by 2014/15.
- The percentage of health facilities from HC IV and above equipped to diagnose CVDs increased by 5% by 2014/15.

5.2.1.22 Establish a national framework for cancer control with emphasis on cancer prevention

The World Health Organization(WHO) estimates that the global cancer burden will increase by 6million between 2000 to 2020, most of this increase will be in the developing countries especially Sub Saharan Africa. Thirty percent of cancers in developing countries are related to infection, most cancer patients are young and in their prime as opposed to elderly population in the developed world. HIV has emerged as a single major factor in the recent accelerated burden of cancer in this region. Uganda is one of the countries with very high morbidity and mortality due to cancer. Kaposi sarcoma accounts for about 80% of all male cancer. In females cervical cancer is the commonest cancer since early periods but the incidence has increased tremendously, accounting for 30% of bed occupancy in the gynaecological wards at Mulago Hospital. Trend of cancer incidence for the last four decades has been upward. The most dramatic increase in cancers has been noted in cancers associated with HIV such as Kaposi's sarcoma, Non Hodgkin's lymphoma, Carcinoma of the cervix, Squamous cell carcinoma of the conjunctiva. The second factors responsible for the increase in cancer are lifestyle changes such as lung cancer (strongly related with tobacco) Hepatocellular carcinoma (related to consumption of alcohol, aflotoxin due to poor storage of grains and infection with hepatitis viruses). The third category of factors are nonspecific possibly linked to environmental change which has led to increase in cancers such as Hodgkin's lymphoma, Burkitt's lymphoma, Leukemia's, Hepatocellular carcinoma, and Stomach cancer.

Special mention should be made of cancers in childhood which have dramatically increased in the region without specific causes. The high morbidity and mortality due to cancer in the country is attributed to late disease presentation, reflecting lack of access to early diagnosis and treatment as a result of the poor status of cancer care system in the country. Further the cost of cancer treatment cancer in the country is out of

reach of many patients. Uganda, like many developing countries, has not been well prepared for the sudden burden of cancer it is now experiencing. The majority of these cancer cases however could be prevented or cured if detected early. The major challenges to cancer control in the country stems from lack of specific policy on cancer, the magnitude of the disease is unknown, lack of cancer awareness hence late disease presentation. During the HSSIP period the priority will be to create enabling policy environment for cancer control, raise level of awareness, promote cancer prevention and control, improve referral system, expand cancer registration and provide training for lower level health workers on cancer.

Strategies and interventions

- *Creation of an enabling policy environment for cancer prevention and control in Uganda*
  - Formulate national cancer control policy and National cancer control program.
- *Raise the level of cancer awareness in the country*
  - Develop a communication strategy for effective Information, Education and Communication on cancer for policy makers and the general public.
- *Strengthen initiatives that promote primary and secondary cancer prevention*
  - Tobacco control
  - Vaccination against hepatitis B
  - Screening for cervical cancer
  - Breast self examination
- *Establish a national infrastructure for patient referral and follow-up*
- *Expansion of cancer registration and establishing a National cancer registry data base*
  - Establish population based and facility based cancer registries
- *Training and capacity building for lower level health workers on cancer*
  - Develop guidelines and SOP focusing on prevention, early detection, early diagnosis and the cancer referral system.

Indicators with targets

- Cancer policy and National Cancer Control Program in place by 2013
- Increase in cancer awareness activities by 50 % by 2013
- Availability of cervical cancer screening in all Health centre IV country wide by 2015
- Establishment of two population based cancer registry and a national cancer data base by 2015
- Cancer guidelines and SOP for lower level training in place by 2013

5.2.1.23 Prevent chronic respiratory diseases and reduce morbidity and mortality attributable to COPD and asthma

Adult respiratory diseases, particularly chronic respiratory disease, constitute a major burden in terms of morbidity and mortality in the developing world. They contribute to work–limiting health problems, lost work days, and premature death resulting from delayed diagnosis and treatment. A strong case can also be made for moving resources in developing countries from expensive curative interventions to more cost–effective preventive interventions.

The burden of chronic adult respiratory diseases has been rising throughout the world, now including not only tuberculosis but also, chronic obstructive pulmonary disease (COPD) and asthma, and occupational lung

diseases. COPD, are often caused by environmental exposure to tobacco smoke or unvented biomass fumes. Since the bulk of mining and manufacturing activities have transferred to the developing world where controls on risky exposure are conspicuously lacking, occupational lung diseases, including silicosis and asbestosis present a particular problem.

Although various interventions are indicated for each of these disease categories, they can be costly and of limited efficacy in lowering premature mortality. In the developing world, preventive and therapeutic strategies may have greater societal effect than managing the diseases after they arise. Cost–effective interventions include smoking prevention and reduction programs to tackle both asthma and COPD. When disease strikes, educating local healers on the importance of initiating treatment early could translate into savings with respect to worker productivity and medical costs and also reduce fatalities.

Epidemiological data describing the burden of COPD and Asthma as wee as associated risk factors in the Ugandan population is lacking. There is a large evidence-care gap in the current management practice in Uganda which in addition is predominantly facility based. Community based interventions to prevent and mitigate the impact of COPD and Asthma are non-existent.

There is need to collect epidemiological data, initiate health promotional activities geared towards the prevention of COPD and asthma to improve the quality of care at all levels.

Strategies and interventions

- *Public awareness and advocacy for diabetes prevention and control*
- *Develop national policy and guidelines on COPD and asthma prevention and management*
- *Strengthen Implementation of Tobacco Control policies*
- *To create awareness about Chronic respiratory diseases and associated risk factors.*
- *To improve early diagnosis treatment and care.*
    - Conduct targeted COPD and asthma Continuing Professional Development sessions
    - Equip all health facilities with appropriate, cost effective diagnostic tools and ensure proper maintenance.
    - Avail essential medicines and supplies for management of COPD and asthma
- *To improve the quality of data collection and documentation.*
    - Develop and avail appropriate tool for data collection at all health facilities.
- *To promote operational research in Chronic respiratory diseases*
    - Conduct a National Burden of Chronic Respiratory Disease survey and operational research on common causes of COPD and asthma in the communities.
- *Inter-sectoral collaboration*
    - Encourage and Support operationalizaton of professional societies such as the Uganda Thoracic Society (UTS).

Indicators with targets

- Increased awareness on COPD and asthma disease and risk factors
- Improved diagnostic capacity and treatment at all levels of care
- Improved quality of data on COPD and asthma
- Increased quality operational research targeted to improve the prevention and management of COPD and asthma

5.2.1.24 Reduce the morbidity and mortality associated with sick cell disease.

In West African countries such as Ghana and Nigeria, the frequency of the sickle cell trait is 15% to 30% whereas in Uganda it shows marked tribal variations, reaching 45% among the Baamba tribe in the west of the country. At the Mulago Hospital Sickle Cell Clinic 460 new cases of sickle cell were diagnosed in 2005, 556 patients in 2006, 459 patients in 2007 and 459 patients in 2008. There is no accurate data on the prevalence of sickle cell in Uganda as only the few patients that report to Mulago hospital are registered. Public awareness about sickle cell is low. Sickle cell anaemia is a condition of importance to the health sector in Uganda particularly due to the high prevalence of the abnormal gene, the endemicity of malaria and the morbidity and mortality attributed to it. The sickle-cell gene has become common in Africa because the sickle-cell trait confers some resistance to falciparum malaria during a critical period of early childhood, favoring survival of the host and subsequent transmission of the abnormal haemoglobin gene. Although a single abnormal gene may protect against malaria, inheritance of two abnormal genes leads to sickle-cell anemia and confers no such protection. Malaria is a major cause of ill-health and death in children with sickle-cell anaemia. Sickle cell services are currently centered at the national teaching hospital. Regional facilities are yet to be established within the country. Training of appropriate manpower and procuring the required equipment is still a big challenge. Under the Sickle cell Initiative, patients , parents and well wishers have formed the Sickle cell Association which delivers community health education and counseling to persons living far from the national teaching hospital. Over the next 5 years priority will be given to raising awareness about the disease, formulating policies on management of sickle cell, capacity building and expanding access to services.

