

# Journal of Current Medical Research and Opinion Journal



<https://doi.org/10.15520/jcmro.v1i09.113>

December, 2018|Volume 01|Issue 09|

**Research Article**

Received: 2018-11-24; Accepted 2018-12-16,

## The Knowledge and Practices of Women of Child Bearing Age towards Safe Motherhood in Ekiti State

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### **Abstract:**

Knowledge about safe motherhood practices could help reduce pregnancy related health risks. This study examined knowledge of safe motherhood among women of childbearing age in Ekiti state of Nigeria.

The study employed, a cross sectional descriptive research to investigate the knowledge, and practice of women of child bearing age towards safe mother-hood in Ekiti State. The target populations were women of child bearing age in the Public Health Institutions in Ekiti state.

The results revealed that the knowledge of safe motherhood practices among Child Bearing Mothers (CBMs) were considered adequate (77.9%). Also, the result further indicated that immunization practices of CBMs was excellently adequate (97.6%) since it met the above acceptable standard by WHO. Additionally, the nutritional practices among CBMs were considered adequate (77.2%). Further, the competency of the health personnel according to CBMs was very adequate (80.8%) since it met the above acceptable standard by WHO. Moreover, availability and accessibility of facilities for safe motherhood according to CBMs was a little above average (55.4%). The result further showed that maternal educational level had significant effect on all the safe motherhood practices, Knowledge of SM [F(5,157)=6.026, p<.001]; Nutritional practices of SM [F(5,157)=8.848, p<.001]; Immunization practices of SM [F(5,157)=12.366, p<.001]; Personal hygiene practice [F(5,157)=2.934, p<.05]; Competency of the health personnel [F(5,157)=6.913, p<.001]; Factors that determine underutilization of SM [F(5,157)=2.436, p<.05]; Availability and accessibility for SM [F(5,157)=4.331, p<.001] & Family planning practice of SM [F(5,157)=11.039, p<.001].

Based on the findings of the study, it was concluded that there were adequate knowledge of safe motherhood practices among CBMs in Ekiti State. Secondly, there were adequate nutritional practices among CBMs in Ekiti State. Thirdly, the immunization practices among CBMs in Ekiti State were excellently adequate. Finally, the personal hygiene practices among CBMs in Ekiti State were more than adequate. It was therefore recommended that health educators, institutions and other health professional should design better educational strategies to improve health education practices among CBMs in the area of study. Secondly, seminars and workshop should be organized for CBMs to improve their utilization of MCH services.

**Keywords:** Knowledge, Practice of women, Child bearing, Safe Motherhood.



## **Introduction:**

Safe motherhood has been conceptualized as a means of ensuring women's accessibility to needed care through antenatal programme in order to facilitate their safety and optimal health throughout pregnancy and childbirth (Price, 2002). It is a means of saving the lives of women and improving the health of millions of others (Jatau, 2000). Safe motherhood is aimed at preventing maternal and prenatal mortality and morbidity. It also enhances the quality and safety of women's live through the adaptation of combination of health and non- health strategies. The scheme is achieved through a programme of inter-linked steps which strive to provide family planning services to prevent unwanted pregnancies; safe abortions (where abortion is legalized couple with efficient management and treatment of complication of unsafe abortions are accessible); prenatal and delivery care at the community level with quick access to first-referral services for complication and postpartum services, promotion of breastfeeding, immunization and nutrition services. Safe mother services must be integrated into the health delivery system and necessary inputs such as drugs, equipment, facilities and properly trained staff supplied (Daly, Azefor, Nasah, 1993).

Safe motherhood refers to a situation in which a woman going through physiological processes of pregnancy and child birth does not suffer any injury or lose her life or that of the baby (Action Health, 1999). According to World Health Organization – WHO (2000) safe motherhood is a worldwide initiative whose aim is to reduce maternal morbidity and infant mortality and to improve women's reproductive health. Similarly, Partnership for Transforming Health Care System – PATHS (2005) views it as concerned efforts by a pregnant woman herself, her family members (immediate and extended), her community and all health personnel at the three tiers of health care system to ensure that safety of a pregnant woman and her baby during pregnancy, delivery and after delivery.

