

*“Improving the access to water sources, hygienic services and quality
primary health care in Isiolo County”*

AID 010191 LVIA/KENYA

Assessment report: Delivery and Quality of Care Provided by 15 PHC Facilities in
Isiolo County



ACKNOWLEDGMENT

I would like to express my deepest appreciation to all those who provided me the possibility to complete this assessment. A special gratitude goes to Francesca Pieralli CCM Country Representative Kenya/Somali whose contribution and support, stimulating suggestions and encouragement helped me to coordinate and complete this assessment.

However, the assessment would not have been possible without the kind support from Isiolo County Health Management team led by Mr. Wario, Mr. Molu Huka and Mr. Sarite. I would like to extend my sincere thanks to them all.

I would like to express my deepest appreciation to the Sub-county Health Management Teams from Galbatula, Merti and Isiolo, health facility staff and communities where this study was carried out for their invaluable support as well as in providing necessary information for this assessment.

Last but not least I am highly indebted to the entire CCM team for their guidance and valuable contribution in finalizing this report

LIST OF ACRONYMS

BEmOC	Basic Emergency Obstetrical Care
CCM	Comitato Collaborazione Medica
CHMT	County Health Management Team
CHEO	County Health Executive Officer
CHW	Community Health Workers
CHEW	Community Health Extension Worker
CU	Community Units
HDI	Human Development Index
HIV	Human Immunodeficiency Virus
HMIS	Health Management Information System
IMCI	Integrated Management of Childhood illness
KEPH	Kenya Essential Package of Health
NGOs	Non Governmental Organizations
OJT	On-Job Training
RRI	Rapid Results Initiative
MTP	Medium Term Plan
SCHMT	Sub County Health Management Team
WRMA	Water resources Management Authority

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PREFACE

In Kenya, the second National Health Sector Strategic Plan (NHSSP II) focuses on the provision of targeted health services to different age cohorts in the population as one of the priority strategies for enhancing access to quality health care¹. The health sector in the country currently has a number of partners supporting interventions as part of government's cooperation for health.

Under the new constitution, health services have been decentralized to the County level. In Isiolo County, assessment on the delivery and quality of care provided by PHC facilities was undertaken within the Project *"Improving the Access to Water Sources, Sanitation Facilities and Quality Primary Health Care Services in Isiolo County"*. This is a three year project funded by the *Italian Ministry of Foreign Affairs* and implemented by the International NGOs LVIA and CCM in partnership with the WRMA-ENNCA and the *Isiolo County Department for Health*. The specific objective of the Project is to improve access to clean water, sanitation facilities and Primary Health Care (PHC) services in Isiolo County through: (i) an increased availability of clean water for both human and animal consumption; (ii) an increased access to latrines in schools and Health Facilities (HFs); (iii) technical support to Health Centres and Dispensaries; and (iv) health education to raise awareness on the adoption of proper hygiene practices and increase the demand and utilization of the health services.

The Primary Health Care Assessment was undertaken in 15 Health Facilities pre- selected by Isiolo County Health Management Team and CCM/LVIA to be included and targeted by the project.

In the framework of the above-mentioned project, the Quality Need Assessment (QNA) aims at (i) assessing gaps in terms of knowledge, skills and competences of the Health Workers and drafting and in-service training plan to address them; (ii) proposing the development of easy-to-use and culturally-accepted IEC materials to facilitate the dissemination of key messages on healthy practices and behaviors; and (iii) recommending an Action Plan for the creation or strengthening of at least 1 Community Health Unit linked to each Health Facility involved in the Project.

This document is divided into five main sections. The *Background Information* provides basic information on the health system in Kenya and describes the context of Isiolo County. The methodology used to collect and analyze data regarding each HF is described in the *Methodology* section, and the research findings are in the *Results* section. The *Conclusion and Recommendations* proposed for implementation in the 15 HFs within the startup phase of the project are highlighted in section 5.

¹ Ministry of Health, 2010

1.0. INTRODUCTION

1.1 Background information on Kenya

Kenya has a population of 43 million and a life expectancy of 61 among other statistics (Table 1.1)

Total population (2012)	43,178,000
Gross national income per capita (PPP international \$, 2012)	1,730
Life expectancy at birth, total (years)	61
Under 5 mortality rate (per 1000 live births) both sexes	73
Maternal mortality ratio (per 100,000 live births) (2013)	400
Total fertility rate (per woman)	4.5
Source: Global Health Observatory ²	

Table 1.1: Kenya Statistics

Health system in Kenya

The Government, in its 2nd Medium Term Plan (MTP 2, 2014 -2018) has highlighted the need to adhere to aid effectiveness and partnership principles. The health sector in the country currently has a number of active partners supporting interventions as part of government's cooperation for health.

Based on the 1994 – 2010 **Kenya Health Policy Framework** comprehensive review, interventions that were undertaken to improve maternal and child health indicators showed mixed results. Coverage of critical interventions related to maternal health stagnated or declined, with improvements seen only in the use of modern contraceptives (33% to 46%). On the other hand, child health interventions showed improvements in coverage during this period. However, reports indicate that ill health amongst children remains high, with no indications of improvement. Many interventions including the **Kenya Health Policy 2012 – 2030 and Kenya Essential Package for Health (KEPH)** have been introduced in the health sector to improve key health indicators such as maternal and child health among others. In 2007, community health strategy was launched as part of creating an enabling environment for increased community involvement in health service provision. The **2007 comprehensive community health strategy** provides for provision of health promotion, targeted disease prevention and curative services through community based initiatives. In this strategy, the main stakeholders include the household members, the Community Health extension Workers (CHEWs), Community Health Workers (CHWs) and development partners and implementers. Community Health Committees plays the governance role in this strategy. CHEWs are the

² Global Health Observatory available from: http://www.who.int/gho/countries/ken/country_profiles/en/

link persons between the community and the Health facility and represent the community issue at the health facility committee meetings.

1.2 Isiolo County

1.2.1 County profile

Isiolo County is located in the upper eastern region of Kenya. It borders seven counties with Garissa to the east, Wajir to the north east, Meru to the south west, Samburu to the east and Marsabit to the north west, with Kitui and Tana River counties to the south west and south east respectively. It covers an area of 44,174.1Km² and lies between latitude 1°58'N and 2°1' S and longitude 38°34'E and 41°32'E.

Isiolo, Merti and Garbatulla are the sub Counties constituting the County. The county is further divided into 10 wards as indicated in Table 2.

Sub-county	Area (Km ²)	Wards
Isiolo	24,734	5
Merti sub county	4,045	2
Garbatulla sub county	15,395	3
Total	44,174	10

Table 1.2 Isiolo County Administrative and Political Units and Size

Isiolo County has the potential of cashing in on future developments in the hospitality industry after Isiolo town recently acquired the status of a resort city. Nomadic pastoralist communities are very dominant in the country and contribute a large portion towards meeting the county's demand for meat. Traditional jewelry making also contributes to the local tourism market. (KNBS Isiolo (2013)

1.2.2 Health Status:

Health status remains at suboptimal level with **less than 50% of the population accessing healthcare** in Isiolo. Life expectancy remains at 58.9 years. Maternal mortality rate currently stands at 48 deaths per 1,000. Under 5 mortality rate is at 56 deaths per 1000 live births. Infant Mortality rate is 43 per 1000 live births. Neonatal mortality rate is 31/1000 births³ (Table 1.3).

Nutrition being a key determinant of health remains a big challenge in the county with the prevalence of stunting being 27.8%, underweight 24.2% Infant and child mortality in Isiolo district are moderately high, in addition to the district having a high proportion of children who are under-weight.

³ KDHS2009, MICS 2008/09)

http://www.healthpolicyproject.com/pubs/291/County%20poster-factsheet__Isiolo_FINAL_A3.pdf

No.	Indicator	2011	2012	Kenya 2012
Population				
1	Total	152,493	157,312	42,387,216
2	Male	78,425	80,903	21,070,003
3	Female	74,068	76,409	21,317,213
4	U5	21,807	22,496	6,518,230
5	U1	4,270	4,405	1,339,775
Nutrition				
6	Underweight (weight for age) (%)	25.2	24.2	15.0
7	Stunted (height for age) (%)	32.8	27.8	30.0
Child health				
8	Full immunization coverage (%)	83.7	85.1	83.0
Maternal Health				
9	Births delivered at a health facility (%)	29.3	39.4	44.0
	Contraceptive prevalence (%)	34.3	36.1	45.0
	Mother to child transmission of HIV (%)	13.3	7.9	8.5
Health personnel - public				
10	Nurses (per 100,000 people)	n/a	128	49
11	Doctors (per 100,000 people)	n/a	10	7
12	Clinical officers (per 100,000 people)	n/a	18	8
Health facilities				
13	Public	n/a	28	4,039
14	NGOs	n/a	n/a	252
15	Faith based	n/a	9	1,006
16	Private	n/a	n/a	2,721
Health financing				
17	Preventive services budget (per capita KES)	1,317	n/a	669
18	Curative services budget (per capita KES)	1,036	n/a	408

Source: http://www.healthpolicyproject.com/pubs/291/County%20poster-factsheet__Isiolo_FINAL_A3.pdf

Table 1.3 Health at a glance, Isiolo County Source.

Similarly, the proportion of **children aged 0-5 months who are exclusively breastfed is quite low (19%)** in the district⁴.

Several challenges continue to hinder the improvement of these critical indicators. These challenges include; poor road networks, socio-cultural practices, shortage of skilled birth attendants, lack of emergency obstetrical care services for complicated deliveries, erratic drug supplies, among others highlighted in subsequent sections.

⁴ Multiple Indicator Cluster Survey 2008 available online from: http://www.childinfo.org/files/Isiolo_Report.pdf

Impact level Indicators	County estimates
Life Expectancy at birth (years)	58.9
Annual deaths (per 1,000 persons) – Crude mortality	11.7/1000
Neonatal Mortality Rate (per 1,000 births)	31/1000
Infant Mortality Rate (per 1,000 births)	43/1000
Under 5 Mortality Rate (per 1,000 births)	56/1000
Maternal Mortality Rate (per 100,000 births)	48/1000
Adult Mortality Rate (per 100,000 births)	12.8/1000

(Source: KDHS2009, MICS 2008/09)

Table 1.2 Isiolo impact indicators

In regard to Health, the **most common diseases in Isiolo County among children under 5** are respiratory infections, malaria and diarrhea⁵, while **among the adult** population the most common diseases are respiratory infections, malaria and Urinary Tract Infection⁶, in that order.

1.2.3 Health-related aid assistance in Isiolo County

The following are the main partners working with the County Health Department in strengthening the county health system (Table 1.3).

Name Organization	Type(INGO, LNGO, FBO, CBO)	Sub county of operation	Areas of support(Sub County)
LVIA	NGO	Isiolo, Garbatulla, Merti	Water and sanitation
ACF	NGO	Galbatulla, Merti	High impact nutrition intervention
IMC	NGO	Galbatulla, Merti, Isiolo	High impact nutrition intervention

⁵ Data source: *Under 5 Years Outpatient Morbidity Summary – Isiolo County 2013* (www.hiskenya.org).

⁶ Data source: *Over 5 Years Outpatient Morbidity Summary – Isiolo County 2013* (www.hiskenya.org).