Strategies and interventions

- *Strengthen public awareness programmes for the control, prevention and management of diabetes in Uganda.*
  - Promote community education, including health counseling, and associated ethical and social issues.
  - Advocate for formulation of policies and guidelines for sickle cell prevention and management..
  - Increase access to sickle cell screening and diagnostic services
  - Establish Sickle cell clinics at every Regional Referral Hospital.
  - Equip Sickle cell clinics with basic facilities and equipment to conduct screening and diagnostic tests (CBC tests, Urinalysis and HB electrophoresis).
- *Improve the policy environment for management of sickle cell disease*
  - Formulate policies and guidelines on sickle cell disease.
    - *Build capacity to improve quality of sickle cell care*
  - Train health workers on sickle cell issues and management of sickle cell disease.
  - Strengthen in-service training on sickle cell disease.
- *Create and sustain partnerships for the control and management of sickle cell*
  - Encourage the formation of Sickle cell associations in very Regional Referral Hospital.
  - Establish partnerships and strengthen collaboration with key stakeholders e.g. ministries, health development partners, CSOs, NGOs, the private sector, professional organizations to create an enabling environment for sickle cell prevention and control activities.

Indicators with targets

- Policy and guidelines on Sickle cell disease developed by 2014/15.
- Sickle cell clinics established in 30% of Regional Referral Hospitals by 2015.

5.2.1.25 Decrease the morbidity and mortality due to injuries, common emergencies and disabilities from visual, hearing and age-related impairments.

Injuries, disabilities and rehabilitative health encompass conditions that result in an individual's deprivation or loss of the needed competency. This can be due to damage or harm done to or suffered by a person before or after birth. Such deprivation or loss of competency includes conditions like: deafness, blindness, physical disability and learning disability. Some challenges exist that deter the effective prevention and control of injuries, disabilities and rehabilitative health: understaffing, inadequate support to orthopaedic workshops, low priority accorded to disability at all levels and challenges of coordination of many different stakeholders with varying interests. There is need to address these issues.

Strategies and key interventions

- *Put in place preventive, promotive and rehabilitative interventions to reduce mortality and morbidity or disability caused by injuries.*
  - Create awareness at national, district and community levels about the prevention and management of injuries and disabilities through use of media and VHTs.
  - Promote the rehabilitation and construction of public and private facilities to make them accessible to people with disabilities.
  - Advocate for enforcement of protective legislation e.g. use of seat belts, policing drunken driving, restricted smoking among others.
  - Scale up the production of various types of assistive devices for people with disabilities.
  - Develop and disseminate guidelines on handling of trauma, disabilities and rehabilitation.
  - Strengthen intersectoral collaboration in the prevention and management of injuries and disabilities.
  - Conduct periodic studies to determine the burden of disability in Uganda which will inform the development of policies and interventions.
- *Improve access to health services by people with disabilities.*
  - Develop and disseminate a protocol for provision of services including reproductive health services to people with disabilities.
  - Rehabilitate health facilities to make them accessible to people with various forms of disabilities.
  - Orient health workers on control, prevention and treatment of injuries and disabilities.

Indicators with targets

- Hearing impairment reduced from 8% to 6% by 2014/2015.
- Visual impairment reduced from an estimated 0.8% to 0.7% by 2014/2015.
- Assistive devices provided to 80% of PWDs who need them by 2015.
- The proportion of the population reached with messages on disability prevention and rehabilitation increased to 80% by 2015.

5.2.1.26 Ensure increased access to primary and referral services for mental health, prevention and management of substance abuse problems, psychosocial disorders and common neurological disorders such as epilepsy.

Mental health problems and substance abuse disorders contribute 12.5% of the global burden of disease. The

burden is likely to be higher in Uganda due to effects of civil strife, the consequences of HIV/AIDS and increase in alcohol and drug abuse due to an inefficient and poorly enforced substance use control law. During HSSP II, there was an increase of mental health services at RRHs from 50% to 100% under SHSPP II; community access to mental health services increased from 20% to more than 50% and the proportion of HC IVs with at least one antipsychotic, one antidepressant and one anti epileptic medicine increased from 10% to 30%. There is a need to keep this momentum through increasing psychiatric staff numbers and by allocating more resources for purchase of essential mental health medicines.medicines. The mental health program also coordinates management of neurological disorders such as epilepsy which affects about 3% of the general population and contributes 70% of attendances at Mental Health Units. The implementation of mental health programmes is impeded by underfunding, stockouts of mental health and epilepsy medicines, delayed repeal of mental health law and negative attitudes of some managers which hinders integration of mental health into general services.

Strategies and interventions

- *Strengthen the legal and policy environment for provision of mental health services in Uganda.*
  - Repeal the Mental Treatment Act which is outdated.
  - Develop mental health policy and strategic plan.
  - Promote the rights of the mental ill.
  - Develop a community strategy for control and prevention of mental health problems.
  - Develop and implement an allcohol control policy and drug control master plan.
- *Improve access to mental health services.*
  - Develop and disseminate standards and guidelines for the integration of mental health into primary health care.
  - Integrate mental health services into primary health care.
  - Provide care for neurological disorders at primary care level.
  - Provide food for all unaccompanied mental health patients.
  - Provide essential mental health and anti-epilepsy drugs.
  - Ensure the availability of functional mental health units in all RRHs.
  - Provide a psychiatrist and other specialist mental health professionals for each RRH.
  - Provide alcohol and drug abuse treatment and rehabilitation services at all levels of care.
- *Build the capacity of health workers in provision of health services to the mentally ill.*
  - Orient health workers in mental health in order to address the negative attitudes of some managers.
  - Increase the number of Psychiatric Nurses and Psychiatrists being trained in health training institutions.
  - Provide basic training in mental health to general practitioners and health officers.
  - Provide refresher training for mental health and general health workers
- *Strengthen IEC messages create awareness about mental health including de-stigmatisation of the mentally ill.*
  - Develop and disseminate appropriate messages for improving community mental health.
  - Provide public education for demand reduction for alcohol and drug abuse.

Indicators with targets

- Mental Health Law enacted by 2011/12.
- Mental Health Policy finalised and operationalised by 2010/11.
- Operationalise Mental Health Units in all RRHs by 2010/11.
- Community access to mental health services increased from 60% to 80%.
- A community strategy for prevention of mental health problems developed by 2010/11.
- Services for alcohol and drug abuse management are available at HC IV by 2013/14.

5.2.1.26 Improve the oral health of the people of Uganda by promoting oral health and preventing, appropriately treating, monitoring and evaluating oral diseases.

Oral Health encompasses the positive aspects of good oral health, all oral conditions including dental caries, periodontal disease and derangement of the oro-facial tissues and other oral pathology including oral cancer. Some modest progress has been made during HSSP II in implementation of oral health: for example equipping HC IVs with dental units and putting in place aoperationising the national oral health policy. Progress has been slow because of among other reasons lack of dental equipment in most government hospitals and HC IVs; lack of dental infrastructure in many districts, especially the newly created ones; non- or under-utilization of many of the oral health care workers in the district PHC activities and lack of specialists in the dental field and lack of transport for support supervision. Thus there is need to budget for phased rehabilitation and construction of new infrastructure for oral health, especially in the newly created districts; equip the government health units with dental equipment should be done in phases, e.g. 5 health units per annum.

