Save the Children

KANGAROO MOTHER CARE IN MALAWI

OVERVIEW

Malawi's implementation of kangaroo mother care (KMC) has progressed since its introduction as a pilot in 1999. The Ministry of Health (MOH), with the support of partner organizations, instituted policies and strategies that prioritized the care of small and preterm newborns. National guidelines for KMC were developed in 2005, and in 2015 the MOH launched the country's Every Newborn Action Plan (ENAP), which sets an ambitious goal of reaching 75% of eligible newborns with KMC by 2020 and 90% by 2035. Facility-based KMC services are tracked through the national health information management system (HMIS), which in 2015 was strengthened to include core indicators and standardized national registers and reporting forms for KMC. Today, KMC continues to be highlighted in guidelines, training, and campaigns to reduce the number of preventable deaths among newborns.

The World Health Organization and UNICEF featured Malawi's progress in reducing neonatal mortality rates (NMR) in the report Reaching Every Newborn National 2020 Milestones (2017). It is crucial that Malawi continues to move forward by increasing the coverage of KMC services, mentoring staff, improving KMC data quality and data use, and disseminating lessons learned from the KMC centers of excellence.

Table I. Status of KMC in Malawi by Strategic Area

Domain	Prior to and during 2014	2015–2017
Policy		
National Health Policy	KMC was integrated into national policy in 2005 through the Essential Newborn Care and it was incorporated into the MOH's workplan for 2005/06.	In 2015, the MOH launched the Malawi Every Newborn Action Plan (ENAP) (MOH, 2015), which emphasizes strengthening health systems to achieve the high coverage of interventions such as KMC. The coverage targets for facility-based KMC listed in the ENAP are 75% by 2020, 80% by 2025, 85% by 2030, and 90% by 2035.
National Guidelines	- The first national guidelines for KMC were published in February 2005 and revised in March 2009 to cover ambulatory and community KMC (MOH, 2009). The guidelines recommend that all babies <2500g be started on KMC and specified admission and discharge criteria for each facility level. In general, stable babies weighing 2000–2500g are initiated on KMC at the health facility and sent home. Mothers are given instructions on when to bring their baby back for follow-up. - KMC was included in the Child Health Strategy 2014–2020 as an intervention to avert neonatal deaths (MOH, 2013).	KMC was incorporated into the Integrated Maternal and Newborn Care training package.

	- KMC was incorporated in the Malawi National Reproductive Health Service Delivery Guidelines 2014–2019 (MOH, 2014), which specify that all babies with a birthweight of <2500g should be initiated on KMC.	
Country Support/Implementation		
Levels and types of facilities implementing KMC	KMC was established in all four central hospitals and in the majority of district hospitals. In 2014, all 87 hospitals were assessed; 79% of hospitals reported providing inpatient KMC services (Chavula, et al., 2015).	The majority of public hospitals implement KMC. The establishment of sick newborn care units in all the district hospitals is ongoing. However, there is a gap in coverage of KMC in the private for-profit hospitals.
Percentage of LBW newborns initiated on facility-based KMC	Using data from the 2014 EmONC survey, an analysis of KMC readiness showed that KMC initiation rates for all live births for facility deliveries at hospitals ranged from 0.6% to 17.4% (Chavula, et al., 2017).	About 21% of preterm/LBW newborns were initiated on facility-based KMC (including ambulatory KMC cases), according to an internal assessment conducted by SNL in 10 districts in 2016 (SNL, 2017).
Funding		Funding for KMC is a combination of donor and MOH funds. Government funds come as RMNAH and are not specific to intervention areas. However, most of the KMC capacity-building efforts and supplies are procured and distributed through partners, while government funding covers staff salaries. Funding gaps for KMC are mostly in creating neonatal units of care, increasing quality of care of LBW newborns, and advocating to prioritize KMC.
Research		
Major or program-based studies being conducted related to KMC currently	Several studies and program-based learning were conducted prior to or during 2014 including: - EmONC assessment (capture KMC service readiness) (2014) - Evaluation of KMC in Malawi (2012/13)	There are several studies being conducted on KMC. These include: - Assessment of early outcomes among newborns discharged from facility-based KMC in three hospitals (SNL) - Evaluation of the use of a customized wrap to improve uptake of skin-to-skin practices (SNL/SC Norway/LGH) - Assessment of the completion and quality of data collected on birthweight at health facilities (LSHTM/SNL) - Evaluation of approaches to improve measurement of service readiness for small and sick newborns (LSHTM/SNL) - Malawi is a site in the Immediate Parent-Infant Skin-to-Skin study (IPISTOSS) looking at initiating KMC in unstable babies
Knowledge Management		
Centers of excellence or state-of-the-art facilities for KMC/care of LBW babies		Two health facilities are considered KMC centers of excellence: Queen Elizabeth Central Hospital and Thyolo District Hospital. Lessons learned from these centers have been: leadership to promote KMC as a priority, identifying staff at the health facility to be trained on KMC, and showcasing improvement when providers report and document progress of KMC babies.