CCM	NGO	Galbatulla, Merti, Isiolo	PHC
FH	NGO	Galbatulla, Merti, Isiolo	Reproductive Health
AMREF	NGO	Galbatulla, Merti, Isiolo	Tuberculosis
RED CROSS	NGO	Galbatulla, Merti, Isiolo	HIV
APHIA IMARISHA	NGO	Galbatulla, Merti, Isiolo	HIV
CHAP	NGO	Isiolo	Tuberculosis

Table 1.3 NGOs working in Isiolo County

1.2.4 Isiolo County Health Strategic plan

For planning and management of health services in Isiolo, **the County has recently launched a five year health strategic plan** that will guide the provision of health services. The strategic plan provides the County Health Sector (CHS) focus, objectives and priorities to enable it moving towards attainment of the Kenya Health Policy Directions and the Strategic plan 2012- 2017. It provides a framework and a road map on how the medium term county health objectives will be achieved. It will guide the County and Sub-counties on Annual work plan prioritization that focus on health sector interventions in order to accelerate and attain better health outcomes. It places emphasis on implementing interventions for better access to services; improve quality of service delivery and prioritising seven investment areas. It also states how the sector will monitor and guide attainment of the above priorities.

The overall goal of the strategic plan is to improve health outcomes within the county which will be attained through attainment of **six Kenya Health Policy objectives namely:**

- i. To eliminate communicable conditions
- ii. To halt, and reverse the increasing burden of non-communicable conditions
- iii. To reduce the burden of violence and injuries
- iv. To provide essential medical services
- v. To minimize exposure to health risk factors
- vi. To strengthen collaboration with health related sectors.

The plan will lead to identified specific objectives that will address policy objectives within the county.

Within the framework of Implementation of CCM activities, the interventions will support the County in addressing the following objectives (Table 1.4)

	Policy objective	Specific strategic Objectives
	To eliminate communicable conditions	<i>To establish 25 new CUs and functionalize the 18 existing community units in county by December 2017.</i>
	Halt, and reverse increasing burden of Non communicable conditions	<ol style="list-style-type: none"> <i>1. Conduct quarterly DQA verification, dissemination and support supervision</i> <i>2. Strengthen health promotion and education on NCD at all levels of healthcare by 2017</i>
	Reduce the burden of Violence & Injuries	<i>To increase number of community health workers and Community health Committee members trained on violence and injuries from 0 to 500 and CHC from 0 to 25 by Dec 2017</i>
	Provide essential Medical services	<ol style="list-style-type: none"> <i>1. Establish basic obstetric care equipment for all primary level facilities, comprehensive obstetric care equipment for all secondary level facilities by 2017.</i> <i>2. Ensure consistent supply of essential medicines and commodities on a quarterly basis.</i> <i>3. Operationalize all the 6 constructed unopened facilities in the county and construct 8 new dispensaries: 2 Garbatulla, 3 Merti, 3 isiolo by 2017</i> <i>4. Increase facilities conducting deliveries from 20% to 80% by 2017</i>
	Minimize exposure to health Risk factors	<i>To continuously facilitate and strengthen comprehensive disease surveillance activities within the county by December 2017.</i>
	Strengthen collaboration with Health Related Sectors	<i>To strengthen the health Stakeholders' Forums on quarterly basis by December 2017</i>

Table 1.4 County Health objectives as per Isiolo County Health strategic plan

The plan will enable the County define and monitor critical interventions needed to attain its health goals and guide the County in resource mobilization for implementation of its defined priorities.

2.0. Objectives of the assessment

2.1 Main Objectives:

The Quality Needs Assessment (QNA) was done as a follow up of recommendations based on the **preliminary Health Facility Assessment of the Primary Care System**⁷ in Isiolo carried out jointly by the County Health Management Team (CHMT) and CCM/LVIA in June-July 2014, with the main aim of identifying the facilities that could be included in the project.

The QNA had the main objective of deepening the preliminary analysis, concentrating on the quality of services provided by the identified facilities. In particular, the QNA aimed at:

1. Analyzing the quality of the primary health care services provided by 15 Health Facilities (2 Health Centres and 13 Dispensaries) in Isiolo County;
2. Providing indications and/or recommendations on possible actions to improve the health delivery and quality of care and interventions aimed at increasing the quality of the primary health care services in the Health Facilities and communities involved in the Project.

2.2 Specific Objectives:

As requested, the Quality Needs Assessment focused on ALL the selected Health Facilities, in order to:

1) **Analyze the delivery and quality of care** of health services provided, in respect of the minimum standards foreseen by the Kenya Essential Package for Health (KEPH), with a particular focus on:

- Knowledge, skills and competences of Health Workers employed in the assessed facilities,
- Availability and utilization of updated national clinical protocols and guidelines,
- Quality of the preventive and curative maternal and child health services provided,
- Availability and utilization of standard tools for DHIS data collection and reporting,
- Availability and correct utilization and storage of pharmaceuticals and medical products,
- Status of the 5 dispensaries to be opened by end of November 2014 (staff appointed, physical infrastructure, available equipment and suggestions for equipment to be purchased according to the list of minimum requirements provided by CHD of Isiolo).

(2) Review the **access to health services**, with a particular focus on:

- Patient-provider relationship,
- Universal accessibility to services (possible financial, geographical and cultural barriers),
- Friendly services for vulnerable categories of the community (adolescent and disabled).

3) Study the **application of the Community Health Strategy**, as per the KEPH guidelines and recommendations:

- Availability and quantity of CHU,
- Availability and quantity of trained CHW,

⁷ CCM (2014). Health Facility Assessment: Primary Health Care System in Isiolo County, June – July 2014

- Role and responsibilities of the CHC.

3.0 Methodology

3.1 Research protocols & tools

The consultant carried out a desk review of CCM project document, KEPHs, Kenya Health Policy 2012-2030 and Isiolo County health strategic plan among other documents to better understand the context of the survey. The desk review also informed on the development of data gathering tools. Survey instrument tools were based on generic questionnaires developed by the MEASURE DHS project and were adapted for QNA.

Data collection tools were developed to respond to the following basic questions:

1. To what extent are facilities prepared to provide essential services? What resources and support systems are available?

At each facility, the assessment used structured *questionnaires for the in-charge* and *Provider Interviews* to collect information on whether a facility has the capacity to provide the service at acceptable standards. Quality of services which is one aspect of capacity is measured by the following characteristics of facilities: training and supervision of staff, availability of service delivery protocols and client education materials, availability and use of health information records and the service delivery environment.

2. To what extent does the service delivery process meet generally accepted standards of care?

The interviewers observed interactions between clients and providers to assess whether the process followed in service delivery meets standards for acceptable content and quality.

Observers sat in on consultations for sick children and antenatal care (ANC) services. The interviewers recorded what information was shared between the client and the provider and what processes the provider followed when assessing the client, conducting procedures, and providing treatment. They also checked for the availability of written protocols or guidelines for each of the services assessed.

3. What issues affect clients' and service providers' satisfaction with the service delivery environment?

Clients/beneficiaries of health services were asked to participate in an exit interview to ascertain the client's perception of information shared and services received. This information provides further insight into the quality of the client-provider interaction. Also, providers were interviewed about their training and satisfaction with their work environment.

Components assessed are those commonly promoted in various programs supported by the government and development partners.

- i) The ***child health component*** of the survey was designed to assess the availability of preventive services (immunization and growth monitoring) and outpatient care for sick children with a focus on the process followed in providing services. Service provision was compared with the standards set in the guidelines for the World Health Organization's Integrated Management of Childhood Illness (IMCI).
- ii) The ***maternal health component*** assessed counseling and screening during ANC visits.

4. Extent of application of Community Health Strategy as per KEPH guidelines

Components of community health units and availability and quantity of CHWs was assessed through a guided in-depth interviews with community health workers including community health extension workers in focused group discussions.

On the basis of the findings of the preliminary Health Facility Assessment jointly conducted by Isiolo CHMT and CCM, the consultant developed tools that were used in collecting relevant information on the quality and preparedness of the 15 health facilities involved by the project.

The developed tools included:

1. **Health facility in-charge questionnaire:** close-ended questionnaire focusing on academic background of staff, services provided, service fees for services etc (please refer to Annex 1 for the questionnaire format). The questionnaire was administered to the in-charge of all facilities, for a total of 11 questionnaires filled-in.
2. **Health care provider questionnaire:** close-ended questionnaire focusing on professional background, experience in delivering health services, training received, working conditions, supervision etc (please refer to Annex 2 for the questionnaire format). The questionnaire was administered to a total of 14 staff, including Clinical Officers, Nurses and Midwives.
3. **Observation guide** (of the CHWs): the topic guide allowed standardizing the observation of CHWs while providing care to the community. Observation focused on ANC and sick child consultations giving particular attention to the patient-provider relationship established and the quality of the clinical examination carried out (Annex 3 and Annex 4)
4. **Exit interview:** the questionnaire was administered to patients accessing care at the facility before leaving the premises. Questions aims at exploring the patients' perceptions and feeling in regard to the assistance and care received by the CHW. Particular attention was given to services sought, availability of drugs and information regarding the illness. (Annex 5, Annex 6 and Annex7)
5. **Focused Group Discussion** (FGD) guide for CHCs and CHWs : the topic guides helped facilitating the discussions among CHW and community members. The groups discussed among other topics health activities are carried out at the community, roles CHWs play, job aids they use , barriers local communities face in receiving care, services and support from the facility, kind of support CHCs receive from the facility/SCHMT or NGOs, What motivates them to work well, linkages between CHC and health facility in delivery of services etc . (Annex 8 and Annex 9)

A total of 7 FGD were conducted in mixed groups

The survey instruments were pre-tested at Waso dispensary within Isiolo Sub County and adjustments made before actual data collection commenced.

The consultant identified and trained a team of research assistants who were taken through all the assessment tools. The assistants under the guidance of the consultant participated in the pretesting of the tools to enable them familiarize themselves with the entire proposes of data collection.

3.2 Research authorization, informed consensus and Privacy

The QNA was discussed and agreed upon between CCM and CHMT during the planning phases of the project, with the main goal of collecting relevant information on the quality of care provided by the HFs supported by the action and guide an effective planning of activities.

The team consisted of 3 research assistants; they were all registered nurses with over 6 years of working experience in delivery of primary health care. CCM endorsed their candidature as research assistants. They were trained for one day on data collection tools. However prior to the commencement of pretesting of the tools and actual collection of the data, authorization was sought from the County Health Executive by the assessment consultant. The research methodology and data collecting tools were shared and discussed with the Executive teams to ensure the understanding of the research objectives and methodologies. No formal ethical clearance was required in this exercise because it was not a scientific research study.

All study participants were provided with adequate information regarding the assessment. Consent was obtained from all the participants. Privacy and confidentiality of the informants was observed.

3.3 Research team and schedule

The assessment was carried out by a team comprised of one CHMT member, the consultant and 3 research assistants. In each Sub County, one member of SCHMT joined the team. The CHMT/SCHMT were fully involved throughout the assessment process, to ensure this was in line with the County Strategic Plan and its findings could support the planning and implementation of strategic activities within each sub-county.

Data collection exercise was done from **17th November to 3rd Dec 2014**. On average, data collection took one day per facility. Every effort was made for teams to visit facilities from early in the morning, when normally a higher number of clients and patients are presumed to access health; afternoons were reserved for carrying out focused group discussions. If a service was to be offered on the day of the visit but no clients came, the teams did not revisit the facility.

The distances between the facilities were vast with very difficult terrain hence a significant amount of time was taken on the road.

3.4 Analysis of data

Management of questionnaires in the field: After completing data collection in each facility, the interviewers reviewed the questionnaires before handing them over to the team leader who reviewed them a second time.

Data entry: Data was entered in an Excel software program. All questionnaires were entered twice to ensure that the data had been accurately keyed in.

Data processing: The design of the tabulation plan and the preparation of the programs for producing statistical tables were carried out from in December.

Data analysis including clarification of unclear information, was carried out in December.

4.0 Results

4.1 General Overview of the assessed facilities

In total, 100% (n=15) of pre-selected facilities were visited and assessed. Majority of the facilities (n=13) visited were dispensaries (87%), while 27% (n=2) were Health Centres. These facilities in the project sites (Figure 3.1) form part of a network of health facilities located in rural and remote areas of Isiolo County that provide both preventive and curative health services.