Strategies and interventions

- *Strengthen the policy environment for implementation of oral health interventions.*
  - Operationalise the oral health policy.
  - Develop, disseminate and implement oral health policy implementation guidelines.
- *Strengthen IEC activities on oral health.*
  - Operationalise the oral health policy.
  - Train VHTs to be involved in creating awareness about oral health.
  - Develop and disseminate IEC materials on oral health to raise awareness about oral health risk factors and appropriate means of oral health care.
- *Develop capacity for the delivery and management of oral/dental health conditionsservices.*
  - Conduct in-service training for dentists and other technicians, oral and non-oral health professionals.
  - Organise preventive oral health promotion programmes in primary schools and among people with disabilities.
  - Ensure fully operational oral health infrastructure at HC IVs, general hospitals and RRHs.
  - Develop, in collaboration with other sectors, a national water fluoridisation programme.
  - Generate data through oral health research to inform development of oral health interventions.
  - Integrate oral health into other health programmes.
  - Identify and develop collaborative approaches to initiatives that address oral disease common risk factors such as tobacco, sugar, alcohol, unsafe sex, chronic medication, and violence and vehicle accidents.

Specific targets

- Oral health policy implementation guidelines developed and disseminated by 2010/2012.
- The proportion of HCIVs with well equipped and functional dental units increased from 85% to 80% by .
- The proportion of the population with access to primary oral health care from increased from 20% to 80%.

5.2.1.27 Improve the quality of life of terminally ill patients and their families especially the home carers

Palliative care is an approach that improves the quality of life of patients and their families facing the problem associated with diseases not responsive to cure, through the prevention and relief of suffering by means of early identification, assessment and treatment of pain and other symptoms, physical, psychological and spiritual. Currently, very limited services are available. It is well-known that the burden of care for family members falls overwhelmingly on women and girls in the household, a role that is often unsupported and that has been documented to lead in some circumstances to the deterioration of the health of the carer, and in other circumstances in some girls having to drop out of school to play this role.

Strategies

- *Build the capacity for palliative care in collaboration with other stakeholders.*
  - Develop guidelines and standards for palliative care including for appropriate support to the carers.
  - Train health workers and male and female volunteers in palliative care.
  - Establish partnerships with community based palliative care providers including for their support.
  - Establish outreach palliative care services.
  - Integrate palliative care into the curricular of health training institutions.
  - Intensify public education on palliative care.
- *Improve access to palliative care.*
  - Provide palliative care in all hospitals and HC IVs.

Indicators with targets

- Guidelines and standards for palliative care developed.
- All hospitals and HC IVs providing palliative care.
- Adequate stocks of appropriate medication and supplies at palliative care centers are available.

Implementation strategy

In 2006 the MoH created the Programme for Non-Communicable Diseases which has the responsibility to coordinate the control and prevention of epidemics. The National Non-Communicable Diseases Programme will work with other Departments within the MoH, the private sector and CSOs to develop policies, strategies and guidelines for the control and prevention of NCDs. The responsibility to coordinate this programme at district level shall lie with the DHO.

Cluster 4: Sexual, Reproductive Health and Rights and Child Survival

5.2.1.28 Reduce mortality and morbidity relating to sexual and reproductive health, and rights

Maternal and child mortality rates in Uganda are quite high: MMR stands at 435/100,000 and IMR at 76/1,000. The proportion of deliveries by skilled personnel is still low at 34% and the provision of Emergency and Basic Obstetric and Newborn Care (EmONC) is limited. The CPR is low at 24% and the unmet need of FP is 41%.

Total fertility rate has remained high at 6.5. While a significant proportion of Uganda's population consists of adolescents, adolescent sexual and reproductive health services are limited and they do not address the needs of adolescents. Adolescent pregnancy stands at 23% (UDHS 2006). Maternal malnutrition, due to both macro and micro deficiencies, still contribute prominently to still births, maternal and child morbidity and mortality. Sexual and Gender-Based Violence is a major concern that impacts on maternal morbidity and mortality. The right to Sexual and Reproductive Health and Rights is important as it aims at reducing the MMR, U5MR and TFR, all key elements of the health MDGs. There is international consensus on the interventions to bring these statistics down. The challenge remains with the implementation of these interventions in a coordinated and sustained fashion. As has been highlighted in Chapter 3 implementation of interventions to address maternal health problems in Uganda is hampered by inadequate funding of the interventions, lack of HR, medicines and supplies and appropriate buildings and equipment including transport and communication equipment for referral. The lack of decision making at household level by women affects their health seeking behaviour including during pregnancy.

Strategies and interventions

- *Strengthen IEC activities on sexual and reproductive health*
  - Develop, print and disseminate evidence based, gender sensitive IEC materials.
  - Through VHTs, create awareness about sexual and reproductive health including pregnancy surveillance, family planning among community members with a special focus on men.
  - Sensitize and empower communities about sexual and reproductive health and rights and their responsibilities.
  - Promote deliveries by skilled attendants.
- *Build institutional and technical capacity at national, district and community levels for RH*
  - Ensure quarterly technical MCH cluster meetings with key stakeholders including health training institutions.
  - Train health workers in the provision of SRH services including management of obstetric emergencies.
  - Strengthen referral systems for SRH services with a focus on transport and communication..
  - Provide quarterly technical support supervision to districts and lower level
- *Expand the provision of quality SRH services.*
  - Provide integrated Family Planning services in all health facilities according to levels of care.
  - Procure and distribute contraceptives to men and women of reproductive age group including adolescents.
  - Strengthen and expand coverage of goal oriented antenatal care including PMTCT.
  - Conduct outreach SRH services from health facilities.
  - Institutionalize deliveries in HC IIs with priority being given to hard to reach areas.
  - Ensure availability of midwives in all HC IIIs.
  - Provide basic and comprehensive emergency obstetric care and newborn care according to levels of care.
  - Improving inter and intra-sectoral co-ordination and collaboration between actors in reproductive health.
  - Conduct operational research aimed at improving the uptake of SRH services.
  - Design programmes to engage men family planning services and use.

- Prevent and control Obstetrical Fistulae.

- *Strengthen adolescent sexual and reproductive health services.*
  - Ensure availability of updated IEC materials on adolscent health and development.
  - Integrate and implement adolescent sexual and reproductive health in school health programmes.
  - Increase the number of facilities providing adolescent friendly sexual and reproductive health services.
- *Strengthen the legal and policy environment to promote delivery of SRH services.*
  - Review SRH and related policies and address institutional barriers to quality SRH services including access to FP commodities through all the possible agreed channels including PNFP subsector.
  - Review SRH policies, standards, guidelines and strategies as need arises.

Indicators with targets

- The proportion of pregnant women attending ANC 4 times increased from 47% to 60% by 2015.
- The proportion of women who deliver in health facilities increased from 34% to 90% by 2015.
- The proportion of health facilities with no stock-outs of essential RH medicines and health supplies increased from 35% to 70% by 2015.
- The proportion of health facilities that are adolescent-friendly increased from 10% to 75% by 2015.
- The % of health facilities with Basic and those with Comprehensive emergency obstetric care increased from 10% to 50% by 2015.
- The proportion of pregnant women accessing comprehensive PMTCT package increased from 25% to 80%.
- Contraceptive Prevalence Rate increased from 24% to 35% by 2015.
- The unmet need for family planning reduced from 41% to 20% by 2015.
- To increase the proportion of deliveries attended by skilled health workers from 40% to 60% by 2015.
- To reduce adolescent pregnancy rate from 24% to 15% by 2015.
- The proportion of mothers who have completed IPT II increased form 18% to 80%.

