**Central African Journal of Public Health** 2022; 8(2): 59-68 http://www.sciencepublishinggroup.com/j/cajph doi: 10.11648/j.cajph.20220802.16 ISSN: 2575-5773 (Print); ISSN: 2575-5781 (Online)



# Utilization of Maternal Care Services and Level of Satisfaction Among Clients in a Teaching Hospital in Ghana

## Ruhaima Issah Zorro<sup>1</sup>, Adadow Yidana<sup>2</sup>

<sup>1</sup>Department of Global and International Health, School of Public Health, University for Development Studies, Tamale, Ghana <sup>2</sup>Department of Social and Behavioral Change, School of Public Health, University for Development Studies, Tamale, Ghana

## **Email address:**

ruhamza@gmail.com (R. I. Zorro), a.yidana@uds.edu.gh (A. Yidana)

## To cite this article:

Ruhaima Issah Zorro, Adadow Yidana. Utilization of Maternal Care Services and Level of Satisfaction Among Clients in a Teaching Hospital in Ghana. *Central African Journal of Public Health.* Vol. 8, No. 2, 2022, pp. 59-68. doi: 10.11648/j.cajph.20220802.16

Received: April 21, 2021; Accepted: May 20, 2021; Published: April 9, 2022

**Abstract:** The study investigates the extent to which mothers are satisfied with the maternity services they receive at Tamale Teaching Hospital. The study adopted a descriptive research design. Primary and secondary sources of data were used for the research. Likert scale questionnaires were used in the collection of the data. A quantitative approach was adopted to analyze the data. From the study, respondents agreed that they are provided with access to high-quality care throughout the phases of pregnancy, labour and delivery. They also averred that they receive screening at the maternal and child health to ensure safe delivery. Again, it emerged that respondents get education on proper diet during pregnancy and lactation and the benefits of physical exercises. Additionally, it came up that respondents do not receive considerate and respectful care at all times and under all circumstances, without recognition of their dignity, values and beliefs, respect the rights of the patient. Respondents do not know the name and professional status of those providing services to them. Respondents do know refusing treatment to the extent permitted by law and are informed of the medical consequences of that refusal in the Tamale Teaching Hospital. Thus, it is recommended that the management of Tamale Teaching Hospital should organize training for health providers to encourage them to communicate client information to them during the provider-client interaction. Management should work to improve on the waiting time and contact time for their clients to be satisfied with their service provision. Management of Tamale Teaching Hospital should carry out client satisfaction surveys routinely to improve the quality of Anti-Natal Care. The primary health care authorities should make adequate provision of maternal and child health services a priority given its importance in minimizing maternal and infant morbidity and mortality.

Keywords: Utilization, Maternal Care, Service, Satisfaction, Client

## 1. Background of the Study

Between 1990 and 2013, the global maternal mortality ratio declined by only 2.6% yearly, contrary to the estimated annual decline of 5.5% required to achieve Millennium Development Goal Five (MDG5) [1-2]. The maternal mortality ratio in low-and -middle-income countries in 2013 was about 14 times higher than in high-income countries [3]. Nearly 300,000 maternal deaths concerning pregnancy and childbirth were recorded globally in 2013 of which developing countries accounted for more than half. The maternal mortality ratio in developing regions across the world is estimated at 230/100000 live births with SubSaharan Africa contributing the highest ratio of 510/100,000 live births.

Recent statistics have shown that the maternal mortality ratio in Ghana has reduced from 451/100000 live births in 2007 to 343/100000 live births in 2017 [4]. However, this is still far from meeting the SDGs target of 70/100000 live births. The report confirms that maternal mortality in Ghana is still high. Specifically, the total number of maternal deaths increased from 899 in 2012 to 1,016 maternal deaths in 2013 with Institutional Maternal Mortality Ratio (IMMR) at 150/100000 live births [5]. It is recognized that poor maternal health practice has been a major factor that hinders the reduction of maternal mortality ratio [6].

In Ghana, maternal mortality rates are very high, that is, 128 per 100,000 live births [4]. The maternal mortality ratio reflects the rate of death of women from pregnancy to puerperium and it is the most important indicator used for evaluating the effectiveness of safe motherhood services [4]. The pattern of causes of maternal deaths as estimated shows that hemorrhage (24.8%) is the leading cause followed by infection (14.9%), unsafe abortion (12.9%), eclampsia (12.9%) and obstructed labor (6.9%) [7]. This pattern may vary in different healthcare facilities. Other direct causes such as the delay model account for (7.9%) of the total maternal deaths, while (19.8%) is attributed to indirect causes like malaria, hepatitis, anemia among others [8].

Owing to considerable gaps in services, developing countries emphasize increasing service availability and maintaining acceptable quality standards [9]. Understanding maternal perception of care and satisfaction with services is important in this regard, as the perceived quality is a key determinant of service utilization [10-11]. Users, who perceive the quality of care in a health center to be good, are more likely to visit it again, thereby increasing demand for the service [12-13]. User satisfaction is considered 'patient's judgment on the quality and goodness of care' [14, 9]. At a time when global efforts to reduce maternal mortality have been stepped up, it is important to look at maternal satisfaction and its determinants [15]. Evidence on women's perception of and satisfaction with the quality of maternal care help determine other aspects of care that need strengthening in developing country contexts to support longterm demand, generate significant changes in maternal careseeking behavior, and identify barriers that can and should be removed.