Mahler (2002) stated that safe motherhood is achieved through a concerted set of intervention designed to reduce maternal mortality and also to improve the reproductive health status of women. Thus, according to her, safe motherhood is aimed at reducing the number of deaths and illness that are associated with pregnancy and childbirth. According to Adesokan (2010) safe motherhood encompasses a broad range of direct and indirect efforts to reduce deaths and disabilities resulting from pregnancy and childbirth and also to improve women's reproductive health. Safe motherhood refers to the application of good health to daily living such as personal hygiene and nutrition in order to ensure that the health of the mother and that of the baby is not jeopardized (Surat, 2002). He further explained that safe motherhood examines strategies and methodologies for keeping mothers and their babies healthy. Safe motherhood is ensured through effective and efficient practice of health care services.

Nigeria is Africa's most populous country with a population of over 160 million people (NPC, 2009). Within the country, there are about 31 million women of childbearing age (Abimbola, Okoli, Olubajo, Abdullahi & Pate, 2012). Maternal mortality is estimated to be more than twice as high in the rural areas (828 deaths per 100,000 live births) than in the urban areas (351 deaths per 100,000 live births) (Abimbola, Okoli, Olubajo, Abdullahi & Pate, 2012). Regional variations abound in maternal mortality figures across Nigeria. Evidence suggests that maternal mortality rates (MMR) are significantly higher in northern Nigeria compared to the southern part of the country. The North East and North West zones with MMR of 1,549 deaths per 100,000 live births and 1,025 deaths per 100,000 live births respectively have rates about ten and six times higher than in the South West (165 deaths per 100,000 live-births) (Abimbola, Okoli, Olubajo, Abdullahi & Pate, 2012; Adegoke, Lawoyin, Ogundele & Thomson, 2007).

Developing countries account for about 99% of an estimated half a million maternal deaths that occur each year (Hogan, Foreman, Naghavi, Ahn, Wang, Makela, Lopez, Lozano & Murray, 2010). A review of the Millennium Development Goals suggests that limited progress is being made to reduce maternal mortality



**Okhakhume A.S. et al.** The Knowledge and Practices of Women of Child Bearing Age towards Safe Motherhood in Ekiti State especially across developing countries including Nigeria (Abimbola, Okoli, Olubajo, Abdullahi & Pate, 2012). However interest abounds for community-based approaches to improving maternal health outcomes. One crucial lesson learnt from the Safe Motherhood Initiative is that community involvement is pivotal for sustained reduction of maternal mortality (WHO, 2004). Community-based interventions can effectively tackle maternal, newborn and child health problems as decisions to seek and access health services are strongly influenced by socio-cultural norms (Elder, Ayala & Harris, 1999).

### **Statement of problem:**

Most developed countries have made considerable progress in addressing maternal mortality, but it appears that countries with high maternal mortality burdens like Nigeria and in particular Ekiti state have made little progress in improving maternal health outcomes despite emphasis by the Millennium Development Goals (MDGs). Knowledge about safe motherhood practices could help reduce pregnancy related health risks. This study examines knowledge of safe motherhood among women of childbearing age in Ekiti state of Nigeria.

### **Objectives of the study:**

The purpose of the study was to determine safe motherhood knowledge and practices among women of child bearing age in Ekiti State.

