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ANTENATAL BIRTH PREPAREDNESS AND COMPLICATION READINESS AMONG WOMEN WHO HAVE UNDERGONE FEMALE GENITAL MUTILATION IN NORTH EASTERN KENYA IN 2015

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ANTENATAL BIRTH PREPAREDNESS AND COMPLICATION READINESS AMONG WOMEN WHO HAVE UNDERGONE FEMALE GENITAL MUTILATION IN NORTH EASTERN KENYA IN 2015

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ABSTRACT

Background: **Female genital mutilation (FGM) causes a wide range of obstetric complications with associated poor pregnancy outcomes. Antenatal care (ANC) provides an ideal opportunity for birth preparedness and complication readiness in women with FGM.**

Objective of the study: **To assess birth preparedness and complication readiness following antenatal care visits among women who have undergone female genital mutilation in North Eastern Kenya.**

Study design: **Descriptive cross sectional**

Study Setting: **Garissa Level 5 Hospital, Kenya (GL5H)**

Study Participants: **311 postnatal mothers who had received antenatal care**

Results: **The prevalence of FGM was found to be 85%. 80% mothers attended 2 or more antenatal visits and started at least by 14 weeks gestation. Of these, only 4% (11/263) were asked about type of FGM they had undergone, while only 6% (15/263) were examined for FGM status during their antenatal visits. On birth complications associated to FGM, only 11% (29/263) were informed about bleeding, episiotomy and perineal tears, 9% (24/263) were informed about poor neonatal outcomes, 10% (26/263) were informed about need to deliver in an emergency obstetric care (EmOC) facility. Of the 85% who had undergone FGM, 7% (19/263) were informed about de-infibulation and 5% (13/263) about re-infibulation. Only 7% (18/263) were informed about reduction in dyspareunia, reduction in dysmenorrhoea and increase in urine passage after delivery.**

Conclusion: **Antenatal care, which offers an opportunity for prevention of obstetric complications and better pregnancy outcomes among women who have undergone female genital mutilation, is underutilized.**

INTRODUCTION

Female genital mutilation (FGM) especially type three also known as infibulation commonly practiced in the North Eastern Kenya, is associated with obstetric complications. FGM is defined by the World Health Organization (WHO) as a procedure that intentionally alters or causes injury to the female genital organs for non-medical reasons.[1] About 140 million girls and women worldwide have undergone FGM, of these, more than 70% reside in Africa. Each year an estimated 3 million women are at risk of FGM[2]. In Kenya, an estimated 21% (2.26 million) of girls and women aged 15-49 years have undergone FGM[3]. There are significant regional variations in the burden of FGM in Kenya, with most (98%) of the cases occurring in the North-East regions, inhabited by people of Somali origin, of whom 75% of the women have the severe type III, infibulations [4].

Some underlying causes of FGM include culture, increasing marriageability and male sexual enjoyment[5]. Immediate complications of FGM include severe pain, shock, haemorrhage, tetanus or sepsis, urine retention, open genital sores and injury to nearby genital tissue[1,6]. The long-term consequences include recurrent bladder and urinary tract infections, cysts, infertility, dysmenorrhoea, dyspareunia, keloids, obstetric complications and HIV infection[1, 6-10]. The antenatal period provides an opportunity for health workers to educate women and other household members about the health consequences of FGM. The antenatal FGM health education package includes FGM related health information, prevention messaging, identification of the type of FGM, creation of a birth plan in relation to FGM type and management of FGM related complication[11-15].

There is a paucity of data regarding use of antenatal care to prevent FGM and manage its complications in pregnancy in Kenya. Given the high prevalence of FGM in this area, the study sought to determine the prevalence of FGM and assess the level of birth preparedness and complication readiness given during antenatal care visits among women who have undergone female genital mutilation in North Eastern Kenya.

This is the first study in the Northern part of Kenya to assess the level of birth preparedness and complication readiness given during antenatal care visit, among women who have undergone FGM.

MATERIAL AND METHODS

Study design: This was a hospital based cross-sectional study, conducted between February 2015 and March 2015.