Patient satisfaction depends upon many factors such as quality of clinical services provided, availability of medicine, the behavior of doctors and other health staff, cost of the services, hospital infrastructure, physical comfort, emotional support and respect for patient preferences [16]. Measuring patients' satisfaction has become an integral part of hospital management strategies for quality assurance and accreditation process in most countries, distinguishing that lack of sufficient data can severely inhibit an organization's ability to understand its strengths and to target areas in which performance can be improved [17]. But very few studies are being carried out in measuring the satisfaction of patient with hospital services as a routine process. In Ghana, improving the quality of healthcare is a key objective of the Ministry of Health and the Ghana Health Service. One of the strategies for achieving this is through the implementation of quality assurance programs in all health facilities.

## 2. Methodology

### 2.1. Study Area and Design

The Tamale Teaching Hospital (TTH) is a 364-bed capacity tertiary health facility. It is the only Referral Health Facility in the Northern Regions of Ghana and extends its

services to other neighboring countries. The hospital provides clinical health services, educate and train health professionals and undertakes health research. The study adopted a descriptive research design. This design enabled the researcher to collect data with minimal expenditure.

# 2.2. The Study Population Sample Size Determination and Sampling

The study population was postnatal mothers in their reproductive age (18-40 years) using the postnatal clinic at Tamale Teaching Hospital. The Cochran 1977 formula for calculating sample size was used to determine the sample size of 288 respondents. A systematic random sampling technique was used to select respondents. The register for the clinic day was used as the sampling frame. The researcher identified mothers who met the inclusion criteria and randomly picked folders from the register of the day. Also, in the case where there were few registrants for a particular clinic day, all women who met the inclusion criteria and willing to participate in the study were interviewed.

### 2.3. Data Collection and Analysis

Structured questionnaires were used as the data collection instrument. The questionnaire was prepared in English but explained in Dagbani, (the local dialect) as these were the commonly spoken languages within the area. Before the actual data collection, the questionnaire was pretested. The pre-test enabled all the needed corrections and clarifications to be made before the actual data collection. The completed questionnaires were cleaned, coded and entered into a statistical package for social sciences (SPSS version 20) statistical software.

#### 2.4. Ethical Consideration

Approval to conduct the survey was obtained from the Ethical Review Committee of Tamale Teaching Hospital. Permission was sought from hospital management before data collection. Informed consent was obtained from all respondents. The consent form was written in the English language and translated into a local language (Dagbani) so they could understand.

## 3. Results

#### 3.1. Socio-Demographic Characteristics

From the study, majority (44.8%) of respondents were between the ages of 20-29 years. Also, 26.9% were within ages 30-39 years, 17.9% were below age 20 years and a few were within 40+years (10.4%). From the results, 29.9% of respondents indicated having 4 children, 31.3% indicated having 1 child, 25.4% indicated having two children and 13.4% indicated having three children. In terms of education, 28.4% had no formal education, 26.9% had tertiary and above as their level of education, 19.4% had primary level education. Furthermore, 43.3% were unemployed, 32.8% were self-employed whiles 23.9% were were divorced/ formal level employees. On marital status, 65.7% were Muslims, 28 married, 19.4% were cohabitating, 13.4% were single and 1.5% traditionalists.

were divorced/separated. On religious affiliation, 67.2% were Muslims, 28.4% were Christians with 4.5% being traditionalists.

Variable	Frequency	Percent (%)	
Age of Respondents	• · ·	х. <i>Г</i>	
< 20 years	52	17.9	
20-29 years	129	44.8	
30-39 years	78	26.9	
40+ years	29	10.4	
Total	288	100	
Number of Children			
1	90	31.3	
2	73	25.4	
3	39	13.4	
4+	86	29.9	
Total	288	100	
Educational Level			
No Formal Education	82	28.4	
Primary	56	19.4	
JHS/Middle School	39	13.4	
Secondary	34	11.9	
Tertiary and above	77	26.9	
Total	288	100	
Employment Status			
Self-Employed	95	32.8	
Formal Employment	69	23.9	
Unemployed	124	43.3	
Total	288	100	
Marital Status			
Single	39	13.4	
Married	189	65.7	
Divorced/Separated	4	1.5	
Co-habitating	56	19.4	
Total	288	100	
Religion			
Christian	82	28.3	
Muslim	193	67.2	
Traditionalist	13	4.5	
Total	288	100	

Source: Field Survey, 2019.

### 3.2. Respondents Level of Satisfaction

The study showed a mean value of 3.84 meaning respondents agreed that respondents have access to highquality care throughout the phases of pregnancy, labor and delivery. The data also showed a mean value of 4.10 meaning respondents agreed that they are screened at the MCH center for health risks to ensure the safe delivery of healthy babies. Majority of respondents with a mean value of 4.03 which is equivalent to 4 meaning respondents agreed that mothers are educated at the MCH on a proper diet during pregnancy and lactation, benefits of physical exercises, alcohol and drug usage, well-baby care and family planning.