Implementation arrangements

The overall responsibility of implementing this component of the HSSIP will lie with the Division of Reproductive Health at the MoH headquarters. It will be responsible for the development of policies as well as providing overall coordination and guidance of Sexual reproductive Health (SRH) activities and provision of technical support to the District Health services (DHS). It will work through the MCH cluster to engage various stakeholders in the planning, monitoring and evaluation as well as approving SRH policies, strategies and standards. The responsibility of implementing SRH policies and interventions will lie with the District Health Officers (DHO) together with CSOs and health care providers at delivery points within the district.

5.2.1.29 Improve newborn health and survival by increasing coverage of high impact evidence based interventions, in order to accelerate the attainment of MDG 4.

In Uganda, 29 neonatal deaths out of 1000 live births occur each year, translating into at least 45,000 neonatal (UDHS 2006). According to the newborn situation analysis (SITAN) of 2008 40% and 25% of deaths among infants and children under-five, respectively, are under 28 days of life. The first week of life poses the highest risk of deaths for newborns, with 75% of deaths occurring during this time and 50% occurring within just

the first 24 hours of life. Newborn deaths have maintained the high-sustained levels of the IMR, making it impossible for Uganda to achieve the MDG 4 target by 2015.

Strategies and interventions

- *Mobilize and develop capacities for households and families to keep newborns healthy, make healthy decisions and respond appropriately to illness.*
  - Through the VHT promote essential New Born care practices (warm, clean chain, breast feeding, recognition of danger signs, care seeking and avoidance of local harmful behaviours)
  - Strengthen social networks and male involvement in newborn and maternal health
- *Improve capacities and quality of health services at community and facility level and of their interactions with caregivers.*
  - Review, disseminate post natal care policy and build capacity for conducting post natal home visit checks at day 1, 3 and 7 in the community and 6hrs, 6 days and 6 weeks at the health facility.
  - Widely disseminate and support implementation of minimum service standards for newborn care. (supplies, equipment, medicine, information, records, and guidelines for managing newborn)
  - Build capacities in districts and training schools for routine and extra newborn care skills including resuscitation, KMC, examination and management of sepsis and other conditions.
- *Building awareness of the right to health and survival of the Newborn.*
  - Develop advocacy plans and materials to raise awareness of the rights to health, survival and development and demand for appropriate newborn service
  - Do cost effectiveness analysis of selected strategies and services for preventing newborn deaths to inform policy and planning for newborn health
  - Partnerships and alliances with professional bodies in obstetrics and neonatology, private sector, other sectors to develop a common plan for improving newborn survival
- *Strengthen linkages between service levels and ensure continuum of care.*
  - Advocate for reproductive health community financing and transport schemes when referral is needed including communication systems.
  - Develop and disseminate the maternal, newborn and child handbook for information kept by the mother and families, to promote continuity between maternal, neonatal and child-care and health records.
  - Build and coordinate capacity building and monitoring implementation of newborn activities.

Indicators with targets

- The proportion of neonates seen in health facilities with septicaemia/pneumonia disease reduced by 30%
- The proportion of newborns receiving at least three post natal care visit during the 1st week Increased to 60%
- Health facilities implementing more than two thirds of the minimum service standards increased from 20 to 40%
- Proportion of mothers of newborns 1-2 weeks practicing clean cord and skin care, keeping babies warm, exclusively breast feeding and recognize danger signs, increased by at least 30% from baseline figures

Implementation arrangements

Interventions for strengthening delivery of newborn care services will be implemented within the framework of the existing system with the MoH divisions of reproductive and child health taking leadership and supported by the national newborn steering committee. The centre will be responsible for providing policy and guidelines, monitoring and building capacity for districts. The district is the most appropriate level for linking up local priorities with national health policy guidelines and resource allocations, and for coordination between health delivery services and communities, between government and private sector, and between health and other sectors. The key gaps identified in the situation analysis include limited capacity to plan for newborn health at different levels of care and patchy coverage of interventions falling short of getting the desired outcome, and this will constitute most of the early implementation activities. Partners will support MoH to finance and integrate newborn health in their programs. Other sectors e.g. MoE&S are expected to prioritize newborn health as part of the existing curricula on child health, safe motherhood/reproductive health in the pre service training of health workers at all levels.

5.2.1.30 Scale-up and sustain high, effective coverage of a priority package of cost-effective child survival interventions in order to reduce under five mortality.

The survival of children under-five years of age is a major public health concern in Uganda and over the past two decades there have been modest gains in child survival mainly due to public health interventions and improving economic and social performance. More than 200,000 children under-five years still die every year mainly due to preventable conditions including malaria, pneumonia, diarrhoea, vaccine-preventable diseases (e.g. measles), HIV/AIDS, and neonatal conditions. The first week of life posses the highest risk of deaths for newborn, with 75% of deaths occurring during this time and 50% occurring with in just the first 24 hours of life. According to the Uganda newborn situation analysis (SITAN) of 2008, 40% and 25% of deaths among infants and children under-five, respectively, are under 28 days of life, and 29 neonatal (UDHS 2006). Newborn deaths have maintained the high-sustained levels of the IMR, making it impossible for Uganda to achieve the MDG 4 target of reducing by two-thirds the mortality rate among children under-five is to be achieved by 2015. The GoU has developed a Child Survival Strategy to address the main bottlenecks of child health, and aim to reduce the under five-mortality rate from 137 per 1,000 live births to 56 per 1,000 live births by 2015.

Immunisation is a cost effective intervention for improvement of child health and ensuring the prevention of vaccine preventable diseases. Currently the targeted diseases are measles, poliomyelitis, whooping cough, tetanus, tuberculosis, diphtheria, Hepatitis B, Heamophilus influenza type b and Human Papilloma Virus (in 2 districts). Plans are also underway for possible introduction of Pneumococcal and Rotavirus vaccines; and scale up of HPV vaccination to cover the entire country. While immunisation coverage has been high and some diseases such as measles are about to be eliminated there are some problems relating to the immunisation programme in Uganda: funding is low, the available data is not used adequately for planning purposes, irregularity in gas and vaccine supply to districts, aging fleet of vehicles and inadequate cold and dry storage space at the central vaccine store. There is still threat of polio importation in Uganda, given the circulating wild poliovirus in Southern Sudan and DRC and the declining trend of immunisation coverage. The aim of the programme is to reduce morbidity and mortality resulting from targeted vaccine preventable diseases maintains polio-free status and eliminates maternal and neonatal tetanus.

Strategies and interventions

- ***Family oriented community based newborn and child health services***
  - Improve family & neonatal care through behaviour change communication on newborn home care practises to ensure early initiation and exclusive breastfeeding, clean cord and skin care, maintenance of warmth and appropriate care seeking; post natal home visits/checks on the mother/baby pair during the 1st of life; and effective & timely referral of newborn to the health facility.
  - Provision of family preventive/WASH services for child health and development through increased

community access to child health commodities (mama kits, insecticide treated mosquito nets, water quality testing kits, PCR test for HIV tests) to VHTs; food manufacturers fortifying of infant foods; linking communities to outreaches; and provision of incentives for use of services.