KMC Manuals, trainings, and campaigns	Between 2008 and 2011, KMC was included in maternal and newborn manuals and trainings (SNLW2 and MCHIP).	- The Care of Infants and Neonatal (COIN) course (MOH & PACHA, 2015) was developed by the Paediatric and Child Health Association (PACHA) of Malawi in partnership with the Ministry of Health, and UNICEF in 2015 to train healthcare workers in facilities to care for young infants and neonates. This course includes a section about the three categories of KMC—facility, ambulatory, and community—that exist in Malawi. - A task force was formed to harmonize mentorship packages for MNH, including KMC. The meetings are ongoing. All partners supporting health programs are in this task force as it covers all thematic areas e.g. MNH, nutrition, HIV, malaria, child health, etc. The task force started operating in 2017 after establishment of the Quality Management Directorate in MOH. - The National Quality of Care tool has been adapted and is being finalized by the Quality Management Directorate and partners. The plan is to disseminate the tool with the policy and roadmap in November 2017. The Quality of Care tool is very comprehensive and includes KMC.
Monitoring & Evaluation		
KMC indicators included in the national HMIS	32 data elements were collected, but standard indicators were not defined in the DHIS2.	The DHIS2 monthly reporting forms were revised and 8 data elements and 5 core KMC indicators were included in 2015.
KMC data recorded at health facilities	Some facilities used a KMC register developed by MoH, Save the Children, and partners. KMC has been part of the integrated supervision at national, zonal and district levels. KMC registers were used by some health facilities receiving partner support to track KMC services. The 2014 Emergency Obstetric Newborn Care (EmONC) was the first survey to capture information about KMC services at the national level.	- In 2015, a national routine reporting system for KMC services was rolled out to replace the original KMC register and monthly report. This reporting system, comprising a register and a monthly report, track KMC services at the facility and district levels. Facilities report on six data elements with inpatient KMC, two data elements without inpatient KMC, and five core indicators (Save the Children, 2015). According to an analysis of the DHIS2/HMIS 2016 data, 87% of hospitals reported providing KMC services and 45% of health facilities submitted reports on KMC. However, at the health center-level it is difficult to estimate how many facilities have operational KMC services. - In 2016, an integrated neonatal register with accompanying mobile app was piloted in 10 districts, led by the Pediatric and Child Health Association. - The critical care pathway (bedside patient chart) for sick newborns and a feeding log were introduced in six hospitals.
Advocacy		
Professional organizations that endorse KMC	The Nurses Council was instrumental in including KMC in the Registered Nurse Midwifery (RMN) curriculum in 2005.	The Pediatric Association of Malawi advocated for KMC by introducing the Care of the Infant and Newborn (COIN) training course, which integrates essential newborn care and LBW baby care (MOH & PACHA, 2015). As of 2016, the Association was providing KMC mentorship in 10 district hospitals.

Champions	Dr. Queen Dube, pediatrician at the Malawi College of Medicine, attended the Istanbul Convening for KMC Acceleration and was an early KMC champion in Malawi.	- There are strong local champions who promote KMC, one of them being the Chief of Health Services. There is strong presence at the national level for KMC but a lack of resources. - Dr. Queen Dube, has mentored three national-level pediatric and midwife mentors that help her provide mentorship, coaching, and supervision to district hospitals for newborns.