Again, the study revealed a mean value of 4.21 which is equivalent to 4 meaning respondents agreed that mothers are vaccinated against tetanus during antenatal check-ups. It further showed a mean value of 4.43 which is equivalent to 4 meaning respondents agreed that newborn babies are also vaccinated against child killer diseases at age-appropriate times. The result showed a mean value of 4.28 which is equivalent to 4 meaning respondents agreed that the MCH center conducts routine check-ups for identification and management of problems in the newborn babies in Tamale teaching hospital.

Furthermore, the result revealed a mean value of 4.14 which is equivalent to 4 meaning respondents agreed that infants are closely monitored for normal growth and development. The study showed a mean value of 4.14 which is equivalent to 4 meaning respondents agreed that mothers are educated at the MCH center about early signs of pregnancy-related problems and precautions. Also, with a mean value of 3.79 which is equivalent to 4 meaning respondents agreed that the MCH services offered are adequate and satisfactory at the Tamale teaching hospital.

The result showed a mean value of 3.89 which means respondents agreed that they are well informed on the importance of taking their medications and the danger signs of pregnancy. Data from the study showed a mean value of 3.91 which is equivalent to 4 meaning respondents agreed that their health and that of the newborn has been improved due to the quality of care provided. It further showed a mean value of 3.83 which is equivalent to 4 meaning respondents agreed that they willingly return for follow-ups because they are happy with the care given to them at the Tamale teaching hospital.

Majority of respondents with a mean value of 4.05 which is equivalent to 4 meaning respondents agreed that they willingly take their medication because they are happy with the care received. Besides, the study revealed a mean value of 3.74 which is equivalent to meaning respondents agreed that they willingly recommend the service to other relatives or friends. Data from the study showed a mean value of 3.94 which is equivalent to 4 meaning respondents agreed that they rate the quality of PNC received as good. Additionally, the result revealed a mean value of 3.73 which is equivalent to 4 meaning respondents agreed that they are satisfied with the quality of PNC received at the Tamale Teaching Hospital as shown in Table 2.

Table 2. Respondents level of satisfaction.

Statements	N	Mean
Mothers are provided access to high-quality care throughout the phases of pregnancy labour and delivery	288	3.84
Mothers are screened at the MCH centre for health risk to ensure safe pregnancy and delivery of healthy babies	288	4.1
Mothers are educated at the MCH centre on the following: proper diet during pregnancy and lactation, benefits of physical exercise, alcohol and drug use, well-baby care and family planning	288	4.03
Mothers are vaccinated against tetanus during antenatal check-ups	288	4.21
The newborn babies are also vaccinated against child killer diseases at appropriate times	288	4.43
The MCH centre conducts routine check-up for identification and management problems in the new-born babies	288	4.28
Infants are closely monitored for normal growth and development	288	4.14
Mothers are educated at the MCH centre about early signs of pregnancy-related problems and precautions	288	4.14
Generally, the M. C. H services offered are adequate and satisfactory	288	3.79
I am well informed of the importance of taking my medications and the danger signs in pregnancy	288	3.89
My health and that of the newborn has been improved due to the quality of care provided	288	3.91
I willingly return for follow-ups because I am happy with the care given to me	288	3.83
I willingly take my medications because I am happy with the care	288	4.05
I willingly recommend the service to other relative or friend	288	3.74
Overall, i would rate the quality of PNC I received as good	288	3.94
Overall, I am satisfied with the quality of PNC received	288	3.73

Source: Field Survey, 2019.

#### 3.3. Patients Knowledge of Their Rights and Responsibilities

This section enquired about the mother's knowledge level on patients' rights and responsibilities. The result revealed a mean value of 3.75 which is equivalent to 4 meaning respondents agreed that health professionals at TTH do not discriminate based on race, color, religion, national origin, age, disability and sexual orientation. It further showed a mean value of 3.63 which is equivalent to 4 meaning respondents agreed that the hospital has an environment that preserves dignity and contributes to a positive self-image. Also, the result showed a mean value of 2.97 which is equivalent to 3 meaning respondents indicated that they were undecided as to whether the hospital has reasonable access to care or protective services and reasonable response to your request for services within the capacity of TTH to provide them, including pastoral care or counselling or other spiritual services.

Data from the study showed a mean value of 3.34 which means that respondents were undecided as to whether respondents receive considerate and respectful care at all times and under all circumstances, with recognition of their dignity, values and beliefs and respect the rights of the patient. It further showed a mean value of 2.48 which is

equivalent to 3 meaning respondents were undecided as to whether the properly executed advance directives expected will be honored, including the right to utilize a designated decision-maker when or if you are unable to understand or communicate your wishes, TTH will address the wishes of the patient relating to end-of-life decision. Also, with a mean value of 2.60 which is equivalent to 3 meaning respondents were undecided as to whether respondents know the name and professional status of those providing services to you and know by name an attending physician responsible for coordinating or primarily responsible for your care in Tamale teaching hospital.