- Improve infant and young child feeding through promotion of early and exclusive breastfeeding practices; conduct health facility and community growth monitoring and promotion and referral of high risk children; and community therapeutic feeding for HIV+ children and those in special situations including emergencies.
- Introduce community illness management of diarrhoea, pneumonia and malaria through VHT training on priority areas; provision of first line anti-malarial, rapid diagnostic tests for malaria, oral rehydration salt and zinc for diarrhoea, antibiotics for pneumonia to VHTs; provision of job aids and IEC materials to trained VHT; household registration and recording patients treated and referred; and health facility VHT catchment planning for community child health activities.
- Improve supervision/monitoring of child health and nutrition at community through integrated supervision checklist, streamlining village HMIS to include common illnesses and nutrition, build capacity of health workers in HC II to and mentor and accredit VHTs to treat children; and facilitate VHT to attend quarterly meetings for reporting and refresher sessions.

- ***Provision of and increase population oriented schedulable services for child health & survival.***
  - *Improve preventive care for adolescents,* antenatal care through the roadmap.
  - *Improve paediatric HIV/AIDs prevention care* through prevention of mother to child transmission (PMTCT) including testing and counselling on infant feeding options, early infant diagnosis using PCR during outreaches and linking tested babies to care; incentives for caregiver use of testing services and re-attendance for follow up; PCP Prophylaxis for children of HIV+ mothers and treatment of opportunists infections; and integration of promotion of family planning counselling.
  - *Expand and integrate routine health facility outreaches services* to cover all interventions (immunisation, Vitamin A supplementation, deworming, malnutrition screening, Family planning, HIV testing, treatment of common childhood illness, information and education of mothers and families); conduct joint/integrated micro planning for outreach services with involvement of communities; strengthening information collection, reporting and feedback; districts and sub districts capacity to manage &strengthen commodity supply chain.
- ***Improve preventive infant & child care through immunisation.***
  - *Ensure vaccine supply and quality;* through expansion of cold storage space at the national, regional, district and health sub district levels; review and strengthen cold chain system at all levels; strengthen and maintain the gas and vaccine supply chain and build district and sub district capacity for cold chain management.
  - *Improve access to immunization services;* through raising awareness and demand for immunization among community members and families; immunization through static and outreach services using innovations that will ensure that “missed-outs” and “drop-outs” from routine services are identified, particularly in urban, remote and underserviced areas; advocate for and scale-up of HPV vaccination and introduction of pneumococcal and rotavirus vaccines into the routine immunization programme; strengthen monitoring and evaluation of the immunisation services including coverage.
  - *Strengthen measles control, maternal and neonatal tetanus and polio eradication measures through;* conducting proven interventions to achieve global targets of polio eradication, elimination of maternal and neonatal tetanus, and accelerated measles control such as mass immunization campaigns; support disease-specific surveillance efforts and research to inform future policy in these areas.
- ***Provision of individually oriented clinical services for newborn & child health basis.***
  - *Improve neonatal care at primary health facility level* through increase capacity of facility based workers to manage newborn conditions (birth asphyxia, very low birth weight, sepsis, jaundice and HIV) including revision of curricula to include newborn health care; in and pre-service training; improve

quality of care through development, regular external and internal assessments/audits; certification of facilities as newborn friendly; and build capacity for peri-natal death audit and reviews.

- *Improve the management of common childhood illness at the primary level* through improving health facility supports for IMCI; improve and expand health worker capacity to manage common illness including nursing assistants; establish quality improvement approaches and strengthen referral compliance to higher level.
- *Strengthen clinical referral level secondary and tertiary care* through defining child and newborn minimum standards, improved infrastructure and equipment, drug availability of hospitals for specialist care; introduction and build capacity for emergency triage and treatment (ETAT) and helping babies breathe (HBB); innovative ways provision of oxygen, medication colour coding, sepsis prevention and control; strengthen capacity for specialist outreach services; and continuous quality improvement including health information management systems.

- ***Creation of an enabling environment at national level***

- *Regular review of policy and regulatory frameworks* for child health including task shifting, regulation for code for marketing breast milk substitutes, enforcement guidelines for hygiene and sanitation, advocacy and sensitisation of food industries to fortify food, political and decision makers on new childhood vaccines and developments in child health.
- *Expand district and national programme management* capacity through recruitment of staff, specialist e.g. nutritionist, orient managers on management of child health programs; partnerships with private sectors and other sectors e.g. agriculture and education to ensure appropriate pre-service training and long distance training for relevant child health skills;
- *Coordination of interventions/thematic policy across child health* concerned department through advocating to fully mainstream child health into PMNCH principles, harmonization of PMTCT, HIV, malaria policies in child health, develop integrated communication and advocacy strategies encompassing child, newborn and maternal health, nutrition, PMTCT, HIV and hygiene; strengthen functionality and review terms of references for child health expert committees.
- *Build knowledge base on critical areas of child survival* through operational research on child survival delivery channels (family, population and individual services), post natal community newborn care, performance based financing, private sector engagement, IMCI, EID, PMTCT, and NBH; strengthen documentation of polio free status and surveillance efforts (Hib, pneumococcus, yellow fever, Rotavirus); child newborn verbal autopsy assessments; program evaluations to inform future policy.

Indicators with targets

- Probable and confirmed malaria inpatient under five deaths reduced from 0.6 to 0.3%
- Stunting rates among children under-fives reduced from 38% to 28%
- Neonatal septicaemia rates in health facilities reduced by 30%
- Neonatal tetanus rates reduced and maintained at zero
- Non Polio Acute flaccid poliomyelitis rates maintained at greater than 2 per 100,000, and cases of paralysis due to wild polio virus maintained at zero
- Under-fives who slept under an ITN the previous night increased from 10 to 60%
- DPT-3/Pentavalent coverage for under 1's increased from 74%-85%
- Measles vaccination coverage by 12 months increased from 75% to 95%
- U5s with malaria treated correctly within 24 hrs increased from 26% to 60%
- U5 pneumonia managed with correct antibiotic increased from 17% to 50%
- Children 6-59 months receiving doses of Vitamin A increased from 36%-80%

- HIV-exposed infants started on cotrimoxazole prophylaxis within 2 months of birth increased to 80%
- Mother/newborn pair checked twice in 1st week of life (1st visit within 24 hrs) increased to 50%
- Exclusive breast-feeding rate by the age of 6 months increased to 60%
- Diarrhoea cases receiving ORT during illness increased from 37% to 60%
- Index of U5s managed in an integrated manner at the facility using IMNCI increased from 30%-60%
- Index of facility availability of tracer drugs and vaccines (anti-malarial, cotrimoxale, measles vaccine, sulphadoxine/pyramethamine, depoprovera and ORS,) increased from 23% to 50%
- Number of facilities assessed and accredited as baby friendly (BFHI) increased from 15 to 70
- Health workers who are competent in material resuscitation upon completing of training

Implementation arrangements

Interventions for strengthening delivery of newborn, child health and immunization services will be implemented within the framework for child survival, maternal newborn child adolescent health continuum. The child health division and EPI program at the national level will be responsible for providing policy and guidelines, monitoring and building capacity for districts. It will work with other government ministries, Local Governments, the private sector and CSOs in order to effectively deliver of services. The EPI program and child health division shall provide technical supervision and coordination of the immunization services in Uganda. Partners will support MoH to finance and integrate child and newborn health in their programs. Other sectors e.g. MoE&S are expected to prioritize health as part of the existing curricula on child health, safe motherhood/reproductive health in the pre service training of health workers at all levels. The district is the most appropriate level for linking up local priorities with national health policy guidelines and resource allocations, and for coordination between health delivery services and communities, between government and private sector, and between health and other sectors. At the district level the DHO shall coordinate and supervise the provision of immunization services by both the public and private sector. At community level the VHTs will play an important role in creating demand for services. The technical programs will build capacity at all levels in the delivery of services. While all communities shall be targeted, emphasis shall be on urban, remote and underserviced areas. A multi-year plan will be developed to guide the implementation of the immunization and other child health services and to support mobilization for additional resources from government and partners.