Specifically the study will attempt to:

- Determine their level of knowledge of various components of safe motherhood initiative.
- Determine childbearing mother's practice of prenatal care.
- In order to accomplish this task, two probing questions were formulated thus:
  - What is the childbearing mothers' level of knowledge of various components of safe motherhood initiatives?
  - What is the prenatal care practice among childbearing mothers?
- The following null hypotheses were postulated to guide the present study.
  - Age of childbearing mothers at pregnancy has no statistically significant influence on level of knowledge of SM components.
  - Age of childbearing mothers at pregnancy has no statistically significant influence on level of practice of SM components.
- 1. Determine the nutritional knowledge and practices among women of childbearing age
- 2. Ascertain the immunization knowledge and practices among women of childbearing age
- 3. Identify personal hygiene knowledge and practices among women of childbearing age

In order to accomplish the task, the following research questions were formulated to guide the study.

1. What are the nutritional knowledge and practices among women of childbearing age?
2. What are the immunization knowledge and practices among women of childbearing age?
3. What are the personal hygiene knowledge and practices among women of childbearing age?

HO1 There is no statistically significant difference on safe motherhood practices among childbearing mothers (CBMs) in Ekiti State based on level of maternal education.

### **Justification of the study:**

Partnership for transforming health care system in Nigeria (2005) elucidated the components of safe motherhood, which comprised prenatal care, clean and safe delivery, and postpartum care, including family



**Okhakhume A.S. et al.** The Knowledge and Practices of Women of Child Bearing Age towards Safe Motherhood in Ekiti State planning, emergency obstetric care and child care, sexually transmitted infections (STI), prevention of mother to child (PMTCT) transmission of HIV/AIDS and post abortion care. Women most especially child bearing mothers (15-49 yrs) should be the important target in any government's policy formulation and implantation with reference to SMI because the maintenances of adequate health particularly of infants children and mother is critical to attainment of optimum maternal health and national development (WHO, 1999). This justifies the selection of child bearing age mothers as the primary target population for the present study.

### **Research Methodology:**

#### **Research Design:**

The study employed, a cross sectional descriptive research to investigate the knowledge, and practice of women of child bearing age towards safe mother-hood in Ekiti State.

#### **Target population of the study:**

The target populations were women of child bearing age in the Public Health Institutions in Ekiti state.

#### **The Study Area:**

The study was carried out in Ekiti State. It was created on 1<sup>st</sup> October 1996 under the dictatorship of General Sanni Abacha alongside with five others, with its Capital located at Ado Ekiti. (Adeniyi, 2000). The state was carved out of the territory of old Ondo state. It is one of the Yoruba state. It has sixteen (16) local governments. Ekiti state is one of the thirty six states that constitute Nigeria. The state is reputed for knowledge its slogan is Land of Honour. Total area is 6,353 square km (2,453sq miles). (Oguntuyi, 2005).

#### **Geography:**

The state is mainly an upland zone, rising over 250 meters. It lies on an area underlain by metamorphic rock; it is generally undulating state with a characteristic landscape that consists of old plains broken by step – sided out – crops that may occur singularly or in a group's pridges. Such rock out crops exists mainly at Aramoko, Efon- Alaaye, Ikere, Igbara-odo and Okemesi Ekiti. The state is dotted with rugged hills, notable ones are Ikere Ekiti Hills in the south, Efon –Alaaye Hills on the Western boundary and Ado Ekiti Hills in the center. It is located between latitude 7A 25 and 80A 5N degree and between longitude degree 4A 45 and 5A 46 east. (Babalola, 2008).

#### **Climate and Vegetation:**

The State enjoys tropical climate with two distinct seasons. These are the rainy season (April- October) each year and the dry season (November –March) every year. Temperature ranges between 21 -28 degree Centigrade with high humidity. The southern wind and the northern east trade winds blow in the rainy and dry season respectively. Tropical forest exists in the south, while savannah occupies the northern peripheries. (Oguntuyi, 2007).

#### **Towns and Administrative divisions:**

The people of Ekiti state lives mainly in the towns. These towns includes Ado, Aisegba, Awo, Ayegbaju, Ayetoro, Efon, Ikole, Omuo, Oye, Okemesi among others. (Oguntuyi, 2007).