Additionally, the result revealed a mean value of 3.72 meaning respondents agreed that they had knowledge about their illness and participate in the decisions that affect their health and well-being; obtained complete and current information about their diagnosis, or medical outlook for their future. Data from the study showed a mean value of 3.73 which is equivalent to 4 meaning respondents agreed that they were informed of the outcomes of care, treatment, and services that have been provided, including unanticipated outcomes. Data from the study revealed a mean value of 3.95 which is equivalent to 4 meaning respondents agreed that there is respect for patient's rights and the need for effective communication as shown in Table 3.

	Table 3.	Patients	Knowledge	of their	rights a	nd responsibilities.
--	----------	----------	-----------	----------	----------	----------------------

Statements	N	Mean
Health professionals in TTH do not discriminate based on race, colour, religion, national origin, age, disability and sexual orientation	288	3.75
Have an environment that preserves dignity and contributes to a positive self-image	288	3.63
Have reasonable access to care or protective services and reasonable response to your request for services within the capacity of TTH to provide them, including pastoral care or counselling or other spiritual services	288	2.97
Received considerate and respectful care at all times and under all circumstances, with recognition of your dignity, values and benefits, respect the rights of the patient	288	3.34
Expect that properly executed advance directives will be honoured, including the right to utilize a designated decision-maker when or if you are unable to understand or communicate your wishes. TTH will address the wishes of the patient relating to the end-of-life decision	288	2.48
Know the name and professional status of those providing services to you and know by name an attending physician responsible for your care Know about your illness and participate in the decisions that affect your health and wellbeing, obtain complete and current information about	288	2.6
your diagnosis, the planned course of treatment, and the prognosis, or medical outlook for your future, in terms you can reasonably be	288	3.72
expected to understand		
Be informed of the outcomes of care, treatment, and services that have been provided, including unanticipated outcomes	288	3.73
Respect the patients' rights to and need for effective communication	288	3.95

Source: Field Survey, 2019.

Key: 1= Strongly Disagree, 2= Disagree, 3=Undecided/Indifferent, 4= Agree, 5= Strongly Agree.

# 3.4. An Informed Consent as Part of Patients' Rights and Responsibilities

Data from the study showed a mean value of 3.55 which is equivalent to 4 meaning respondents agreed that informed consent is received from physician and other health care practitioner, except in emergencies, information necessary to give informed consent before the start of any procedure or treatment and know the name of the person responsible for the procedure or treatment to be performed; the medically significant risks and benefits associated with a recommended treatment or test. The result showed a mean value of 2.55 which is equivalent to 3 meaning respondents were undecided as to whether they knew the likely duration of incapacitation, the medically significant alternatives for care or treatment when they exist, and the risks and benefits associated with no treatment at all can be done. It further showed a mean value of 3.43 which is equivalent to 3 meaning respondents were undecided as to whether they had knowledge of refusing treatment to the extent permitted by law and be informed of the medical consequences of that refusal in the Tamale Teaching Hospital.

The study revealed a mean value of 3.51 which is equivalent to 4 meaning respondents agreed that they have the right to leave the hospital, even if your doctor advises against it, unless you have certain infectious diseases that could affect the health of others, or if you are incapable of maintaining your own or other people's safety as defined by law. It further showed a mean value of 3.60 which is equivalent to 4 meaning respondents agreed that TTH shall be relieved of responsibility for any harm that comes to you as a result of the refusal of treatment or leaving against medical advice. Additionally, the study showed a mean value of 3.84 which is equivalent to 4 meaning respondents agreed that there are reasonable privacy and confidentiality of your medical care program and records.

Also, with a mean value of 2.57 which is equivalent to 3 meaning respondents indicated that they were undecided as to whether people not directly involved in your care must have permission to be present when care is given. Data from

the study showed a mean value of 2.60 which is equivalent to 3 meaning respondents were undecided as to whether certain conditions, such as cases of some communicable diseases, industrial diseases or accidents, and suspected cases of child or elder abuse, must by law be reported to appropriate state agencies, even without your authorization. Besides, the result showed a mean value of 2.66 which is equivalent to 3 meaning respondents were undecided as to whether some cases involving potential liability, the medical center may disclose information in medical records to its attorneys and agents in the Tamale Teaching Hospital.

Furthermore, the result revealed a mean value of 3.45 which is equivalent to 4 meaning respondents agreed that they are advised when TTH proposes to engage them in or perform human experimentation affecting their care and treatment thus participating in clinical training programs or research studies shall be voluntary. The study showed a mean value of 3.67 which is equivalent to 4 meaning respondents agreed that they are informed by the attending physician of any continuing health care requirements following discharge. More so, the result also showed a mean value of 2.48 which is equivalent to 3 meaning respondents were undecided as to the received an itemized, detailed and understandable explanation of charges upon request at Tamale Teaching Hospital.

Also, the result showed a mean value of 4.08 which is equivalent to 4 meaning respondents agreed that the hospital has an interpreter if a language barrier or hearing impairment is a problem to your understanding of the care and treatment being provided. Majority of respondents with a mean value of 4.00 which is equivalent to 4 meaning respondents agreed that they talk about their illness and care to anyone they want. Data from the study showed a mean value of 3.74 which is equivalent to 4 meaning respondents agreed that they are free from mental, physical, sexual and verbal abuse, neglect and exploitation at the Tamale Teaching Hospital.