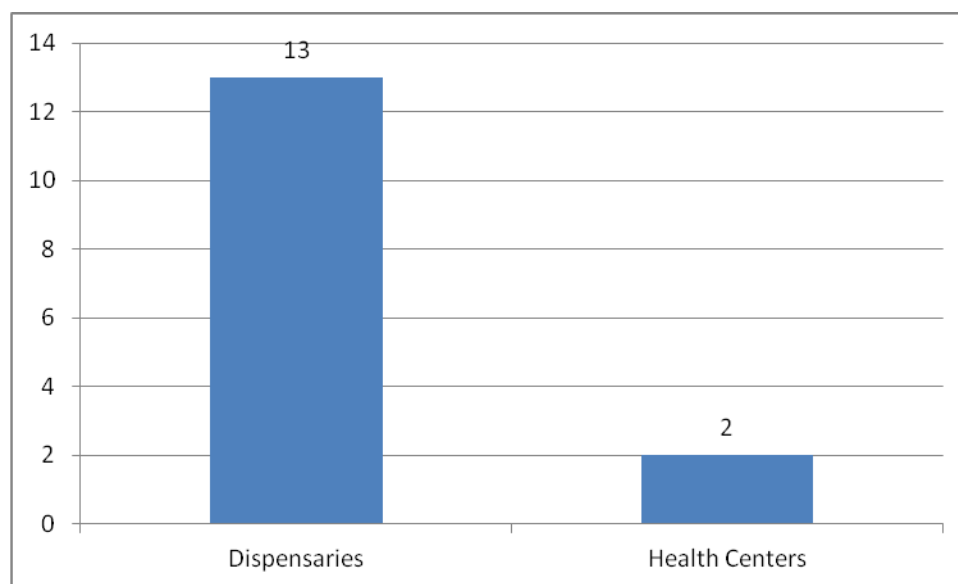


Figure 3.1: Health facility by type

Of the 15 assessed facilities, 11 were functional while 4 were nonfunctional at the time of assessment .

Four **nonfunctional facilities (Bula Pesa, Daba, Duse and Biliqo Marara)** were excluded from the QNA for reasons that they are not offering any health services and therefore could not be assessed. They are not operational because they are structurally unstable and therefore unsafe for public use (Bulapesa) or they lack furniture (Biliqo Marara, Bulapesa). Duse lacks a toilet. All the four nonfunctional facilities lack basic health equipment and staff. The team visited the non operational facilities and met with opinion leaders from the communities and interviewed them. When the team visited Bandana, Dadacha Basa, Korbasa dispensaries they found Health providers away attending training in Isiolo, the team however interviewed them in Isiolo after conclusion of the training. CHWs attached to the facilities where the staff was away, were providing first aid to the communities, and were interviewed. Tupendane dispensary, a community supported facility in Isiolo Sub County is a busy facility but is in poor state of disrepair while Bula pesa dispensary is nonfunctional and requires major structural renovations before any activities can begin. Table 5 presents a breakdown of the facilities visited and of the outcomes of the field assessment. All the HF visited presented comparable standards of infrastructure and space, with exception of Tupendane dispensary which was converted from a house to a dispensary. It is a very dilapidated building and requires major rehabilitation or relocation to a new building.

	Name of facility	Type of facility	Sub county	Status of Functionality	Cadre	No.	Remark
1	Bula Pesa	Dispensary	Isiolo	No	None	-	Major renovation need
2	Tupendane	Dispensary	Isiolo	Yes	Reg. nurse	1	Dilapidated
3	Eremet	Dispensary	Isiolo	Yes	Reg nurses	2	
4	Daba	Dispensary	Isiolo	No	None	-	
5	Badana	Dispensary	Garbatulla	Yes	Reg nurses	2	
6	Malka Daka	Dispensary	Garbatulla	Yes	Reg. nurses	2	
7	Kinna	Health Centre	Garbatulla	Yes	Nurses	4	
					Clinical Officer	2	
8	Muchuro	Dispensary	Garbatulla	Yes	Reg nurse	1	
9	Duse	Dispensary	Garbatulla	No	None	-	
10	Korbesa	Dispensary	Merti	Yes	Reg nurse	1	
11	Malka Galla	Dispensary	Merti	Yes	Reg. nurse Enrolled nurse	2	
12	Merti	Health Centre	Merti	Yes	Reg. nurse	4	Non functional theater
					Clinical Officer	1	
					Health Records	2	
					Lab tech	1	
13	Dadacha Basa	Dispensary	Merti	Yes	Reg. nurse, Enrolled nurse	2	
14	Matarba	Dispensary	Merti	Partial	Reg. nurse	1	
15	Biliqo Marara	Dispensary	Merti	No	None	-	

Table 5 Status of assessed facilities, summary of staffing and functionality

4.2 Delivery and quality of health care services provided

4.2.1 Staff

Availability

The assessment found that health facilities were staffed with qualified and well trained clinical staff with more than 3 year- experience providing essential health services. Only in Merti health centre it was observed that a CHW was dispensing drugs at the pharmacy without any supervision. Overall, **4 dispensaries (Tupendane, Muchuro, Korbesa and Matarba) had one nurse each assigned to the facility while 5 dispensaries (Eremet, Badana, Malka Daka, Malka Galla and Dadacha Basa) had 2 nurses assigned.**

In the **2 Health Centres**, Kinna had **6 staff** (4 nurses and 2 Clinical officers) while Merti had **4 nurses** (1 clinical officer, 1 lab technologist and 2 health record officers). According to the County Health Executive Office (CHEO), 2 nurses are required to be assigned in each dispensary. Based on these findings, it may be worthy indicating that **only 5 over 9 dispensaries (56%) meet the national (or county) minimum standard of staffing**. The team was not able to get the minimum staffing for Health Centres from the CHMT. Annex 1 shows available health cadres and status of each facility. Nursing was the main cadre (n=22, 79%) of staff working in the assessed facilities, with at least 1 nurse available in each of the facilities (as shown in Figure 4 below).

A part from qualified clinical staff, 2 partners IMC and ACF have employed community health workers in each facility to support health staff in implementation of high impact nutrition care.

Each dispensary has 2 CHWs, Merti health centre has 6 while Kinna has 3. They were recruited by partners and receive a monthly stipend of Ksh 2,000. They support health staff in running the nutrition interventions by weighing children, entering client information in the registers, issuing nutrition supplies and giving health education talks at the facilities. They are also tasked with defaulter tracing of children enrolled under nutrition program.

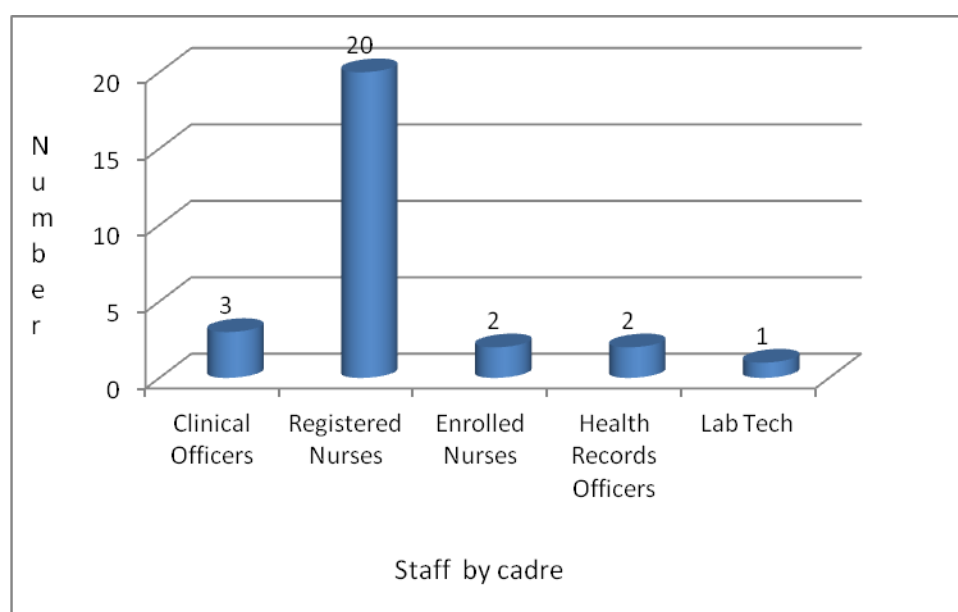


Figure 4: Number of staff by cadre

Training

To maintain levels of knowledge and technical competence, health service providers must continually be exposed to new information and clinical trainings. The team assessed whether during the preceding 24 months health providers had received any formal or structured pre-service or in-service training related to the services they offer. **In the last 24 months, staff from all facilities have benefited from various essential health care service trainings from CHMT or from its health development partners.** Among the trainings and seminars, providers reported to have received: EmOC, Malaria, Nutrition, PMTCT, HIV and

Cold chain management. One staff reported having been trained on IMCI as well. Trainers for each thematic areas are sourced from a pool of training of trainers (TOTs) within the County. They provide training as per existing national guidelines that stipulates who is to be trained (cadre), length of training, methodology and use of specified training manuals.

The team also found that CHMT has not put in place a coordinated mechanism that monitors staff attending training and seminars. It was evident that some staff have received more trainings than others. Since these facilities provide similar health services, it is important that trainings received by health providers are of similar categories. Apart from formal in-service training, the team noted that providers receive new information/updates and individual instruction related to their work during routine supervisory visits or from partners following up on specific interventions at the facilities in form of on-job training (OJT).

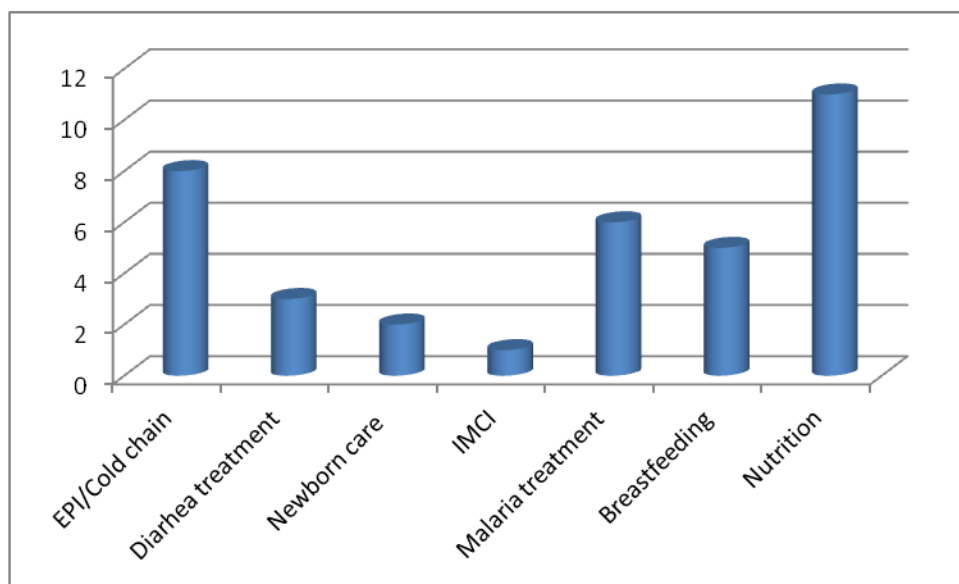
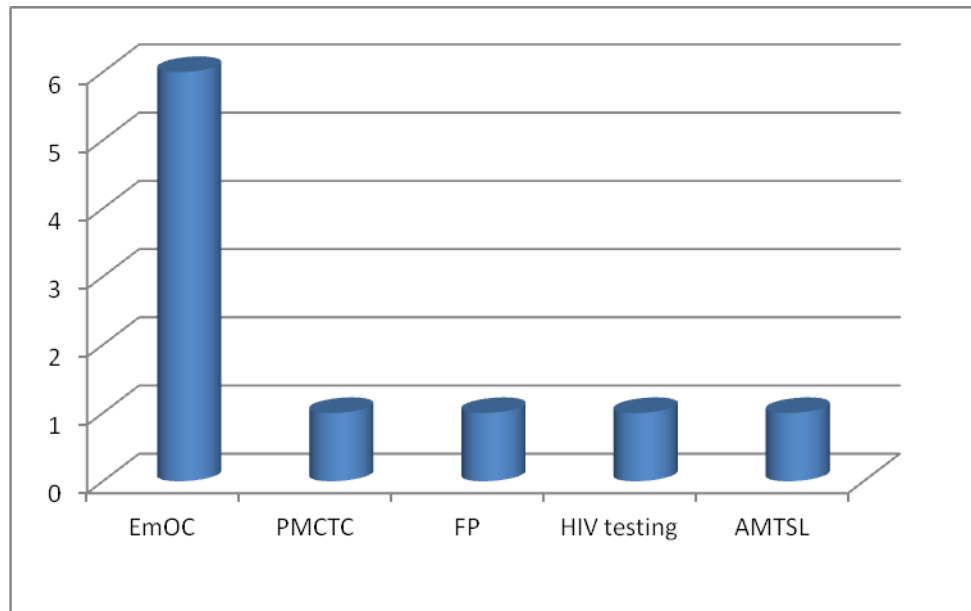