Study Setting: The study was conducted in Garissa Level 5 Hospital (GL5H), a rural referral hospital in the North Eastern part of Kenya, where the prevalence of FGM is high. The hospital conducts 300 deliveries in a month. The Kenyan National Reference Manual for Management of complications pregnancy, childbirth and the postpartum period in the presence of FGM[18] recommends identification of women with FGM in pregnancy and complication readiness. However, GL5H does not have a hospital specific protocol or guideline.

Study population: Study population consisted of all postnatal mothers up to 2 weeks postpartum at GL5H who had received antenatal care in any facility within Garrisa County. Those included were emancipated minors, women between 18-49 years of age and those who gave informed consent. The study excluded postnatal mothers who were very sick.

Sample Size: A total of 311 postpartum women were enrolled.

Data variables: The study collected the following variables: socio demographic, clinical, FGM related health education

provision at antenatal clinic, birth preparedness, complication readiness for those with FGM, future intent of FGM practices, and receptivity of FGM related information provision.

Data collection and management: Eligible participants were enrolled in the postnatal ward and clinic. All postnatal women were interviewed consecutively. Data was collected by trained research assistants using a pretested structured questionnaire.

Data analysis: Descriptive statistics were employed in the assessment of antenatal birth preparedness and complication readiness among women who have undergone female genital mutilation. Data was analysed with SPSS version 20.

Ethical considerations: Ethical approval for this study granted by Kenyatta National Hospital/University of Nairobi Ethics and Research Committee. In addition to the ethical permit, permission to carry out the study in the facility was granted by GL5H administration. Consent was also sought from postpartum mothers before being interviewed.

RESULTS

The study reached a total of 311 postpartum mothers, who were interviewed at GL5H between February and March 2015 and their data analysed. The mean age of participants at GL5H was 25.2 years (SD 6.4). Of all the study participants, 97% were aged between 20-24 years. Over 85% were married, of Muslim religion and of Somali origin. More than half at 63% were not educated nor employed. Those who had a parity of between 1 and 3 were 63%, and more than 40% had at least 2 ANC visits. 54% presented between 15-28 weeks gestation on first ANC visit, and had undergone FGM with a prevalence of 85% as shown in table 1.

Table 1

Socio-demographic and reproductive characteristics of the participants

Characteristic	Total Frequency (%) N=311
Socio-demographics **Age**	
<20 years	69(22)
20-24 years	97(31)
25-29 years	63(20)
30-34 years	52(17)
=>35 years	30(10)
Marital status	
Single	20(6)
Married	278(90)
Divorced/Separated	11(3.5)
Widow	2(<1)
Religion	
Muslim	270(87)
Catholic	20(6)
Protestant	21(7)
Ethnic group	
Somali	266(85)

Other	45(15)
Education level	
None	197(63)
Primary	67(22)
Secondary	35(11)
Tertiary	12(4)
Gainfully employed	
Self	63(20)
Spouse	192(62)
None	56(18)
Reproductive characteristics Parity	
Para 1-3	196(63)
Para 4-6	57(18)
Para 7-9	38(12)
Para =>10	20(6)
Number of ANC visits	
1 visit	44(14)
2 visits	125(40)
3 visits	83(27)
4 visits	54(17)
=5 visits	5(2)
Gestation at first visit	
≤ 14 weeks	96(31)
15-28 weeks	168(54)
≥29 weeks	47(15)
Have undergone FGM	
Yes	263(85)
No	48(15)

Table 2 shows ANC birth preparedness and complication readiness information among postpartum mothers with FGM. Only 4% (11/263) and 6% (15/263) of women with FGM were asked about the type of FGM and examined for FGM status during their antenatal visits. On birth complications associated to FGM, only 11% (29/263) were informed about bleeding, episiotomy and perineal tears, 9% (24/263) were informed about poor neonatal outcomes, and 10% (26/263) were informed about need to deliver in an emergency obstetric care (EmOC) facility. Of the 85% who had undergone FGM, 7% (19/263) were informed about de-infibulation and 5% (13/263) about re-infibulation. Regarding post-delivery changes, only 7% (18/263) were informed about reduction in dyspareunia, reduction in dysmenorrhoea and increase in urine passage after delivery.