Besides, the result showed a mean value of 2.25 which is equivalent to 2 meaning respondents indicated that they disagree with knowing the maximum patient census and the full-time equivalent numbers of registered nurses, licensed practical nurse, and licensed nursing assistants who provide direct care for each shift on the unit where the patient is receiving care. Furthermore, the study showed a mean value of 4.29 which is equivalent to 4 meaning respondents agreed it is the patient's responsibility to treat others with respect, this includes following rules about smoking, noise, number of visitors, conduct and respect of property that belongs to others or the hospital. It further showed a mean value of 4.38 which is equivalent to 4 meaning respondents agreed that it is the patient's responsibility to give accurate information, thus there may be a need to answer numerous questions about their health, medical history in the Tamale Teaching Hospital.

Additionally, the study showed a mean value of 4.32 which is equivalent to 4 meaning respondents agreed that the patient is responsible for following their health care team's treatment plan while in the hospital and following discharge. Also, with a mean value of 4.36 which is equivalent to 4 meaning respondents agreed that patients are responsible for asking questions if they do not understand certain aspects of their care at the Tamale Teaching Hospital as shown in Table 4.

Table 4. Informed	l Consent as Part	of Patients	' Rights and Respo	onsibilities.
-------------------	-------------------	-------------	--------------------	---------------

Statements	Ν	Mean
Receive from your physician or other health care practitioner, except in emergencies, information necessary to give informed consent before the start of any procedure or treatment and know the name of the person responsible for the procedure or treatment. such information should include the specific procedure or treatment to be performed; the medically significant risks and benefits associated with a recommended treatment or test.	288	3.55
The likely duration of incapacitation; the medically significant alternatives for care nor treatment when they exist; and the risks and benefits associated with no treatment at all	288	2.55
Refuse treatment to the extent permitted by law and be informed of the medical consequences of that refusal	288	3.43
You have the right to leave the hospital, even if you advise against it, unless you have certain infectious diseases that could affect the health of others, or if you are incapable of maintaining your own or other people safety as define by the law	288	3.51
TTH shall be relieved of responsibility for any harm that comes to you as a result of the refusal of treatment or leaving against medical advice	288	3.6
Expect reasonable privacy and confidentiality of your medical care program and records	288	3.84
People not directly involved in your care must have your permission to be present when care is given	288	2.57
Certain conditions, such as cases of some communicable diseases, industrial diseases or accidents, and suspected cases of child or elder abuse, must by law be reported to appropriate state agencies, even without your authorization	288	2.6
Mothers In some cases, involving potential liability, the medical centre may disclose information in medical records to its attorneys and agents	288	2.66

Source: Field Survey, 2019.

Key: 1=Strongly Disagree, 2=Disagree, 3=Undecided, 4=Agree, 5=Strongly Agree,

### 3.5. Perception of Quality of Care Received and Their Practices

This section determines the mother's perception of the quality of care received and their practices in Tamale Teaching Hospital. The study showed a mean value of 3.92 which is equivalent to 4 meaning respondents agreed that the environment at TTH was clean. The result showed a mean value of 3.86 which is equivalent to 4 meaning respondents agreed that the equipment used at TTH was clean. Data from the study showed a mean value of 3.11 which is equivalent to 3 meaning respondents were undecided as to whether toilets facilities at TTH were clean.

Also, the study showed a mean value of 3.56 which is equivalent to 4 meaning respondents agreed that health workers at the Tamale Teaching Hospital are competent and professionals. It further showed a mean value of 2.74 which is equivalent to 3 meaning respondents were undecided as to whether medicines prescribe were available at TTH. Also, with a mean value of 2.86 which is equivalent to 3 meaning respondents were undecided as to whether services such as laboratory and x-ray were available at the Tamale Teaching Hospital.

Furthermore, the study revealed a mean value of 3.24 which is equivalent to 3 meaning respondents were undecided as to whether they usually have to wait long before being seen by the nurse at TTH. Also, the result showed a mean value of 3.62 which is equivalent to 4

meaning respondents agreed that they usually have to wait long before being seen by the doctor. Majority of respondents with a mean value of 2.06 which is equivalent to 2 meaning respondents disagreed to being happy with the time they have to wait to be attended to at the Tamale Teaching Hospital.

The study showed a mean value of 3.20 which is equivalent to 3 meaning respondents were undecided as to whether they spend a long time with the nurse/midwife/doctor at the facility. Majority of respondents with a mean value of 3.02 which is equivalent to 3 meaning respondents were undecided as to whether the time they usually spend with the doctor is enough to address my questions in Tamale Teaching Hospital.

Data from the study revealed a mean value of 3.55 which is equivalent to 4 meaning respondents agreed that health workers at the facility are professionals. The study showed a mean value of 2.48 which is equivalent to 3 meaning respondents were undecided whether health workers were professional and treated them with respect. Also, with a mean value of 2.98 which is equivalent to 3 meaning respondents were undecided whether there was privacy during their interaction with health workers in Tamale Teaching Hospital.