Figure 5 Type of trainings on child health services in the assessed facilities



*AMTSL: active management of third stage labour

Fig 6 Type of training by topic and number of health workers trained on ANC services in the assessed facilities

CHMT together with partners have been providing trainings for health providers in order to continuously build their knowledge and skills. The assessment however found out that **only one health provider had been trained on IMCI in the last 24 months**. Given that the sick child consultations are the most sought for service in all facilities, it is important that all health staff benefit from this training.

Mentoring and supervision

Supervision of health service providers is carried out by a team of CHMT on quarterly basis while SCHMT supervise them on monthly basis. CHMT has **no supervisory tool that is utilized** during the visits. Supervision is done to assess each staff's strengths and weaknesses in order to identify and provide appropriate support. All of the interviewed health service providers reported being personally supervised at least once every month. During the supervision, the team checks on the facility records (reports and registers), provides feedback on any administrative or technical issues and discusses challenges the health provider faced in doing their duties. There was **no formal appraisal for individual staff**, however a verbal feedback on their performance was often given during supervisory visits. The team however found a thin line between facility supervision and health provider supervision. The team also found that staffs are requested to attend trainings without planning for their replacements at the facilities to ensure continuity in delivery of health services. There was **no mechanism to monitor staff absenteeism** given that most facilities are in remote areas and not linked to the mobile network. Evidence of external supervision was observed from the visitor's book whose entries show that members of SCHMT and CHMT supervise dispensaries and Health Centres monthly or quarterly respectively, or through on ad hoc visits. **The cold chain is specifically supervised by KEPI staff on monthly basis**. Each facility has a KEPI supervisory book where supervisors make comments on the state of the cold chain. The purpose of the KEPI supervisory

visit, feedback, recommendations and any follow up actions regarding the cold chain are well documented in the supervisory books. Given the absence of a comprehensive supervisory tool by the CHMT that focuses on specific health services (eg FP, Nutrition, OPD, Drugs) and on staff, it can be assumed that support supervision by either CHMT or SCMHT may not be exhaustive as intended. Apart from the KEPI supervisory book, no other standard registers that captures supervisory visits exists.

Professional Capacities

The assessment found that health facilities are staffed with **qualified and well trained clinical staff** with over three years experience providing essential health services. The health workers have professional training capacities to provide all basic health services. The actual capacity in providing specific services was linked to availability of supplies and equipment at the facilities. MCH, OPD and referral services were well provided. Patients are welcomed and treated well throughout the visit and are taken through examinations in a professional and humane manner. The cultural set of the rural community is such that care givers accompany the client/patient up to the point of care including at the point of clinical examination. Privacy is therefore relative in such circumstances. In Kinna HC, women attending ANC were examined in full view of other women attending ANC. All health providers looked and wrote comments on the ANC booklet. **Not much information is given to clients by health providers during consultation and thereafter regarding any subsequent follow up.** Diagnosis was done correctly in all the observations. Dispensaries are encouraged to provide delivery services to pregnant women given it is the only health facility close to the community. The County has made deliberate efforts to ensure delivery services are available by providing dispensaries with basic equipment such as delivery coaches, requisite drugs, training of staff, buckets etc at all facilities. nevertheless the team found that deliveries are not being conducted due to what they said was lack of running water. **Almost all facilities have rain water harvesting systems** (gully traps, storage tanks and piping) **but none was found functional** and water has to be brought from outside. Health workers indicated that deliveries are always required a lot of water to clean up after a delivery and which is not readily and adequately available at any of the facilities.

Challenges

- **The main challenge at the facilities is understaffing.** According to the County staffing standard, each dispensary is to be staffed by 2 nurses, accordingly only 5/11 have minimum staffing. Kinna health centre is a more busy facility than Merti HC. Merti has a better infrastructure than Kinna. But neither have a pharmacist, in Merti drugs are dispensed by a CHW while in Kinna a nurse dispenses drugs. Kinna does not have a health record officer while Merti has two.
In the four dispensaries not operational (Daba, Bulapesa in Isiolo Sub County, Duse and Biliqo Marara in Merti Sub County) CHMT is responsible for assigning staff and supplying drugs.

Challenges of Training

- CHMT does not have a coordinated mechanism that monitors staff benefiting from training from CHMT or by partners.
- No updated training list is available with CHMT for staff that have been trained when and in which thematic areas.
- No training needs assessment of staff or mapping of staff that have benefited from specific trainings is available from CHMT

- Overall, only 1/28 HW attended IMCI training, 3 on Diarrhea management and 6 on Malaria Treatment. These training may be important to ensure staff are well updated on new guidelines issued by MOH

4.2.2 Protocols

Availability / adherence

The team assessed on the availability and adherence of protocols at health facilities.

Guidelines on Management of Malnutrition in U5 children and on **EPI/Cold chain Management** were observed in all facilities visited; whereas **IMCI guidelines** only in 3 facilities (27%), and **ANC Integrated Services guidelines** in 7 facilities (66%). **Visual aids** for teaching health education to child-caretakers were available in 2 facilities (18%) and to ANC client counseling in 3 facilities (27%). Only one visual aid for teaching health education was in Kiswahili, while the rest were in English. No visual aids in the local spoken languages (Borana and Turkana) were available at any of the facilities.

Health providers were assessed on whether they adhere to standards for providing quality services during sick child consultations, using observation checklists based on IMCI guidelines. A total of 8 provider observations were done and the key findings are reported below:

IMCI assessments: The assessment of sick children for IMCI general danger signs (inability to eat or drink, febrile convulsions and vomiting) during sick child visits is poor. Overall, only 25% (n=8) of observed sick child consultations involved assessment for all three general danger signs.

Treatment: The use of antibiotics is common, even when it may not be warranted. For example, two thirds of children diagnosed with malaria were treated with antibiotics in addition to anti malarias. Moreover, children rarely receive the first dose of prescribed or provided oral medications at the facility; and less than half of caretakers were observed being told how to administer medicine at home.

Information to caretakers: Health staff seldom provides caretakers with essential information regarding their children's illness. Only 14% of caretakers received all three pieces of advice recommended in the Integrated Management of Childhood Illness (IMCI) guidelines regarding fluids and food intake, and bringing the child back immediately for specified symptoms.

Challenges

- There is a general **lack of important guidelines in the facilities**, this may result in health providers managing patients and clients without following recommended standards;
- **Visual aids in Kiswahili are more preferable than those in English**, they are more user friendly both to the audiences and CHWs who need to use them when giving health education at facility level. However, only one of the visual aids found at the facility was in Kiswahili with all the rest being in English
- **The limited participation of care providers in IMCI training** (1 out of the 28 health staff) hinders proper management of sick children accessing care at facility level

4.2.3 Quality of MCH services

ANC

An individual **MCH booklet** issued by MoH (revised 2013) is used to monitor maternal condition during pregnancy, delivery, postnatal, FP and for the infant until the child reaches 5 years. All first visit ANC clients should receive physical examination and documented in the MCH booklet while revisits should receive periodic assessments and examinations to monitor the progress of pregnancy such as measurement of blood pressure and the identification of any danger sign or risk factors for both maternal and fetal conditions.

The 9 ANC clients observed by the team at the time of the visit were all revisits and initial history had already been taken. However almost all clients blood pressure and weight was measured.

Counseling by providers on various warning signs in pregnancy was observed in 35% of clients while the provider was seen to look at or refer to the MCH booklet during all the consultations. Not all topics suggested by the MCH Booklet (danger signs (vaginal bleeding, fever, severe abdominal pain), sleeping under a net, taking Iron/folic acid tablets, nutrition) were discussed with the health provider during the visits although it is reasonable to assume that not all topics could be discussed at every visit since most women make multiple ANC visits. Fetal position was assessed for all ANC clients who were at least eight months pregnant. Providers wrote on the booklets of all (9/9) ANC clients. The booklet provides a more reliable way to achieve continuity of care by maintaining an up to date record of relevant history and findings as well as interventions or treatments provided. The assessment found that MCH booklets for ANC clients are readily available in all the facilities and are issued free of charge on registration to all pregnant women coming for the first ANC visit. **Preventive services provided to ANC clients** include TT, deworming, Iron and folate, LLIN and HIV screening and Nevirapine for the mother (Nevirapine suspension is available at Kinna and Merti Health Centres only). Dates when these services are provided and date when the next visit is due are entered in the booklet by the health workers.

Important **diagnostic tools** such as urine examination (glucose, protein) and checking of hemoglobin (for anemia) for monitoring maternal health are not available at any of the visited dispensaries. These services should be provided as per national schedule and protocols as part of KEPH minimum standards.

Remarkably, all facilities offer TT vaccines five days a week and distribute free ITNs to ANC clients on first contact.

Privacy during client examination is assured in all 11 ANC facilities (visual and auditory privacy) while 3 dispensaries (Muchuro, Badana and Malkadaka) require mobile screens to enhance the privacy. All facilities had lockable doors to the examination room and privacy was assured when this door was closed, mobile screens enhance privacy in the event the door is unexpectedly opened.

Drugs to manage common complications of pregnancy (such as amoxicillin, membedazole, methyldopa, clotrimazole) were generally available at all facilities except for antimalarial drugs that were out of stock.

Overall, essential supplies for basic ANC services such as Blood Pressure apparatus, Foetoscope, Iron tablets, Folic acid tablets and Tetanus toxoid were available at all facilities. Merti and Kinna health centres had each only one functional Blood Pressure machine that was being shared between OPD and MCH. Dispensaries were supplied with a BP machine and stethoscope. Emergency obstetrical care services are not available either in Kinna or Merti Health Centres. This is because these are lower level facilities that are not expected under normal circumstances to provide this service. In Merti, a Clinical officer specifically trained to provide EmONC services is not able to provide cesarean sections due to lack of

equipment and theatre staff. **Merti is one of the facilities set to be upgraded to a sub County hospital as part of the CHMT strategic plan.** Women with pregnancy complications from Merti Sub County are usually referred to Isiolo hospital while women from Kinna Health centre in Galbatulla Sub County are often referred to Maua hospital in Meru County since it is the nearest compared to Isiolo.