Table II. DHS Proxy Indicators for KMC

DHS Indicators Related to KMC (Malawi DHS, 2015-16)		
Identification of LBW babies	**Characteristic**	**Percent**
Percent distribution of live births in the three years preceding the survey by mother's estimate of baby's size at birth, according to background characteristics	*Very small*	4.3
	Smaller than average	11.6
Percentage of births that have a reported birthweight		83.9
Percentage of babies weighing less than 2.5 kg among births with a reported birthweight		12.3
Initial Breastfeeding		**Percent**
Percentage of children born in the past two years who started breastfeeding within one hour of birth		76.3
Percentage of children born in the past two years who started breastfeeding within one day of birth		96.2
Skin-to-Skin Contact		**Percent**
Percentage of births that have skin-to-skin contact among most recent live birth in the three years preceding the survey		67.4

CHALLENGES

- KMC has been looked at as an additional service, which might explain why only a small percentage of preterm/LBW babies are reached with KMC services.
- Although some midwives initiate preterm/LBW babies on KMC, this is not the case at some health facilities where other services are prioritized.
- There is need to invest funds in making KMC spaces larger, creating neonatal units of care, and increasing quality of care of preterm/LBW babies.
- KMC is taught in hospitals, which is helping change people's attitudes, but advocacy and SBCC for the newborn needs strengthening.

LESSONS LEARNED

- Integrating KMC in national policies, guidelines, and training manuals has facilitated the scale-up of KMC in Malawi.
- Local champions, including the MOH, with a track record of promoting KMC, play an influential role in scale-up and improving quality of newborn care.
- Improving HMIS data quality for KMC services will allow Malawi to better identify gaps in coverage, quantify achievements, and mobilize resources for KMC.
- The commitment of the MOH, partners, and other stakeholders is critical for KMC to increase coverage and be sustainable.

FUTURE ACTIONS

- Integrate care of small and sick babies in neonatal care units in all hospitals.

- Disseminate the Quality of Care assessment tool and develop National Quality of Care Standards.
- Continue the training of mentors.
- Standardize the follow-up of KMC babies after discharge.
- Allocate resources for forums to share lessons learned and for the advocacy of KMC.
- Engage private hospitals and healthcare providers in the use of KMC as an evidence-based intervention that saves lives.

DOCUMENTS AND RESOURCES

Document Title	Link to Document
Care of the infant and newborn in Malawi. The COIN Course (2015)	http://cms.medcol.mw/cms_uploaded_resources/41905_12.pdf
Social and Behavior Change Communication Campaign (SBCC) *Khanda ndi Mphatso Lipatseni Mwayi* (A Baby is a Gift, give it a chance) (2016)	www.healthynewbornnetwork.org/hnn-content/uploads/Final-KMC-Flipchart-March-10-2016.pdf
Evaluation of Kangaroo Mother Care Services in Malawi (2012)	www.mchip.net/sites/default/files/Malawi%20KMC%20Report.PDF
Malawi Emergency Obstetric and Newborn Care Needs Assessment (2014)	www.healthynewbornnetwork.org/hnn-content/uploads/Malawi-EmONC-Report-June-2015_FINAL.pdf
Development of a National Routine Reporting System for Kangaroo Mother Care (KMC) Services in Malawian Health Facilities (2015)	www.healthynewbornnetwork.org/hnn-content/uploads/KMC-Register-Brief-and-Forms-Final-2015.10.09-web.pdf
KMC Register and Report (2016)	www.healthynewbornnetwork.org/hnn-content/uploads/KMC-Register-Brief-and-Forms-Final-2015.10.09-web.pdf
Born too small: who survives in the public hospitals in Lilongwe, Malawi? (2015)	https://search-proquest-com.proxygw.wrlc.org/docview/1780450562?pq-origsite=summon&accountid=11243
Investigating Preterm Care at the Facility Level: Stakeholder Qualitative Study in Central and Southern Malawi (2016)	https://doi-org.proxygw.wrlc.org/10.1007/s10995-016-1942-z

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