The result showed a mean value of 2.64 which is equivalent to 3 meaning respondents were undecided whether the health workers encouraged them to ask questions regarding the clinical care that we receive. Besides, the result showed a mean value of 2.58 which is equivalent to 3 meaning respondents were undecided whether the health workers answered all their questions satisfactorily. It further showed a mean value of 2.62 which is equivalent to 3 meaning respondents were undecided whether the doctor explained their health state and that of the unborn baby to them. Majority of respondents with a mean value of 3.09 which is equivalent to 3 meaning respondents were undecided whether the doctor made it clear the type of medication prescribed and its importance at the Tamale Teaching Hospital.

Also, the result revealed a mean value of 4.14 which is equivalent to 4 meaning respondents agreed that they are happy with the information they receive about labour. Data from the study showed a mean value of 4.21 which is equivalent to 4 meaning respondents agreed that they are happy with the information they receive about breastfeeding at the facility. It further showed a mean value of 4.18 which is equivalent to 4 meaning respondents agreed that they are happy with the information they receive about family planning at the Tamale Teaching Hospital.

It further revealed a mean value of 3.64 which is equivalent to 4 meaning respondents agreed that they were told how to recognize and proceed with some serious problems in pregnancy which include; the premature rupture of membranes, bleeding in pregnancy, premature contractions, seizures, fainting and dizziness. The result revealed a mean value of 4.74 which is equivalent to 5 meaning respondents strongly agreed that they use insecticide-treated bed nets throughout infancy. Majority of respondents with a mean value of 4.02 which is equivalent to 4 meaning respondents agreed that they practice early and exclusive breastfeeding in the first six months after delivery at the Tamale Teaching Hospital.

Table 5. Perception of Quality of Care Received and their Practices.

Statements	N	Mean	
The structural quality of care			
The environment was clean	288	3.92	
The equipment used was clean	288	3.86	
Toilet facilities were clean	288	3.11	
Health workers are competent and professional	288	3.56	
Medicines prescribe were available	288	2.74	
Services such as laboratory and x-ray were available	288	2.86	
Wasting Time			
I usually have to wait long before being seen by the nurse	288	3.24	
I usually have to wait long before being seen by the doctor	288	3.62	
I am happy with the time that I have to wait	288	2.06	
Length of Consultation			
I spend a long time with the nurse/midwife/doctor?	288	3.2	
The time I usually spend with the doctor is enough to address my questions	288	3.02	

Source: Field Survey, 2019.

Key: 1= Strongly Disagree, 2= Disagree, 3=Undecided/Indifferent, 4= Agree, 5= Strongly Agree.

Table 6. Perception of Quality of Care Received and their Practices.

The attitude of Health Workers	N	Mean
The health worker was professional	288	3.55
The health worker was professional and treated me with respect	288	2.48
There was privacy during my interaction with the health worker	288	2.98
The health worker encouraged me to ask questions regarding the clinical care I received	288	2.64
The health worker answered all my questions satisfactorily	288	2.58
The doctor explained my health state and that of my unborn baby to me	288	2.62
The doctor made it clear the type of medication prescribed and its importance	288	3.09
Health Education		
I am happy with the information I received about labor	288	4.14
I am happy about the I received about breast feeding	288	4.21
I am happy about the information I received about family planning	288	4.18
Were you told how to recognize and proceed about some serious problems in pregnancy	288	3.64
a) Premature rupture of membranes	288	
b) Bleeding in pregnancy	288	
c) Premature contractions	288	
d) Seizures	288	
e) Fainting and dizziness	288	
The use of insecticide-treated bed nets throughout infancy	288	4.74
Early and exclusive breastfeeding in the first six months after delivery	288	4.02
Daily diet and nutrition during breastfeeding	288	2.31
Specific health problems that can occur during the first month after birth (danger signs) that require prompt attention	288	2.69
The date for the next PNC visit	288	4.33
Family planning and contraceptive usage	288	4.35

Source: Field Survey, 2019.

Additionally, the study showed a mean value of 2.31 which is equivalent to 2 meaning respondents disagreed with practicing daily diet and nutrition during breastfeeding. The study showed a mean value of 2.69 which is equivalent to 3 meaning respondents were undecided whether specific health problems that can occur during the first month after birth (danger signs) require prompt attention. Data from the study showed a mean value of 4.33 which is equivalent to 4 meaning respondents agreed that they were informed about the date for the next PNC visit at TTH. The study showed a mean value of 4.35 which is equivalent to 4 meaning respondents agreed that they practiced the usage of family planning and contraceptive at Tamale Teaching Hospital as shown in Tables 5 & 6.

## 4. Discussion

The study revealed that mothers are provided with highquality care throughout the phases of pregnancy, labor and delivery, mothers are screened at MCH center for health risks to ensure the safe delivery of healthy babies, mothers are educated at the MCH on a proper diet during pregnancy and lactation, benefits of physical exercises, well-baby care and family planning, mothers are vaccinated against tetanus during antenatal check-ups, respondents agreed that newborn babies are also vaccinated against child killer diseases at ageappropriate times, MCH center conducts routine check-ups for identification and management of problems in the newborn babies in Tamale Teaching Hospital. This means that mothers who attend Tamale Teaching Hospital for care are satisfied with the services they provide. These findings are supported by several factors identified to influence patient's satisfaction in previous studies by [18, 19, 2,]. These factors include organizational structure of clinics, treatment length, access, cost, physicians' communication with patients, caregiver's behavior and attitudes, health workers competence, and patient expectations. the finding also supported by [2], a study that identifies the determinants that were classified under the Donabedian framework of the structure, process, and outcome of satisfaction.