5.2.1.31 Prevent morbidity and mortality due to gender based violence.

Gender based violence is very common in Uganda. As reported in the 2006 UDHS , 39% of women (15-49 years) versus 11% of men of the same age group have ever experienced sexual violence, the incidence being higher in rural areas for both sexes, but higher among men in the highest wealth quintile, as opposed to being higher among women in the lowest wealth quintile. Intimate partner violence is the most common form of violence for women age 15-49 years. UDHS 2006 document that more than two-thirds (68%) of ever-married women had ever experienced any kind of violence (physical, sexual or emotional) by a husband or intimate partner. While programmes are being implemented to address GBV challenges exist: lack of resources and equipment including transport and requisite skills among health workers to deal with such issues. In addition there is poor coordination and collaboration amongst different stakeholders in Uganda and this tends to weaken the national response to sexual and gender based violence. Thee are also existence of obsolete legal stipulations (such as for completion of certain forms required by law enforcement units, examination of survivors, testifying in courts of law allof which have posed a barrier to willing survivors to press for the enforcement of their human rights to digninity and bodily integrity, and also which have reinforced the notion of impunity of the perpetrators. These policy/legal stipulations need to be carefully examined and amended. There is need to enhance awareness creation to all health workers and all other stakeholders; roll-out training of health workers on management of SGBV both in-service and pre-service; develop, translate and disseminate IEC materials on SGBV, empower and support male change agents for SGBV and to Educate

school pupils, students and communities on health consequences and response of SGBV.

Strategies and key interventions

- *Build the capacity of health workers, their respective institutions and communities to manage cases of SGBV.*
  - Create awareness about SGBV among all health workers, teachers, VHTs and all other stakeholders.
  - Provide both inservice and preservice training to health workers on management of SGBV.
  - Educate school pupils, students and communities on health consequences of SGBV.
  - Develop user friendly manuals to facilitate the implementattion of gender mainstreaming in the health sector.
  - Provide PEP to victims of rape.
- *Strengthen IEC activities on the effects of SGBV.*
  - Develop, translate and disseminate IEC materials on the negative health and development effects of SGBV.
  - Empower and support male change agents for SGBV.
  - Develop a strategy to address SGBV in the health sector.
  - Create awareness about the effects of SGBV among communities using VHTs and CSOs.
  - Conduct a mapping exercise to determine the organisations dealing with SGBV in Uganda and work with them to create awareness about the effects of SGBV.
- *Strengthen the capacity of the health sector to conduct SGBV related M and E activities.*
  - Compile and analyse information available to establish the prevalence of GBV in Uganda and formulate strategic interventions for the health sector.
  - Work with UBOS to incorporate SGBV issues in national surveys such as the UDHS.
  - Strengthen inter-sectoral collaboration for GBV prevention and management:
- Train appropriate cadres of staff to review and streamline the management of GBV and referral
- Review the policies and stipulations relating to the completion of Police form 3 with the intention to removing current barriers to appropriate examinations, reporting (and enforcement of the rights of survivors to due process) and abolition of impunity of perpetrators, resulting in none pursuance of cases.

Indicators with targets

- An integrated strategy to address SGBV in the health sector developed and disseminated.
- Health service provision for survivors of rape scaled up in all district hospitals and 50% of HC IIIs.
- PEP Kits available in all district hospitals and 50% of HC IIIs.
- Health workers trained in clinical management of survivors of rape increased to 25% by 2015.

5.2.2 Objective 2: Improve levels, and equity in access and demand

Access to services is affected by a number of factors. Where access is poor, the clients are not able to utilize services. As such, the sector will focus on putting in place the necessary inputs that are needed, to ensure there is improved access to health services. These inputs relate to the human resources, infrastructure (including equipment, ICT and transport), and medical products.

6. INVESTMENT FOCUS

Achievement of the HSSIP calls for critical investments in different sector areas to attain the objectives set out. Sector investments are in four critical areas (a) Human Resources for Health, (b) Health Infrastructure, including buildings, equipment, Communication, Transport, (c) Medical Products, Vaccines, Supplies and Technologies, and (d) Management support, including planning, supervision, training, monitoring.

In this section, we only summarize the critical investments the sector intends to make, in order to attain the goal and objectives of the HSSIP. The more comprehensive information on actual investments is contained in respective System strategic plans. These include:

- Human Resources for Health strategic plan
- Health infrastructure strategic plan
- National Pharmaceutical Sector Strategic Plan
- Health Management and Information System Strategic Plan

6.1 Service Delivery Priorities for investment

Priorities for implementation during the HSSIP are those interventions for for implementation will have 1st priority above other investments, by both Government, and donors. These priority intervention areas are:

- Sexual and reproductive health: In recognition of the slow progress being made towards attaining good health outcomes relating to this area of services
- Child Health: In recognition of the need to accelerate implementation of cost effective interventions to improve child health
- Health Education: In recognition of the critical role addressing health risk factors play, in attaining the overall health goals, and
- Control and prevention of communicable diseases (HIV/AIDS, Malaria and Tuberculosis): In recognition of the major contribution they provide to the overall disease burden.

Investments made during the HSSIP period are geared at enabling the system deliver, at a minimum, the above interventions.

6.2 Human Resources for Health Investments

During the period of the HSSIP, the sector priority in Human Resource Investments will be to attain a minimum of 75% of the expected norms. While attainment of 100% of the norms would be ideal, improvement in the numbers of Health Workers to 75%, from the current 52% of expected norms is a target more within reach.

Attainment of this 75% of norms on its own will be a challenge. As such, improvements in staff numbers will be staggered across the years as highlighted below.