MCH supplies

The following MCH supplies were available both at the dispensaries and Health Centres

- MCH booklets,
- Registers – U5, ANC, Delivery, PNC, FP,
- Cold chain with vaccine supplies BCG, Polio, PENTA, Measles, TT
- Iron and folate tablets
- Vitamin A and de-worming tablets
- LLIN
- Contraceptives methods, including injectable, condoms, implants and oral pills

Equipment

- Fetoscope, delivery beds and examination coaches
- Blood pressure machine & stethoscope
- Weighing machine (adult & child)

Almost all facilities had one functional blood pressure machine and stethoscope. At Merti Health Centre, the BP machine was being shared with other departments. Each service point requires having its own and preferably an extra one reserved for use as a spare.

Challenges

- lack of diagnostic tools in ANC services such as Uri sticks for testing urine protein, ketones, nitrites and glucose
- Challenge in conducting facility based deliveries due to lack of running water
- Lack of referral forms
- Shortage of antimalarial drugs
- Absence of training materials in health education such as flip charts and flyers and other promotional materials for use by health staff and CHWs

Safe delivery

While ANC services are routinely provided at all health facilities, **delivery services are available at Merti and Kinna Health Centres only.** The assessment found that all dispensaries have the ability to conduct deliveries: they have qualified staff, delivery beds and other necessary equipment but lack running water. Lack of water is a general challenge in the community and at the dispensaries in general. Cleaning up after a delivery requires much water that is not available. This was the only major challenge health providers cited as obstacle to the provision of skilled attendance to delivery. During FGD, it was noted that most mothers deliver at home with assistance of TBAs. **The assessment found that health staffs from over half of the facilities are called to attend home deliveries either routinely or only in cases of emergency.** This kind of support system from a health facility may increase a woman's chances of having a safe delivery given that research has found that every pregnancy is at risk; therefore, every pregnant woman should receive skilled care during delivery. The concept of domiciliary care operates on the understanding that skilled care can be provided at the community level. A common approach is for facility staff to attend home deliveries. The team would like to interrogate CHMT on whether domiciliary care is a strategy they

support or would be willing to promote among health workers as they prepared to strengthen delivery services at the dispensary level.

Alternative delivery services

During Focus Group Discussion with CHWs, it was revealed that a section of TBAs are paid as much as 500 Ksh per delivery or receive half of a slaughtered goat meat or both to conduct deliveries in the villages. The CHWs recognized the need to have facilities to begin delivery services since this cost was prohibitive while the same service would have been offered for free at facility level. Over one third of health workers interviewed indicated they conduct home deliveries rather than at the facility level due to lack of running water for cleaning purpose after an institutional delivery. It is the responsibility of other women to bring adequate amount of water to a mother whose delivery will be conducted at home. **The home delivery service by the skilled birth attendant is offered for free.**

Referrals

The assessment collected information on whether facilities have any official printed forms to be used as minimum document to report the reasons for referral and list any treatment already provided to the client. Overall, half of all facilities report that they refer clients outside the facility but **lacked any official printed referral forms**. When clients are referred to another facility without any formal documentation, they risk being refused to be attended or have services delayed while the referral facility reassesses them as new clients. Thus, having a systematic means to refer clients to a higher-level (or different) facility is an important aspect of quality of care.

Growth monitoring/nutrition

Nutrition and growth monitoring activities are available in all the functional facilities, under the direct supervision of health facility in charges. In each dispensary, 2 CHWs have been recruited by partners (IMC or ACF) to support health facility in charges in the assessment and enrollment of children with malnutrition. The recruited CHWs provide health education at the facilities and villages, growth monitoring services in under 5 attending child clinics, weighing and distribution of nutrition supplements, follow up of malnourished children and defaulter tracing. The partners that provide high impact nutrition interventions also support with weighing equipment, nutrition supplies and training of CHWs and health providers.

Immunization

Immunization service is available every day at all health facilities except for BCG and measles that are available once a week. TT is also available for ANC clients every day at all facilities. CHWs attached to facilities (supported by partners) are involved in tracing children that have defaulted in immunization alongside identifying malnourished children and defaulters of nutrition program in the community.

OPD U5

Child health services are relatively integrated in all the health facilities assessed, providing immunization, growth monitoring and curative outpatient care for sick children including Vitamin A supplementation and provision of LLIN to children under one year. Outpatient curative care for sick children is the most commonly offered of these three child health services, through five days in a week at the dispensaries and 7 days at the health centres. Health providers routinely provide emergency services for sick children beyond working hours. Mother and child health cards that provides continuum of care for under 5 are available at all facilities and are issued free of charge. Kenya promotes IMCI strategy in curative treatment

of sick children and therefore counseling and treatment protocols and visual aids for providers are expected to be available at all facilities.

Treatment guidelines which should be available for quick reference were observed in 3 facilities (27%) while visual aids for health education were observed in 2 facilities. However the observation of U5 consultations revealed a number of gaps in the delivery of quality care and specific training should be considered to reinforce the respect of the IMCI protocols (see findings of U5 consultation observations reported above).

The general absence of visual aids at facilities may have contributed to the health providers unable to give health education to caretakers during consultations for the sick child

Supporting continuity of care

Providers of sick child services wrote on the MCH card during or after a consultation, and this was done in all of the observed consultations. This is an important step in ensuring continuity of care across the first five years of age of the child.

It was observed that CHWs attached to facilities provide first aid to all members of community including U5 whenever the health provider is not available.

Health education

Health education sessions are done at health facilities either by health providers or CHWs attached to health facilities. At the health centres, health education often targets groups of women attending ANC clinic and those bringing children for immunization, nutrition support or for treatment. **The facility in charge is responsible for drawing a schedule of health education sessions to be discussed.** The topics are shared between the health provider and CHW attached to the facilities. Common topics for discussion include: hand washing, immunization, ante natal care, nutrition, FP among others. Topics differ from among different facilities. CHWs give health education to communities on hygiene and sanitation whenever supported by a partner. During community development meetings (barazaas), CHWs (and occasionally health staff) are invited by the local administration to give health education. The meetings give members of the community opportunities to ask CHWs questions related to health issues affecting them. One of the major challenges in health education is shortage of teaching materials such as posters, flip charts take home brochures and demonstration equipment. Red Cross in the past trained community health volunteer in Galbatulla Sub County on sanitation focusing on use of latrines. In Malka Daka dispensary 20 were trained and when support to from partner ended they are unable to continue with the activities.

4.2.4 HMIS/DHIS

Data collection

Data collection is done by the health providers (nurses) both at the dispensaries and health centers. They are also responsible for compiling monthly data from registers into a summary form. Activity data is recorded on daily basis on universal registers issued by the Ministry of Health from clients and patients accessing MCH and OPD services. There are two types of registers; activity register and reporting registers. **Activity registers available at the facilities are:** Child Welfare Clinic (MoH) 511, Family Planning (MoH 512) ANC MoH 405, Post natal MoH 406, HTC MoH 362, Tuberculosis Treatment Unit reg, OPD - U5 OPD, OPD over 5 and adults, The Permanent Reg and Lab Reg MoH 240. Reporting registers are two: MoH 711 and MoH 731.

The registers are simple to use and the health provider only needs to enter specific information regarding the client/patient, diagnosis and treatment/service provided. Each register is specific for each service delivery. Registers are regularly supplied during supervisory visits or during delivery of drug supplies, no stock outs of any of them were reported. Merti HC has two health records officers that are responsible for receiving data from all the facilities in Merti sub-county.

Data reporting

At all the health facilities, health providers responsible for data collection are also responsible for data reporting. A summarized data reporting tool is provided by MoH and facilities report activities on monthly basis using the summary data tool. Since the nurses have to compile reports from different registers, during interviews they all complained on the big workload they face every month as they are also expected to attend patients. **Only one nurse (out of 28 working in the targeted facilities) has had training specifically on HMIS in the last 24 months.** Reports are physically taken to the sub county offices in Galbatulla, Isiolo and Merti by the health workers **before the 5th of the next month.** No validation of data is made before submission. Data from all facilities once received is taken to Isiolo and inserted to the DHIS.

Challenges

- There are about ten registers to be recorded by the health provider in addition to two other registers for reporting. Health workers mentioned they are overwhelmed every end of the month as they summarize data from the registers and try to beat deadline of report submission. This may compromise quality of data and monthly report compilation
- Only one nurse was trained on HMIS from among 28 interviewed

4.2.5 Storage of drugs/equipment

Infrastructure

Each health facility is provided with dedicated drug stores that are well secured and lockable. Drug stores in all facilities have adequate space for storage purposes except for Merti and Kinna Health Centres that have small rooms that are inadequate for the supplies they receive. Only Merti and Kinna Health Centres have dedicated drug dispensing rooms (pharmacies). At the dispensaries, drugs are dispensed in the same room where consultations are done. Almost all drug stores are poorly ventilated, a few have broken or missing window panes. None of the stores are fitted with electric fans to keep drug stores cool in the hot and arid weather environment, despite most facilities are connected to either main power or solar electric system.

Storage conditions

To prevent chemical deterioration and contamination, medicines should be stored in dry conditions above the ground in an area protected from water, sun, pests, and rodents and in well-ventilated rooms. All drug stores are fitted with shelves where medicines are stored, large boxes containing other medicines are kept on the floor, few have wooden pallets. Drug stores in 7 dispensaries were found in poor state of organization while 2 had fairly well organized stores. In Kinna and Merti Health Centres drugs stores were congested and inadequate for storage. The poor storage conditions were evident by either leaking roofs, medicines placed directly on the floor, lack or poor ventilation and presence of pests or rodents in the stores. Presence of bats posed the biggest menace in almost all facilities due to droppings in the storage areas and smell. Almost all facilities hold big quantities of expired medicines that occupy significant space in the store making it very challenging to keep stores organized and maintain any tidiness. None of the

facility drug stores is fitted with a thermometer to monitor daily room temperatures since most medicines deteriorate quickly in hot temperatures. In Dadacha Basa, a large quantity of expired drugs was found dumped in an unused building next to the dispensary posing a big risk to the community. **The CHEO when asked about the expired medicine in the facilities said the issue was a big challenge in almost all facilities in the County.** Disposal, he said takes a long process and is not a County issue as it involves other government agencies such as National Environmental Agency (NEMA) and Drug and Poisons Board to verify before any disposal of expired medicines can be effected. He said it was an issue that was being currently deliberated by CHMT.

Dispensing practices

At the dispensaries, drugs are dispensed by the same health provider immediately after making the consultation. The drug dispensing area is the same as the consultation room. The nurse writes how drugs are to be taken on bottle (in case of syrup) or an envelope. Only in one instance a caretaker was asked to repeat how the medication is to be taken. No start doses were witnessed by the team being given except for injectable antibiotics. Over prescription was witnessed where a health provider gave more medicines than is necessary. In 3 out of 11 sick child observations, two children with symptoms of malaria were also put on an antibiotic, another put on an antibiotic for a cold. Remarkably all children presenting with vomiting or diarrhea or both were put on ORS besides other medication. It is a common approach to prescribe drugs that are currently available, but in the event a patient requires other drugs, the health provider gives a prescription and asks the patient to buy them from local pharmacies. All drugs prescribed are entered in a drugs register with name of patient, type of drugs and quantities dispensed. The register is updated at the end of the day and balances of remaining drugs entered. In all the facilities, the drug registers are properly updated on daily basis. At Merti Health Centre pharmacy, drugs are dispensed by a CHW; a big shift from other facilities where nurses dispense drugs. The CHEO when asked for comment said that he was aware about the challenge, in the past he said a pharmacist was posted at the facility but resigned after serving for a few months. He informed the team that CHMT was in the process of recruiting a new pharmacist to the facility.