Furthermore, the study revealed that infants are closely monitored for normal growth and development, mothers are educated at the MCH center about early signs of pregnancyrelated problems and precautions, mothers are well informed on the importance of taking their medications and the danger signs of pregnancy, mothers willingly return for follow-ups because they are happy with the care given to them, mothers willingly recommend the service to other relatives or friends, respondents agreed that they rate the quality of PNC received as good, mothers are satisfied with the quality of PNC received at the Tamale Teaching Hospital. This finding is similar to the finding of [19], in which the study identified some common challenges that parties have and these included poor physical facilities, irregular supply of basic utility amenities such as water and electricity, nonavailability of drug and non-drug consumables, lack of privacy, and lack of competent personnel to manage complications and to provide post-delivery counselling.

On the knowledge level of mother's on patients' rights and responsibilities. The study revealed that people directly involve in mothers care are not permitted to be present when care is given, mothers do not receive considerate and respectful care at all times and under all circumstances, without recognition of their dignity, values and beliefs, respect the rights of the patient, mothers do not know the name and professional status of those providing services to them by name, mothers do know refusing treatment to the extent permitted by law and be informed of the medical consequences of that refusal in the Tamale Teaching Hospital. This means that mothers lack some knowledge with regards to their rights and responsibility as patients. These findings are similar to the findings of [20], who highlighted that women oftentimes are limited in decisions that concern them because they have minimal information from caregivers to make any informed decisions. This often affects levels of satisfaction especially in the event of poor health outcomes.

On mother's perception of the quality of care received and their practices in Tamale Teaching Hospital. The study revealed that the equipment used at TTH was clean, health workers at the Tamale Teaching Hospital are competent and professionals, mothers usually have to wait long before being seen by the doctor, mothers are not being happy with the time they have to wait to be attended to at the Tamale Teaching Hospital. Health workers at the facility are professionals. This finding is similar to the finding [21], which revealed that uptake of PNC services was relatively lower in most developing countries like Malawi and Ghana, as compared to other maternal healthcare services. They attributed this to the perception of most women that the antenatal and postnatal period is the riskiest of the maternity period. Also, it was found that most participants had inadequate information on maternal morbidity and mortality. Apart from these factors, the study also found that long waiting time for treatment and separation of mother and baby during PNC clinic sessions reduces the utilization of PNC. It was recommended that maternal health education should be intensified to increase awareness and promote PNC to safeguard the life of mother and new-born.

The study further revealed that mothers are told how to recognize and proceed with some serious problems in pregnancy which include premature rupture of membranes, bleeding in pregnancy, premature contractions, seizures, fainting and dizziness, mothers use insecticide-treated bed nets throughout for their infants, mothers practice early and exclusive breastfeeding in the first six months after delivery at the Tamale Teaching Hospital, mothers were informed about the date for next PNC visit at TTH, mothers practiced the usage of family planning and contraceptive at Tamale Teaching Hospital. This finding is in line with the finding of [22], which findings revealed that all the dimensions of care under consideration were perceived to be good by the participants. They further revealed that Socio-demographic characteristics played a significant role thus women with higher levels of education better appreciated the technical provision of services and perceived quality as high. Interpersonal relation was found to be strongly associated with the perceived quality of care. More especially, participants rated quality high where the health workers introduced themselves, explained examination procedures, sought their consent, encouraged them to ask questions and assured them of privacy and confidentiality.

## 5. Conclusions

Mothers are provided with access to high-quality care throughout the phases of pregnancy, labor and delivery. Infants are closely monitored for normal growth and development, mothers are educated at the MCH center about early signs of pregnancy-related problems and precautions, MCH services offered are adequate and satisfactory at the Tamale Teaching Hospital, mothers are well informed on the importance of taking their medications and the danger signs of pregnancy. On the knowledge level of mother's on patients' rights and responsibilities, health professionals do not discriminate, mothers had knowledge about their illness and participate in the decisions that affect their health and well-being; obtained complete and current information about their diagnosis, informed consent is received by mothers from physician and other health care practitioner, except in emergencies, information necessary to give informed consent before the start of any procedure or treatment and know the name of the person responsible for the procedure or treatment to be performed; mothers knows that TTH shall be relieved of responsibility for any harm that comes to patients as a result of the refusal of treatment or leaving against medical advice. Mothers do not receive considerate and respectful care at all times and under all circumstances, without recognition of their dignity, values and beliefs, respect the rights of the patient, mothers do not know the name and professional status of those providing services to them by name, mothers do know refusing treatment to the extent permitted by law and be informed of the medical consequences of that refusal. On mother's perception of the quality of care received and their practices in Tamale Teaching Hospital. The study concluded that the equipment used at TTH was clean, health workers at the Tamale Teaching Hospital are competent and professionals, mothers usually have to wait long before being seen by the doctor, mothers are not being happy with the time they have to wait to be attended to at the Tamale Teaching Hospital., health workers at the facility are professionals, mothers are happy with the information they receive about labour, mothers are happy with the information they receive about breastfeeding at the facility, mothers are happy with the information they receive about family planning at the Tamale Teaching Hospital.