ANNEX B. COMPARISON BETWEEN THE EPHS AND THE PRIORITY RMNCH SERVICES

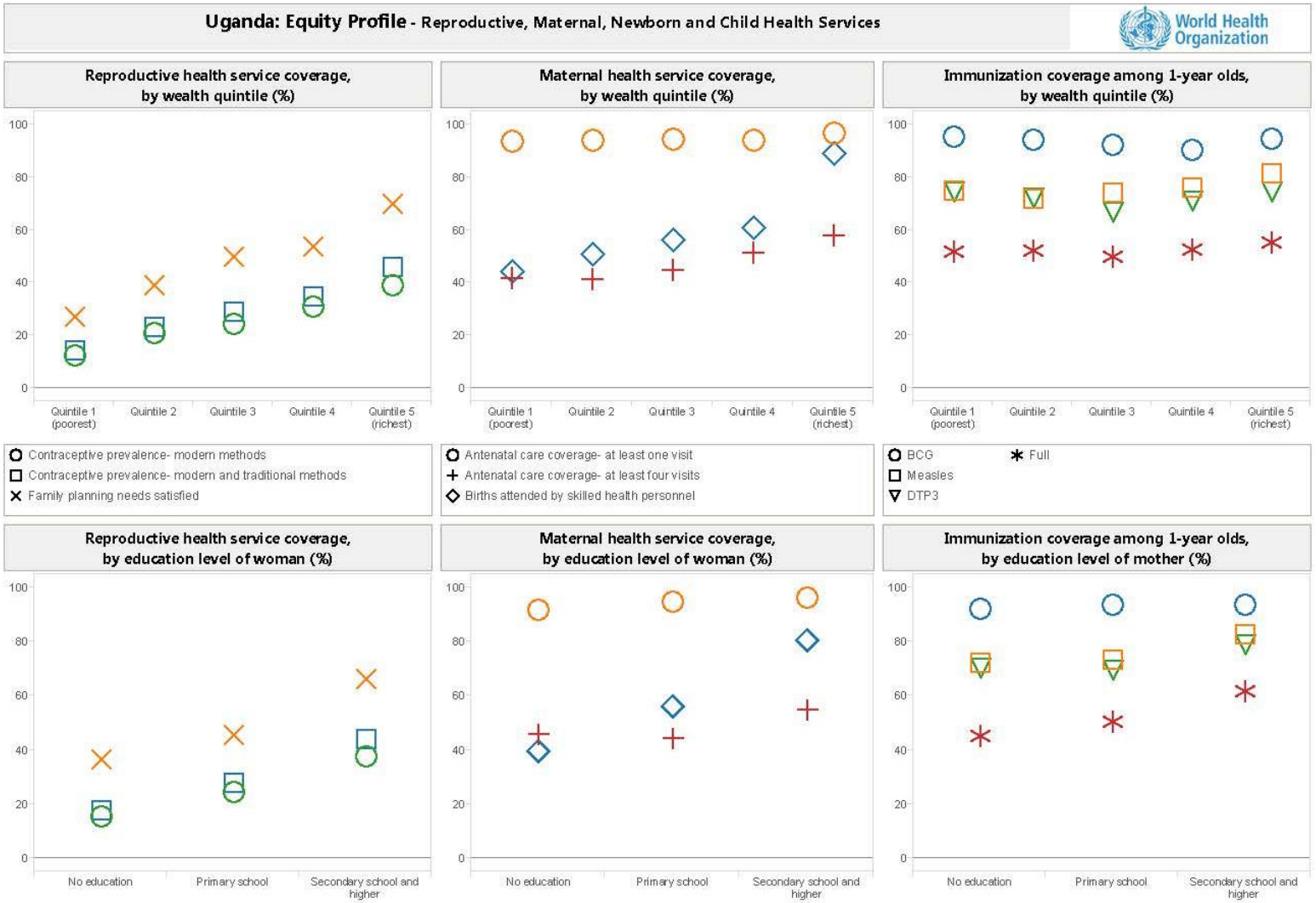
	RMNCH Essential Interventions	Service Included in EPHS	Source and Additional Notes
Adolescence and pre-pregnancy	**Level: Community Primary Referral**		
	Family planning (advice, hormonal and barrier methods)	Yes	Source: National Adolescent Health Policy for Uganda
	Prevent and manage sexually transmitted infections, HIV	Yes	Source: National Adolescent Health Policy for Uganda
	Folic acid fortification/supplementation to prevent neural tube defects	Unspecified	Source: Health Sector Strategic and Investment Plan; only lists folic acid fortification under maternal health services, unclear whether folic acid is targeted towards adolescents.
	Level: Primary and Referral		
	Family planning (hormonal, barrier and selected surgical methods)	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Level: Referral		
	Family planning (surgical methods)	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
Pregnancy (antenatal)	**Level: Community Primary Referral**		
	Iron and folic acid supplementation	Yes	Source: Health Sector Strategic and Investment Plan
	Tetanus vaccination	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Prevention and management of malaria with insecticide treated nets and antimalarial medicines	Yes	Source: Health Sector Strategic and Investment Plan
	Prevention and management of sexually transmitted infections and HIV, including with antiretroviral medicines	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Calcium supplementation to prevent hypertension (high blood pressure)	Unspecified	This service was not specified in reviewed documents
	Interventions for cessation of smoking	Unspecified	This service was not specified in reviewed documents
	Level: Primary and Referral		
	Screening for and treatment of syphilis	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services

	RMNCH Essential Interventions	Service Included in EPHS	Source and Additional Notes
	Low-dose aspirin to prevent pre-eclampsia	Unspecified	This service was not specified in reviewed documents
	Anti-hypertensive drugs (to treat high blood pressure)	Unspecified	This service was not specified in reviewed documents
	Magnesium sulphate for eclampsia	Unspecified	Source: National Policy Guidelines and Service Standards for Reproductive Health Services; magnesium sulfate not specified
	Antibiotics for preterm prelabour rupture of membranes	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Corticosteroids to prevent respiratory distress syndrome in preterm babies	Unspecified	This service was not specified in reviewed documents
	Safe abortion	No	Source: National Policy Guidelines and Service Standards for Reproductive Health Services excluded safe abortion in the updated list of priority RH services
	Post abortion care	Yes	Source: National Adolescent Health Policy for Uganda
	Level: Referral		
	Reduce malpresentation at term with External Cephalic Version	Unspecified	This service was not specified in reviewed documents
	Induction of labour to manage prelabour rupture of membranes at term (initiate labour)	Unspecified	This service was not specified in reviewed documents
Childbirth	**Level: Community Primary Referral**		
	Prophylactic uterotonics to prevent postpartum haemorrhage (excessive bleeding after birth)	Unspecified	This service was not specified in reviewed documents
	Manage postpartum haemorrhage using uterine massage and uterotonics	Unspecified	This service was not specified in reviewed documents
	Social support during childbirth	Unspecified	This service was not specified in reviewed documents
	Level: Primary and Referral		
	Active management of third stage of labour (to deliver the placenta) to prevent postpartum haemorrhage (*as above plus controlled cord traction)*	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Management of postpartum haemorrhage (as above plus manual removal of placenta)	Unspecified	This service was not specified in reviewed documents
	Screen and manage HIV (if not already tested)	Yes	Source: Health Sector Strategic and Investment Plan
	Level: Referral		
	Caesarean section for maternal/foetal indication (to save the life of the mother/baby)	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services

	RMNCH Essential Interventions	Service Included in EPHS	Source and Additional Notes
	Prophylactic antibiotic for caesarean section	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Induction of labour for prolonged pregnancy (initiate labour)	Unspecified	This service was not specified in reviewed documents
	Management of postpartum haemorrhage *(as above plus surgical procedures)*	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
Postnatal (Mother)	**Level: Community Primary Referral**		
	Family planning advice and contraceptives	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Nutrition counselling	Yes	Source: Health Sector Strategic and Investment Plan
	Level: Primary and Referral		
	Screen for and initiate or continue antiretroviral therapy for HIV	Yes	Source: Health Sector Strategic and Investment Plan
	Treat maternal anaemia	Yes	Source: Health Sector Strategic and Investment Plan
	Level: Referral		
	Detect and manage postpartum sepsis (serious infections after birth)	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
Postnatal (Newborn)	**Level: Community Primary Referral**		
	Immediate thermal care (to keep the baby warm)	Yes	Source: Health Sector Strategic and Investment Plan
	Initiation of early breastfeeding (within the first hour)	Yes	Source: Policy Guidelines on Infant and Young Child Feeding
	Hygienic cord and skin care	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Level: Primary and Referral		
	Neonatal resuscitation with bag and mask (by professional health workers for babies who do not breathe at birth)	Unspecified	This service was not specified in reviewed documents
	Kangaroo mother care for preterm (premature) and for less than 2000g babies	Unspecified	This service was not specified in reviewed documents
	Extra support for feeding small and preterm babies	Yes	Source: Policy Guidelines on Infant and Young Child Feeding
	Management of newborns with jaundice ("yellow" newborns)	Yes	Source: Health Sector Strategic and Investment Plan
	Initiate prophylactic antiretroviral therapy for babies exposed to HIV	Yes	Source: National Policy Guidelines and Service Standards for Reproductive Health Services
	Level: Referral		
	Presumptive antibiotic therapy for newborns at risk of bacterial infection	Unspecified	This service was not specified in reviewed documents