Drug flow management

All facilities keep stock cards in the stores, inventories are updated and filled in properly whenever new drug supplies are received or drugs moved to the dispensing area. The stock cards are placed next to the drugs and any drugs removed from the store to be dispensed are entered on the card on regular basis. A date when the stock card was opened is indicated, drug name, a column of entries and another for issued are well captured in all facilities. Batch numbers, manufacturing and expiring dates are not captured on the stock cards. A random check was performed in all the 11 facilities on the card entries showed consistencies between available drug stocks and balances. At the dispensing area (dispensaries and Health Centres) facilities maintain a dispensing register that is updated on daily basis. Random samples of medicines at the dispensing areas were counter checked and compared with entries in the pharmacy register in 11 facilities without significant inconsistencies noted.

Facilities employ 'first expire first out' approach in dispensing of the drugs.

Cold chain

Cold chain is available in all assessed facilities and is well managed and supervised. A big effort has been done to partner with UNICEF in getting cold chain equipment at county level, such as solar refrigerators, freezers and installation of solar system to power the refrigerators. Another partner, namely Government of Spain, is also working with Ministry of Energy and has provided an independent solar system to power 4 health facilities of Malka Daka, Malka Galla, Dadacha Basa and Korbasa. The cold chain is well maintained in all the 11 facilities with daily temperature readings, stocked with adequate vaccine supplies, vaccine carrier boxes, registers, syringes and needles. KEPI interventions are supervised on monthly basis by public health nurse in charge of KEPI at County and sub County level. The team found that each facility had a KEPI supervisory book where supervisors make comments on the state of the cold chain. Comments include: purpose of the KEPI supervisory visit (e.g delivery of vaccines, registers), status of the cold chain, feedback on any cold chain information, follow up on any previous action and recommendations. In Matarba, a newly opened dispensary, the cold chain is powered by LPG gas; while in other 9 facilities the cold chain is powered by solar energy except in Merti Health Centre that is connected to the power grid. The cold chain is regularly maintained by the health providers while major repairs are undertaken by a technician based in Isiolo Hospital.

Drug availability/stock outs

All facilities had adequate supply of medicines and vaccines but lack buffer stocks or emergency stock set aside. All drugs to the facilities are procured by the County from Kenya Medical Supplies Agency (KEMSA), a government drug procurement and supply agency. Drugs and pharmaceuticals are supplied in kits specifically packaged for Health Centres and dispensaries. Drugs to facilities are supplied following a push system. Supplementary drugs to facilities are supplied by the County in case of unforeseen shortage but it was noted that facilities also borrowed medicines from other facilities in the event of a shortage of a particular commodity. Martaba, a newly opened dispensary, relies on Merti Health Centre for its drug supply as its not in the kit system yet. **The CHEO during his interview said a priority in the newly launched five year health strategic plan is to ensure adequate and regular supply of drugs to all facilities** through the kit system. At the time of assessment, there was no stock out of drugs eligible at dispensary and Health Centre levels except for malarial drugs for adults.

It was not immediately clear how the County utilizes information generated in the drug registers from facilities to plan for drug procurements and forecasts since no reports on drug utilization are submitted as part of HMIS

Challenges

- Shortage of BP machine and stethoscopes dedicated to MCH
- Lack of emergency drug stocks in all the facilities
- Most facilities hold large quantities of expired medicines
- Inadequate drug storage space at the Health Centers
- Poor drug storage conditions evidenced by leaking roofs and poor ventilation
- Availability and regular supply of drugs was a challenge, health workers mentioned that 4 months earlier they had run out of drugs at all the facilities. (The CHEO mentioned this was occasioned by delays in procurement at the county level but has since been rectified).

4.3. Access to health service

4.3.1 Patient-provider relationship

The patient-provider relationship was assessed through the observation of 9 ANC and 11 U5 consultations and the organization of clients' exit interviews. A total of 20 consultations were observed. Before leaving the facility, all the 20 observed ANC clients and caretakers of observed sick children were interviewed about their opinions of the consultation process.

Client's satisfaction

Clients exiting from ANC were asked opinions on services they had received. Outcomes of the interviews are reported below:

- None of the ANC clients had any concern on the waiting time before seeing a provider; this was probably due to low workloads on the part of the health workers. But they mentioned to have been annoyed occasionally whenever the health provider was away especially in those facilities where only one staff is working. Asked on what they do in such incidences, they said to usually wait until the health worker returns, despite the long time this may take; in case of an emergency, they rather opt to go to the nearest Health Centre. If the nature of the visit is not serious, they are often attended by CHWs and given first aid.
- Interviewed clients were also asked to mention specific warning signs that were discussed with the provider during the current or previous ANC visits. Less than half said they had discussed warning signs and symptoms in general however a small proportion (22%) of clients was able to name any of the warning signs. It is probable that health providers counseling is not effective due to a number of reasons, including the lack of adequate visual teachings aids at most facilities; the organization of group health education rather than individual talks; the low literacy level on the part of the client or lack of information leaflets (take home). Vaginal bleeding was the most commonly mentioned warning/danger sign that interviewed clients reported.
- All the interviewed ANC clients reported that the facility they were currently visiting was the one closest to their home and were all very satisfied with the services given and will recommend the facility to other families.

U5

Caretakers of observed sick children were interviewed about their opinions of the consultation process, the perceived quality of the provider's service, and the principal problems encountered on the day of the visit. Outcomes of the interviews are reported below:

- The interviewer read a list of issues commonly related to client satisfaction and asked the caretaker to rate whether each issue posed a major problem, a minor problem, or no problem (refer to Annex 5,6,7 for Exit Interview format). Time waited, availability of medicines, number of days services are available and how staff treated them were not a problem to any of the respondents. When asked about their choice of a health facility, all the respondents said the facility was the one closest to their homes. No user fees was charged in any of the services and they were all very satisfied with the services given and will recommend the facility to other families.

Providers' motivation

Providers' motivation was assessed by asking health care providers what they would like to see done at facility level that would improve their ability to provide quality care services. If they

mentioned more than three, they were asked to prioritize on three. If they gave less than three, they were probed further.

Outcomes of the interviews are reported below:

- Almost 70% of nurses said they wanted to have **regular training/updates** that are linked to the essential health services they provide. 20% wanted to see their facilities receiving **better working equipment and supplies**. **Transportation** for referrals was the biggest challenge they faced (80%) and wanted improved.

Challenges

- Absence of a reliable community referral system especially after the ambulances broke down.
- Understaffing especially in facilities with one health provider resulting in interruption in health care provision whenever the nurse was away.
- Availability of regular supply of drugs and essential equipment
- Availability of running water so they can conduct delivery services

4.3.2 Universal access:

Analysis of barriers to access (infrastructure, ethnic, religious exclusions etc)

In an attempt to address many of the problems related to quality and performance of lower level health facilities, the government introduced **direct fund transfers to dispensaries and health centers**, the **Health Sector Services Fund (HSSF)**. Part of the justification for its introduction was to off-set the loss of revenue health facilities experienced following the scrapping of user fees in the health sector reforms. Fund transfer to health facilities has been irregular and often delayed. **The policy in Isiolo County is to offer user-free health services in dispensaries and health centers in order to make services accessible to all families**. Survey findings show that all facilities offer free immunization services to children and to mothers attending ANC and FP clinics. The free service includes registration (MCH booklets), consultations, medicines and lab tests. **Referrals are however a family cost** (and to a greater extent community costs) since patients have to pay for the transport charges (hiring private vehicles is often very expensive).

Only Merti Health Centre has a functional transportation support for maternity emergencies with an old ambulance vehicle that is only dedicated to the facility. The ambulance serves the Health Centre, ensuring transport for complicated pregnancies and deliveries and other medical emergencies from Merti HC to Isiolo hospital. **Two new ambulances** purchased by the County to provide emergency services in the 2 sub Counties of Merti and Garbatulla are grounded but are currently undergoing repair in Meru. For the moment, families have to bear cost of hiring vehicles to bring their patients to the nearest health facilities. The County government supports running costs for the ambulances. According to the CHEO, each of the two ambulances was allocated to serve 3 wards (smaller administrative units under the sub county). The County health strategy is to eventually have one ambulance in each ward. Before they broke down, the ambulances were serving all the dispensaries within their areas. The CHEO indicated that the ambulances will be operational before the end of December 2014.

Utilization of the functional facilities by local communities is not in doubt, the community mentioned that the facilities are physically accessible, are the nearest facilities close to them and they offer services that are acceptable to them. When the team met with opinion leaders from the four facilities that are not

functional, the leaders were quick to say ‘our women and children have suffered for far too long as they waited for the facilities to be opened’.

Boran community is the predominant ethnic community in Merti and Galbatula sub counties; they are mostly Muslims while the minorities are Christians. Overwhelming majority of health care providers (nurses) are Christians and male working in the dispensaries. During interviews with the health providers, it was noted that pregnant women of Muslim faith delivering at home were being routinely assisted by male health providers. The reason for this acceptance in a Muslim community is of great importance since it is breaking access barriers to skilled delivery services and need to be strengthened and supported from a religious perspective.

None of the two Health Centres provide EmOC services, this make the referral of obstetrical emergencies to Isiolo compulsory; the biggest challenge being the long distance and often the impassable roads especially when it rains. Without a reliable public ambulance service, cost of hiring private vehicles is expensive to families.

Challenges

- Two health facilities are fitted with **VHF radios but are not operational** while the mobile phone network is either lacking or very weak. This poses a major challenge where mothers requiring emergency services or delivery assistance are not able to access either the ambulance or health providers. However it was noted that a mobile phone provider is currently erecting transmission masts in an effort to improve communication in Merti and Garbatulla sub counties.
- **Only one public ambulance is available at Merti Health Center**, it is dedicated to the facility to transport referrals to Isiolo hospital. Even then one vehicle would not be adequate to cover for emergency services in the vast Merti and Galbatulla sub-counties. Isiolo Sub County is considered to be more accessible than Merti and Galbatula and is served by ambulance based at Isiolo hospital.
- **Lack of running water** is the major reason why dispensaries are not able to conduct delivery services. This challenge may also discourage pregnant women from seeking other MCH services from health facilities.
- **BEmONC services are not activated** yet at any of the 2 Health Centres. Only two components are available: parenteral administration of antibiotics and parenteral administration of oxytocics. Other components (MVA, Vacuum extraction and treatment of Eclampsia) can easily be activated at HCs since there is availability of trained staff and supplies
- **Merti Health Centre has a ready theatre but requires essential equipment and trained staff**. Making it operational will greatly reduce individual and family risks and costs linked with referrals to Isiolo Hospital. CHEO indicated that they had posted a doctor to Merti HC to activate CEmonc. At the time of the assessment, no doctor had reported.
- **Four facilities are still non-functional** because they lack health staff, equipment, furniture and medical supplies. Duse was being supplied with furniture the day of the assessment but still it lacks toilets, These non functional facilities are meant to be the nearest health delivery points for the catchment population. Clients and patients have to walk long distances to other facilities in order to access health services.

4.3.3 Services to vulnerable populations

Facility based services

- **None of the facilities assessed provides youth friendly services, services to the elderly or disabled.** This does not mean these services are not required. In Dadacha Basa dispensary for example, the CHWs during FGD said that youth often requested condoms directly from them since they are shy of going to pick them from the health facility. For lack of a condom dispenser, CHWs place condoms in an unlocked room within the facility so that the youth can pick the condoms at their own time, without requesting and when they are not being seen.
- When the elderly and disabled are brought to the health facilities by the families, health providers routinely provide basic health services to them when sick as outpatients. They also refer them to other hospitals if they require specialized services or investigations.
- None of the health staff from the assessed facilities has been specifically trained to offer youth friendly services or to the disabled.