## References

[1] WHO. (2014). *Trends in maternal mortality:* 1990 to 2013. Geneva.

- [2] Srivastava, A., Rajbangshi, A. P., and Bhattacharyya, S., (2015). Determinants of women's satisfaction with maternal health care: a review of literature from developing countries, Srivastava et al. BMC Pregnancy and Childbirth (2015) 15: 97.
- United Nations. (2015). The Millennium Development Goals Report. United Nations. New York. http://doi.org/978-92-1-101320-7
- [4] GSS/GHS/ICF (2018) Ghana Maternal Health Survey 2017, Accra, Ghana.
- [5] GSS (2013) 2010 Population and Housing Census: National Analytical Report, Accra.
- [6] Seddoh, A., Adjei, S., and Nazzar, A. (2011). Ghana's National Health Insurance Scheme. Centre for Health and Social Services.
- [7] World Health Organisation. (2015). *Trends in Maternal Health:* 1990 to 2015. Estimates by WHO.
- [8] World Health Organization/UNICEF, (2000), Integrated management of pregnancy and childbirth: Pregnancy, childbirth, postpartum and newborn care; a guide for essential practice, 2nd Ed, Geneva, Switzerland.
- [9] Thomason J., Edwards K., (1991). Using indicators to assess quality of hospital services in Papua New Guinea. Int J Health Plann Manage.
- [10] Haddad S., Fournier P., Machouf N., Yatara F., (2006) What does quality mean to lay people? Community perceptions of primary care services in Guinea. Soc Sci Med. 47: 381–94. 4.
- [11] Andaleeb S. S., Service quality perceptions and patient satisfaction: a study of hospitals in a developing country. Soc Sci Med. 2001; 52: 1359–70. doi: 10.1016/S0277-9536(00)00235-5.
- [12] Reerink I. H. & Sauerborn R. (2007). *Quality of primary health care in developing countries:* recent experiences and future directions. Int J Qual Health Care, 131–9.
- [13] Dettrick Z., Firth S., Soto E. J. (2013). Do strategies to improve quality of maternal and child health care in lower and middle income countries lead to improved outcomes? A review of the evidence. Plos One, 8, e83070.
- [14] Donabedian A., (2005). *The definition of quality and approaches to its assessment.* Ann Harbor: Health Administration Press.
- [15] Coeytaux F., Bingham D. & Langer A. Reducing maternal mortality: a global imperative. Contraception. 2011; 83: 95–8. doi: 10.1016/j.contraception.2010.10.009.
- [16] Jenkinson C., Coulter A., Bruster S., Richards N., Chandola T. Patient's experiences and satisfaction with healthcare: Results of a questionnaire study of specific aspects of care. Qual Saf Health Care 2002; 11: 335-9.
- [17] Johansson, P., Oleni, M., & Fridlund, B. (2002) Patient satisfaction with nursing care in the context of health care: a literature study, Scand J Caring Sci. 2002 Dec; 16 (4): 337-44. doi: 10.1046/j.1471-6712.2002.00094. x.
- [18] Naidu, A., (2009). Factors affecting patient satisfaction and healthcare quality. *International Journal of Health Care Quality Assurance*, 22 (4), 366–381. http://doi.org/10.1108/09526860910964834

- [19] Bhattacharyya, S., Issac, A., Rajbangshi, P., Srivastava, A., and Avan, B. I., (2015). "Neither we are satisfied nor they" users and providers perspective: a qualitative study of maternity care in secondary level public health facilities, Uttar Pradesh, India. BMC Health Services Research, 1–13. http://doi.org/10.1186/s12913-015-1077-8.
- Mohammad, K., Shaban, I., Homer, C., and Debra, C. (2014).
  Women's satisfaction with hospital based intrapartum care: A Jordanian study. *International Journal of Nursing and Midwifery*, 6 (3), 32–39. http://doi.org/10.5897/IJNM2014.0127
- [21] Nuamah GB, Agyei-Baffour P, Akohene KM, Boateng D,

Dobin D, Addai-Donkor K. Incentives to yield to obstetric referrals in deprived areas of Amansie west district in the Ashanti region, Ghana. Int J Equity Health [Internet]. 2016; 15 (1): 117. Available from: http://equityhealthj.biomedcentral.com/articles/10.1186/s1293 9-016-0408-7

[22] Kambala, C., Lohmann, J., Mazalale, J., Brenner, S., Allegri, M., De, Muula, A. S., and Sarker, M. (2015). *How do Malawian women rate the quality of maternal and newborn care?* Experiences and perceptions of women in the central and southern regions. BMC Pregnancy & Childbirth, 15 (169), 1–19. http://doi.org/10.1186/s12884-015-0560-x