	RMNCH Essential Interventions	Service Included in EPHS	Source and Additional Notes
	Use of surfactant (respiratory medication) to prevent respiratory distress syndrome in preterm babies	Unspecified	This service was not specified in reviewed documents
	Continuous positive airway pressure (CPAP) to manage babies with respiratory distress syndrome	Unspecified	This service was not specified in reviewed documents
	Case management of neonatal sepsis, meningitis and pneumonia	Yes	Source: Health Sector Strategic and Investment Plan
Infancy and Childhood	**Level: Community Primary Referral**		
	Exclusive breastfeeding for 6 months	Yes	Source: Policy Guidelines on Infant and Young Child Feeding
	Continued breastfeeding and complementary feeding from 6 months	Yes	Source: Health Sector Strategic and Investment Plan
	Prevention and case management of childhood malaria	Yes	Source: Health Sector Strategic and Investment Plan
	Vitamin A supplementation from 6 months of age	Yes	Source: Health Sector Strategic and Investment Plan
	Routine immunization plus *H.influenzae*, meningococcal, pneumococcal and rotavirus vaccines	Yes	Source: Health Sector Strategic and Investment Plan
	Management of severe acute malnutrition	Yes	Source: Health Sector Strategic and Investment Plan
	Case management of childhood pneumonia	Yes	Source: Health Sector Strategic and Investment Plan
	Case management of diarrhoea	Yes	Source: Health Sector Strategic and Investment Plan
	Level: Primary and Referral		
	Comprehensive care of children infected with, or exposed to, HIV	Yes	Source: Health Sector Strategic and Investment Plan
	Level: Referral		
	Case management of meningitis	Unspecified	This service was not specified in reviewed documents
Across the continuum of care	**Level: Community Strategies**		
	Home visits for women and children across the continuum of care	Unspecified	This service was not specified in reviewed documents
	Women's groups	Unspecified	This service was not specified in reviewed documents

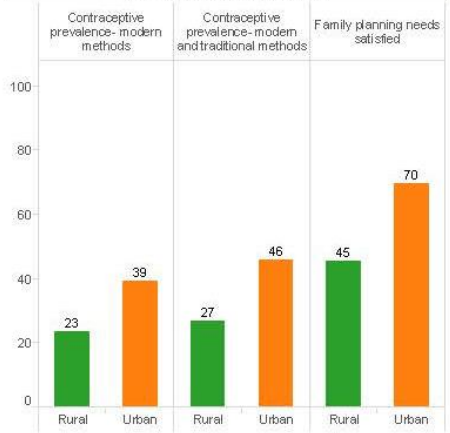
ANNEX C: UGANDA HEALTH EQUITY PROFILE



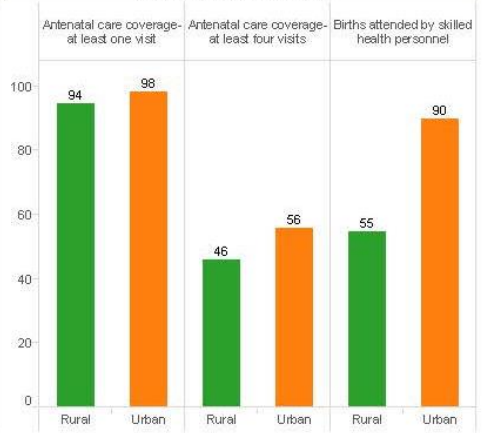
Uganda: Equity Profile - Reproductive, Maternal, Newborn and Child Health Services

World Health Organization

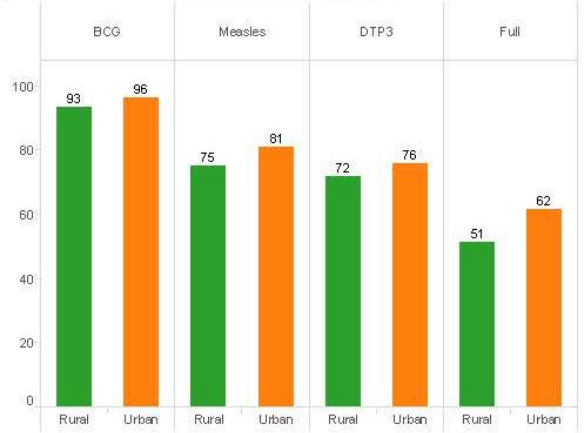
Reproductive health service coverage, by place of residence (%)



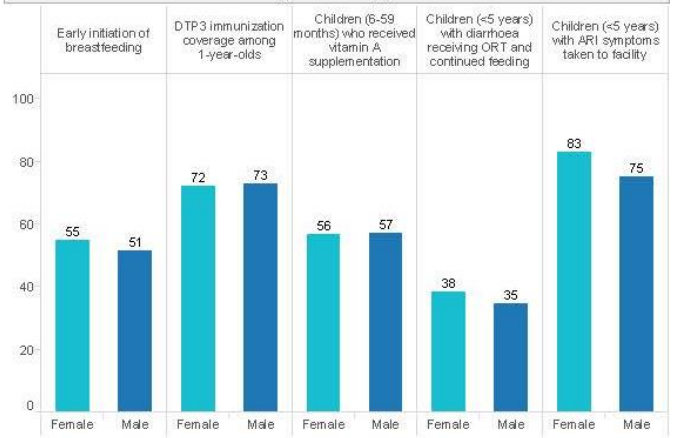
Maternal health service coverage, by place of residence (%)



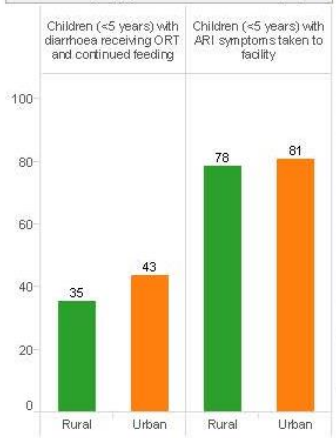
Immunization coverage among 1-year olds, by place of residence (%)



Health service and healthy behaviour coverage, by child sex (%)



Health service coverage among sick children, by place of residence (%)



Health service and healthy behaviour coverage (%)

Contraceptive prevalence- modern methods	26
Contraceptive prevalence- modern and traditional methods	30
Family planning needs satisfied	50
Antenatal care coverage- at least one visit	95
Antenatal care coverage- at least four visits	47
Births attended by skilled health personnel	59
Early initiation of breastfeeding	53
BCG immunization coverage among 1-year-olds	94
Measles immunization coverage among 1-year-olds	76
DTP3 immunization coverage among 1-year-olds	72
Full immunization coverage among 1-year-olds	53
Children (6-59 months) who received vitamin A supplementation	57
Children (<5 yrs) with diarrhoea receiving ORT and continued feeding	36
Children (<5 yrs) with ARI symptoms taken to facility	79

Source: DHS 2011

Antenatal care coverage at least 1 visit, antenatal care coverage at least 4 visits, births attended by skilled health personnel, and early initiation of breastfeeding are based on data from the five years prior to survey.

For more information, please see Global Health Observatory "Health Equity Monitor" page: www.who.int/gho/health_equity/en/index.html

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