Community based services

CHWs were asked about the challenges that people with special needs experience seeking health services in their communities especially the disabled and elderly. The majority made reference notably on general lack of food and LLITNs (available only to children under one year and pregnant women), the lack of funds to pay for transport to the nearest facility and medication if not available at the facility. Moreover, they mentioned that they are sometimes neglected by family members who themselves may not have the means to support the elderly and disabled. CHWs mentioned that the elderly and disabled are becoming a community burden since they are either not productive or able to fend for themselves and depend entirely on the community's goodwill (or immediate families) for food, financial and medical support. Training of health workers and corresponding training of community health workers on management of vulnerable populations are likely to bring health benefits and better community understanding on how to deal with this category of the population.

Challenges

- Health facilities **lack appropriate environments and space to cater specifically to the needs of vulnerable categories** such as rooms dedicated for youth friendly services
- **Health providers are not trained on providing health services to vulnerable populations**, such as disabled and elder people
- **Community health workers lack appropriate knowledge**, skills and tools to respond to the needs of this population
- There are no partners that were identified to implement interventions targeting vulnerable categories in the assessed areas.

4.4 Application of the Community Health strategy

Implementing community health services is a top priority of the Ministry of Health and its partners in Kenya. This is well articulated in the **Kenya Health Policy 2010-2030** and **Kenya Health Sector Strategic and Investment Plan 2013-2017**. The **Kenya Essential Package for Health (KEPH)** introduced six life-cycle cohorts and six service delivery levels. One of its key innovations is the recognition and introduction of **level 1 service, which aimed at empowering Kenyan households and communities to take charge of improving primary health care and their own health**. Since the rolling out of the community health strategy in 2006, other players in the health sector like the civil society organizations (CSOs) and the Faith Based Organizations (FBOs) have meaningfully complemented the government's efforts in establishing community units aimed at empowering the communities to manage their own health. In line with the vision 2030, the government intends to scale up community units in the country and also work towards improving the health service delivery at level one.

4.4.1 CHU

Objectives, roles, mandate and ideal composition

In seeking to improve the health outcomes in Kenya, Kenya's Ministry of Health through its National Health Sector Strategic Plan II (NHSSP II) emphasizes on promotion of individual and community health. The purpose of the NHSSP II is to strengthen health services through several strategies, one of which is the community health strategy. Community health strategy establishes a level one care unit (**Community Health Unit**) to serve a local population of 5,000 people. Each community unit has a team of well-trained CHWs, providing services to 20 households each. For every 25 CHWs there is one Community Health Extension Worker (CHEW) providing supervision and technical support. CHEWS are trained health personnel and are MOH employees. Their responsibilities in the community health strategy include: facilitating trainings in the community, providing facilitative supervision to CHWs, and providing a link between CHWs and health facility⁸.

Through this approach, households and communities take an active role in health and health-related development issues. Its goal is to enhance community access to health care by providing health care services for all cohorts and socio-economic groups at household and community level; building the capacity of CHEWs and CHWs to provide community level services; strengthening health facility-community linkages; and raising the community's awareness of their rights to health services.

Analysis of existing CHUs

In Isiolo County, the community health strategy has not been fully rolled out neither community health structures have been fully established. This includes establishment of Community Health Units and identification of CHWs. **Within the 11 health facilities, there are 5 Community Health Units: Tupendane, Eremet, Merti, Kinna and Malka Daka.** They are all linked to the health facilities (Table 6)

During the assessment two categories of CHWs were identified;

⁸ Kenya Essential Package for Health. 2010. Available at: http://marsgroupkenya.org/pdfs/2011/01/Ministry_PDFS/Ministry_of_Public_Health_and_Sanitation/Documents/Taking_the_Kenya_Essential_Package_for_Health_to_the_Community.pdf.

- 1) CHWs trained by either IMC or ACF to support in high impart nutrition interventions. These CHWs work at the facilities and are responsible for growth monitoring and defaulter tracing for children enrolled in the nutrition program. They give health education at the facilities and in the community on nutrition. They are paid a monthly stipend of Ksh 2,000. Each dispensary has 2 of these CHWs while Merti and Kinna HCs have 6 and 4 CHWs respectively. **They are specifically linked to their facilities but not to a CHU.**
- 2) CHWs trained by partners such as Red Cross, AMREF, CHAT: CHWs in Galbatula Sub County were trained by Red Cross in 2013-2014 during the implementation of total led community sanitation project that was promoting use of latrines in the community. The project was engaging them on community mobilization, giving health education in sanitation, promotion of hand washing and registration of households. When the project ended, no other partner supported them in other community health activities. But once in a while during National Immunization Days (NID), MoH engages them in mobilizing communities. In Merti and Isiolo Sub Counties, CHWs were trained by AMREF in RH and nutrition.

CHEO indicated the County was in the process of strengthening existing CHUs (based in Isiolo Sub County) and establishing new units where they are not existing, this included recruitment and deployment of CHEWs to community units, training CHWs, CHCs, provide basic kits and reporting tools. There was no timeline from CHEO when this activity was likely to be implemented.

	Name of facility	Type of facility	Sub county	Availability of CHU	No. CHWs	Trained by	Availability CHC	Availability of CHEW
1	Bula Pesa	Disp	Isiolo	No	0	-	No	No
2	Tupendane	Disp	Isiolo	Yes	29	MoH	No	Yes
3	Eremet	Disp	Isiolo	Yes	38	MoH	Yes	Yes
4	Daba	Disp	Isiolo	No	0	-	No	No
5	Badana	Disp	Garbatulla	No	0	-	No	No
6	Malka Daka	Disp	Garbatulla	Yes	20	Red Cross	Yes	Yes
7	Kinna	H C	Garbatulla	Yes	20	Red cross	No	Yes
8	Muchuro	Disp	Garbatulla	No	0	-	No	No
9	Duse	Disp	Garbatulla	No	0	-	No	No
10	Korbesa	Disp	Merti	No	16	-	No	No
11	Malka Galla	Disp	Merti	No	0	-	No	No
12	Merti	H C	Merti	Yes	20	AMREF, CHAT	Yes	Yes
13	Dadacha Basa	Disp	Merti	No	30		No	No
14	Matarba	Disp	Merti	No	0	-	No	No
15	Biliqo Marara	Disp	Merti	No	0	-	No	No

Table 6 Summary: status of CHUs, CHWs and CHCs in CCM project sites

Engagement of community health workers (recruitment, training, activities, supervision and challenges

The community assessment examined the experiences and perspectives of CHWs related to their activities: their training, the services they provide, challenges they confront and their own perspectives on their activities and suggestions for improving their own work situation. Outcomes of the interviews with CHWs are reported below. A total of 173 trained CHWs are available within the 11 project sites and a total 67 CHWs were interviewed during the assessment.

Recruitment

CHWs were asked to share how they were recruited. Practically all the CHWs mentioned they were nominated by their village elders (not members of CHC), this is a common practice that is culturally acceptable among the pastoralist communities as they are responsible for making decisions on behalf of the communities they represent. CHWs were asked if they knew what being a CHW entailed, over half said they had no idea what they were being recruited to be and to do. Partners (Red Cross, AMREF, CHAT, FH, MoH) involved in implementing community activities such as sanitation and nutrition request for names of potential candidates that they would train as CHWs. After the training, the partners support CHWs carry out community health activities including mobilization and health education.

CHWs training and roles

Identified CHWs are expected to be trained on basic module (mandatory) and thereafter on various technical modules as per the training manual of the Ministry of Health⁹. A CHW that has participated in a number of different trainings is likely to offer a wider range of services. **But the assessment found that when a partner announced a new training for CHWs, the village elders often submit a list of 'new people' to be trained rather than target existing CHWs.** Descriptions of training received by CHWs are often brief and confused, however it was evident they were trained by more than 3 agencies (Red Cross, AMREF, MoH, CHAT) on the following topics: community sanitation, health promotion/education and household registration. Still, despite the unequal training given, nearly all the **67 CHWs interviewed** understood their role in health promotion and assisting the sick to obtain health care by referring them to a facility, assisting them in finding transportation, or actually accompanying them thereby playing a critical role of intermediary between the community and the facility personnel.

During the assessment, it was noted that activities that CHWs most often promote include teaching how to avoid diseases linked to poor sanitation, providing referrals, sometimes giving first aid and helping people get to a clinic or hospital for care. Also CHWs encourages the community to seek services provided at health facility level such as EPI, ANC and NUT. The assessment team observed that **CHWs do conduct active tracing for ANC and immunization defaulters.**

CHWs also mentioned that they advise pregnant women to deliver in a facility or if a home delivery to be attended by a skilled birth attendant. CHWs that are closely attached to facilities are also often involved in dispensing drugs and providing first aid whenever qualified health workers are away.

CHWs meet on a monthly basis where they present their reports to the CHEWs.

⁹MOH training manual for CHWs, 2007. Available from:
<http://wstf.go.ke/toolkit/Downloads/4.%20Manual%20for%20Training%20CHWS%28MoH%29.pdf>

The CHWs were all asked about the rewards and benefits they receive for their work. Nearly all said they are volunteers and work without a salary except for those attached to the facilities who receive a salary paid by the health program partner that trained them.

Other types of rewards CHWs mentioned to receive are transport or lunch allowance when they attend seminars or workshops. Finally about one-third of CHWs mentioned that being trained was a real benefit to them, and that they would like to participate in more trainings to allow them to widen their areas of interventions in the community.

Overall, there has been little attempt by partners and MoH to facilitate the work of CHWs particularly by assisting with local transport and essential items they might need.

Challenges in Service Provision

Community health workers listed several major challenges they face. One challenge mentioned by all the CHWs was **transportation** to their areas of operations and for clients to get to the nearest facility. A second major challenge mentioned by all CHWs refers to the **motivation or remuneration**. While they acknowledged that their work is largely voluntary, they still think that they deserve some form of payment for motivation. This feeling of deserving payment increases when they know that some CHWs attached to facilities receive monthly payments.

A third challenge is the **resistance from their communities in rolling out new initiatives** such as use of latrines and occasional shortage of medicines/supplies for clients that they have referred to facilities. They also lacked visual aids and materials for teaching, and where available they were written in English while they would prefer them to be in Kiswahili. The CHWs were all in agreement that reading and writing Boran language is difficult and preferred visual and teaching materials that are in Kiswahili which is well understood by the community.

CHWs, their concerns and suggestions

Near the end of the interview, CHWs were invited to suggest ways in which their situation and health services could be improved. They suggested a number of ways to increase the use of health care services and to improve the effectiveness of their own work. The CHWs indicated that their situation could be greatly improved if they could obtain assistance with training, transport, supervision and some material support. Key inputs by CHWs are reported below:

- Community health workers would like to strengthen their connection to the local health facility and CHEWs. More than 80% of those interviewed referred clients and sick individuals to facilities. However, **few CHWs reported that they received regular supervision from the CHEWs**;
- Nearly all CHWs reported that they need **assistance with transportation** to better visit households;
- The large majority of CHWs requested **greater recognition from the government for the work they perform**. They would like badges, certificates and uniforms. Such signs of significance would show the community that they are available to assist and also would link them more closely to the facility;
- While CHWs stated that they are volunteers, most of them want a **small monthly salary** to compensate them for the time spent in community;
- Nearly all CHWs would like **more training** on Maternal and Child Health, Nutrition, Reproductive Health and WASH areas in order to expand their capacities and scope of community activities.

4.4.2 CHC

Community Health Committees (CHCs) is one of the Community Governing Structures. Others include; Household; Village and Health facility management committee.

Based on the Community Strategy Community, each Community Health Unit (CHU) is to have a functional Community Health Committees (CHC) to oversee and supervise CHWs. **Only 3 CHC have been established in Merti, Malka Daka and Eremet. Members of CHC have not been trained and therefore are not conversant with their roles and responsibilities.**

The Functions of CHCs are to: Carry out assessment, dialogue and planning community activities based on available information. The committees are also responsible for promoting linkage and ownership of the health system as well as mobilize resources for community based health interventions.