Table 2

Antenatal birth preparedness and complication readiness among participants

	Total
Components of preparedness	**Frequency (%) N=263**
Asked about type of FGM	11(4)
Examined for FGM status	15(6)
Informed about Birth complications due to FGM	
Bleeding	29(11)
Episiotomies	28(11)
Perineal tears	28(11)
Poor neonatal outcomes	24(9)
Need to deliver in EmOC facility	26(10)
De-infibulation	19(7)
Re-infibulation	13(5)
Informed about post delivery changes	
Reduction in dyspareunia	18(7)
Reduction in dysmenorrhoea	19(7)
Urine passage increase	19(7)

DISCUSSION

This is the first study in Northern part of Kenya to assess the level of birth preparedness and complication readiness given during antenatal care visits, among women who have undergone FGM. Antenatal care has always been a strategy by health care workers to identify mothers at risk of birth complications. The opportunity for the potential to be utilized was present with more than 80% mothers attending 2 or more visits and starting at least by 14 weeks gestation. This depicts a great period where mothers were exposed to health workers and represents a missed opportunity compared to evidence from the Kenya Demographic and Health survey (2008) showed very low antenatal care (ANC) attendance among this population, with about 70% not attending any ANC care. [4]

From the 311 women who had delivered at the facility, 263 had undergone FGM (85%). Amongst this number only 4% (n=11) were asked if they had undergone FGM and 6% (n=15) were examined for FGM status. Bleeding was the most common (11%) birth complications that mothers were informed of and a further 19 women (7%) were offered de-infibulation services. The level of birth preparedness and complication readiness given during antenatal care visits was 4% and 6% respectively. The region has a high FGM prevalence (98%) and most women (75%) have undergone the most severe form of FGM (type III) [3, 4]. Despite this, and the presence of 'Kenyan National Reference Manual for Management of Complications, Pregnancy, Childbirth and the Postpartum Period in the Presence of FGM[15], the study established that little or no FGM related information was provided. This is evidenced in a study among the Abagusii that showed less than half at 43% health providers reported ever discussing FGM with their clients[16].

A cross sectional study among the Somali found that the health system is ill equipped to serve women who have been cut, and particularly infibulated women who are pregnant and delivering. This stems from an overall weakness in the availability and quality of maternal and neonatal heath services in North Eastern Province.[7] A cross sectional study done in Switzerland showed that opportunities to identify FGM are frequently missed and recommended that measures should be taken to improve FGM

diagnosis and care.[13] Healthcare professionals in Gambia despite being in an area where the prevalence of FGM is 76.3%, only 40.9% had seen a girl with the complications of FGM indicating a possible deficiency in identification, management and prevention of complications of FGM.[17] In a study done in Nigeria it was found that health education intervention had a positive impact on the attitude of respondents towards FGM. However, for sustainable behavioural changes that will lead to elimination of FGM practice, they recommend placing FGM elimination efforts within a comprehensive development strategy and the larger context of reproductive health and gender education in Nigeria.[13]

The main limitation of this study is that the reasons for a low level of birth preparedness and complication readiness during antenatal care visits were not explored. This could partly be attributed to a lack of implementation and use of the hospital specific standard operating procedures on the minimum package of care for women with FGM. This study however has been able to demonstrate a gap in the care given to women with FGM during antenatal care, in a setting with a high burden of FGM.

From a policy standpoint, there is need to translate, the 'Kenyan National Reference Manual for Management of Complications, Pregnancy, Childbirth and the Postpartum Period in the Presence of FGM[15], into hospital standard operating procedures.

In conclusion, antenatal care as a strategy for the prevention of obstetric complications of female genital mutilation is not being optimally utilized. This offers an opportunity for complication prevention and better pregnancy outcomes.

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