Other functions of the CHC include: Identifying and supporting the community health workers (CHWs); Organizing and facilitating the household registration (mapping of households in a CHU); Facilitating household visits for the purposes of dialogue for behavior change, they also disseminate household information at the CHC meetings; Discuss the issues of health and enter them on the chalk board; Prepare the reports to the level 2 Health Committee; Facilitate linkages with other health and development partners as well as lead and organize the community for health action.

Analysis of existing CHCs

Community health strategy in rural areas of Isiolo County has not been rolled out effectively; and where it has been rolled out it is still very weak. In an effort to roll out community strategy, CHMT has already started posting community health extensions workers (CHEWs) in rural areas and linked to one or more health facilities in order to establish community units (CUs) and **strengthen the existing 5 units.** Once CUs are established, CHCs will be constituted. One CHEW is responsible for overseeing activities of 2 CUs, supervising work of the CHCs and CHWs. Due to shortage of public health officers and the need to increase number of CHEWs a strategy was devised where all middle level health cadres are being trained as CHEWs. **Nurses at some health facilities have been trained as CHEWs and are now responsible for setting up CUs but none of the health staff from project sites has been trained as a CHEW so far.**

Training and supervision

No information regarding either training or supervision of CHC was available on the ground during the assessment. CHCs are required to be trained in order to have relevant knowledge and skills to discharge their roles and responsibilities effectively. **CHMT needs to first establish community units before CHCs are constituted.**

Challenges

- Partners implementing community health activities are likely not to be very effective where CUs are weak or not established
- Implementation of Community Health Strategy is slow and where implemented it is weak.
- The slow pace of rolling out the CS has also affected setting up of CHUs and subsequently setting up of CHCs and recruitment of CHWs
- Retention of CHWs is linked to availability of incentives and require supervision by MoH

5.0 Conclusions and recommendations

5.1 Conclusion

1. Health service provision

Delivery of health services (both preventive and curative) are largely provided at the dispensary and Health Centre level. The 11 functional facilities cover a total population of 38,000 with a facility to population ratio equal to 1:3500. Moreover 4 new facilities have been constructed and should be made functional (with proper equipment and staffing) within 2 months.

2. Delivery and quality of health care services

Majority of health facilities are functional and therefore ready to begin interventions proposed by CCM once gaps identified have been addressed:

- There is a general **lack of important guidelines** (IMCI, ANC) at the facilities, this may result in health providers managing patients and clients without following recommended standards;
- **Limited IEC materials** were available in a few facilities and were in English;
- There is significant **shortage of staff** in most of the assessed facilities in Isiolo County, as per the KEPH minimum standard requiring 2 nurses in each dispensary.
- Although the sick child consultations is the most sought service at all facilities, the findings indicated **inadequate trainings of staff in IMCI** and on provision of health services to the vulnerable populations (elderly, disabled);
- **Majority of deliveries happen at home** and **BEmONC services are not available** in Kinna and in Merti Health Centres;
- Access to a reliable **referral services for maternal emergencies is largely lacking** and financial transport burden is borne by the family;
- Health facilities **lack appropriate environments and space specifically to cater to the needs of vulnerable categories** especially dedicated for youth friendly services;
- Mentoring and supervision of health care workers is done regularly by both the county and sub county teams. However the team was not able to appreciate the impact of the visits on quality of service delivery;
- Cold chain in all assessed facilities is well managed and supervised on regular basis.

3. Storage of drugs/equipment

- Almost all facilities hold consignments of expired medicines in their stores that requires to be disposed of urgently;
- Majority of drug stores require urgent repairs and organization in order to protect medicines from elements of weather and pests.

4. Application of Community strategy

- **Provision of health services at the community level is minimal** and is mainly on water and sanitation and household registration. This is mainly as result of inadequate roll out of the recommended Community Health strategy;
- Governance structures in the 5 established CHUs are weak.

5.2 Recommendations

Based on the findings of the assessment, the consultant and his team has drawn the following recommendations that shall be carefully discussed with the SCHMT/CHMT and CCM to check for their feasibility and consistency with the objectives of the County Strategic Plan and the goal of the project.

1. There is need to have an **integrated CHMT/SCHMT/CCM TAs and supervision** and provision of important national/County guidelines in all health facilities to ensure provision of quality health services;
2. The County government, in collaboration with development and or implementing partners, should allocate funds for **rehabilitation of the facilities that are in poor condition** to ensure appropriate working environment for health service delivery;
3. The following interventions are recommended for improvement of quality of health care services:
 - i) Delivery of **training** packages on:
 - a) Integrated Management of Childhood Illnesses
 - b) Focused Antenatal care package
 - c) Communication skills among Health care providers
 - ii) CCM to support **regular review meetings** (on quarterly basis). This will bring together CHMT/SCHMT, CCM and health providers to monitor progress of implementation in the supported facilities.
4. To maintain levels of knowledge and technical competence among health care workers, the County Health Team, supported by partners, should **put in place a coordinated and harmonized system of monitoring trainings received by health providers and develop an after training follow-up plan** to monitor whether knowledge acquired through trainings are linked to practice;
5. **Development of teaching aids** both for health providers and CHWs:
 - i) Development of teaching aids in the following thematic areas
 - a) Maternal health
 - b) Child health
 - ii) Type of materials to be developed
 - a) Posters
 - b) Flip charts
 - c) Take away reading materials
 - d) Documentaries (mainly to be used in Merti and Kinna Health Centres, as part of health education to groups of women attending ANC and caregivers for sick children on installed TV/DVD systems);
6. **The CHMT, in close collaboration with partners, should support the rapid establishment of community health units** especially those linked directly to facilities. The existing units require strengthening through:
 - i) Deployment of staff and in particular recruitment of CHWs;
 - ii) Training of:
 - a) CHEWs
 - b) CHWs
 - c) Sensitization of community opinion leaders on roles of CHWs;

- iii) **Support to CHW activities**, with particular attention to:
 - a) Development and supply of teaching aids (brochures, flipcharts, posters, reading take away materials etc);
 - b) Development of reporting tools;
 - c) Support to monthly meetings (transport refund, lunch, airtime);
 - d) Promotional materials (badges, bags, T shirts, shoes, umbrellas);
 - e) Explore other available incentives for CHWs in order to sustain community health services ;
 - iv) Setting support system of CHWs, through regular review meetings with CHWs, CHEWs and partners.
- 7. **Training of CHWs should be designed and delivered in phases** (several short training modules spread over time) covering more contents will likely increase the retention rate because CHWs will anticipate further training and probably assist in developing a career path as CHWs. The trainings should therefore focus on integrating CCM supported maternal and child health interventions into those currently being implemented.
- 8. **CCM to explore possibility of working with the others partners implementing community interventions** in order to increase impact of the activities on a larger part of population and avoid duplication of interventions. In addition, the community health intervention services have synergy when strongly linked with other grass root level functionaries such as those of water, sanitation and education. In addition they also lower the costs of routine monitoring and evaluation if they are jointly assessed.

6 Action plans

The Consultant propose the following action specifically targeting the most urgent gaps identified during the assessment. It is meant to guide the project steering committee in better focus possible project activities according to budget availability and eventually engage the CHMT and other partners in the identification of additional funds to implement the recommended actions

Title and description of training program	Duration	Training provider	Location of training	Timeframe	Remarks
Integrated management of Childhood illness (IMCI)	11 days	Consultant	Isiolo town	Feb-March 2015	Practical sessions to be done at Isiolo hospital, MCH clinic
Focused Antenatal Care package	6 days	CCM/CHMT	Isiolo town	March 2015	Practical sessions to be done at Isiolo hospital
Communication skills	4 days	CCM/consultant	Isiolo town	April 2015	Interactive training to build on provider/client relationship and communicating health information
On job training on <ul style="list-style-type: none"> - HMIS - IMCI - FAC 	1 day per facility	CCM/SCHMT	Facility based	Quarterly	Team comprised of <ul style="list-style-type: none"> - HRO* - RH* - Pediatrician
Follow-up of training participants	1 day per facility	CCM/trainer /SCHMT	Facility based	One month after initial training	To review practice of skills and reinforce competence gained during training
Review meeting	2 days	CCM/SCHMT	Galbatula, Merti, Isiolo towns	Quarterly	Participants: Health staff, SCHMT, representative of CHC from HFs

*HRO Health records officer

*RH Person responsible for reproductive health

Table(i) Action plan, in-service training schedule to address knowledge and skills gaps for Health Workers

Description of activity	Responsible	Timeframe	Remarks
Development of IEC materials focused on <ul style="list-style-type: none"> - Maternal health - Child Health 	Consultant	March 2015	IEC material to targets <ul style="list-style-type: none"> - Health providers - CHWs Consultant work closely with CCM/CHMT
Printing of developed IEC materials <ul style="list-style-type: none"> - Posters - Flyers - Brochures - Flip charts 	Printer/consultant /CCM	March 2015	Languages <ul style="list-style-type: none"> - Swahili - English
Development/adapting documentaries on health messages	Consultant	April 2015	Source documentaries from MoH, WHO, Partners
Procurement of TV screens and DVD equipment	CCM	April 2015	1 set each for Kinna and Merti HCs

Table ii) Action plan for developing/designing easy-to-use and culturally-accepted IEC materials to facilitate the dissemination of key messages on healthy practices and behaviors

Activity	Responsible	Timeframe	Remarks
Establishing CHU linked to 9 HFs	CHMT	Feb – April 2015	Daba, Badana, Muchuro, duse, Malka Galla, Dadacha Basa, Matarba and Biliqo marara excluding Bulapesa HF
Strengthening CHU linked to 5 HFs	CHMT	March 2015	Tupendane, Eremet, Malka Daka, Kinna and Merti
Establishment of CHCs linked to 11 HFs		March 2015	Except in Eremet, Malka Daka and Merti HFs
Recruitment of CHWs linked to 7 HFs	CCM/SCHMT/CHEW	March – April 2015	Developing criteria for CHW recruitment (education level, Gender, number – preferably 20-25)
Training CHWs on modules linked to PHC	CCM/SCHMT/CHEWs	In phases March April May	Modules: Maternal & Child Health, NUT, RH, HIV. Trainings to be conducted at nearest centres (Galbatula, Merti and Isiolo towns)
Recruitment of CHC members	CCM/SCHMT/CHEW	March -April	Developing CHC member recruitment criteria (Education, Gender, Nos)
Training of CHCs	CCM/SCHMT/CHEW	March - April	On governance as per CHS guidelines
Procurement of CHW promotional materials	CCM	March 2015	Bags, T-shirt, badges, caps (to be CCM branded)
Printing of CHW reporting and referral tools	CCM/CHMT	March 2015	Reporting and referral tools to be adapted from MoH tools
CHW monthly meetings	CCM/SCHMT/CHEW	Monthly	CHWs will bring activity reports and discuss any implementation issues
CHW/CHEWs review meeting	CCM/SCHMT	Biannual	2 days meeting to discuss implementation progress

Table iii) Action Plan for the creation/strengthening of at least 1 Community Health Unit linked to a HF involved in the Project

LIST OF ANNEXES

ANNEX 1: Questionnaire for the Facility in Charge: Information About Services

ANNEX 2 : Questionnaire for service providers

ANNEX 3 : Questionnaire per CHWs - SICK CHILD CONSULTATION

ANNEX 4 : Questionnaire per CHWs - Observation Guide ANC

ANNEX 5 : Exit interview for costumers : SICK CHILD

ANNEX 6 : Exit interview for costumers : ANC

ANNEX 7 : Client's Satisfaction Questionnaire

ANNEX 8 : Focus Group Discussion Guide with Community Health Committees and H. Workers

ANNEX 9 : Focus Group Discussion Guide with Community Health Volunteers

ANNEX 10 : Data per Facility

ANNEX 11 : ACTION PLANS

ANNEX 12 : MAP of CHU distribution