#### **Local Government Areas:**

Ekiti have 16 LGAs out of Nigeria's 774 Local Government Areas. They are Ado, Efon, Ekiti east, Ekiti west, Ekiti south west, Gboin,, Emure, Ido/osi, Oye, Ikole, Ijero, Illejemeje, Ikere, Irepodun/ Ifelodun, Ise/Orun and Moba with their headquarters in major towns within the local government areas. (Adeniyi, 2000). On 26<sup>th</sup> June, 2014 the state government created additional eighteen (18) local development areas which



**Okhakhume A.S. et al.** The Knowledge and Practices of Women of Child Bearing Age towards Safe Motherhood in Ekiti State awaits the approval of the National Assembly, which would accord them the status of full fledged local government councils. (Saharareporter.com, 2005).

### **Demographics:**

The Ekiti whose ancestors migrated from Ile Ife as a people, form one of the largest ethnic groups in Yoruba land. (Okoroma, 2005). Ekitis are culturally homogeneous and they speak a dialect of Yoruba language known as Ekiti. The homogeneous native of Ekiti confesses on the state same uniqueness among the state of the federation. Slight differences are noticeable in the Ekiti dialect by the border communities to other state (Adeniyi, 2000). The main staple food of the people of Ekiti State is pounded yam with Isapa soup or vegetable soup. Ekiti state is naturally endowed with natural resources. The state is potentially rich in mineral deposits; this includes granite, kaolin, columbite, limestone among others. The land is also blessed with water resources, some of its major rivers are Ero, Osun ,Ose rivers among others. (Fasuan, 2002).

Ekiti state is buoyant in agricultural resources with cocoa as its leading cash crop. It is also known for its forest resources, notably timber, food crops like yam, cassava and also grains like rice and maize are grown in large quantities. (Babalola, 2008)

### **Sampling Technique and Sample Size Determination:**

Formula for sample size.

$$N = P(1-P)Z^2 \text{ where } Z=1.96, D=0.05$$

$$D^2$$

P – Percentage of maternal mortality due to poor antenatal care =15% according to National Health Demography (2008). P =15% = 0.15

$$N = \frac{0.15(1-0.15)1.96^2}{0.05^2}$$

$$0.05^2$$

$$N = \frac{0.432718}{0.0025}$$

$$0.0025$$

$$N = 172.872$$

$$N = 180$$

Source: Armitage and Berry (2009)

### **Sample technique and subject selection:**

Multistage sampling method was used in view of the large size of the study area, which is Ekiti state.

1. The list of all Public Health institutions in Ekiti state was obtained from the Hospital services Department of the Ministry of Health, Ado Ekiti.
2. The list of the three senatorial districts was collected from the cabinet and political affairs department of the Governor's office, Ado Ekiti. The three senatorial districts are Ekiti North, Central and South.



3. Selection of one senatorial district by simple random sampling was done, while Ekiti North senatorial district was selected.
4. Stratification of the Public Health Institutions in each district was done.
5. In Ekiti North senatorial district, three Public Health Institutions were selected by simple random technique; which are Federal Teaching Hospital Ido, Comprehensive, Oye and General Hospital Ikole Ekiti.

**Inclusion criteria:**

Women of child bearing age 20 -45 years attending clinics in Ekiti state hospitals were included in the study.

**Exclusion criteria:**

Below 20 years and above 45 years .were excluded in the study.

**Method of Data Collection:**

Primary data was collected for the study using a structured questionnaire which the respondents filled.

**Validation of research instrument:**

The questionnaires were shown to the supervisor who standardized the questionnaire. The instrument for data collection were pre – tested in antenatal clinics not included in the study, this was done in order to establish its clarity, validity and reliability for the study. The pre-tested questionnaire was analyzed and necessary modifications were effected.

**Ethical Consideration and Community Penetration:**

Permission for the conduct of the study was gotten through the Letter of introduction that was collected from the department of Nursing science, school of Health Science, Open University of Nigeria, Ado Ekiti study center to the Head of Nursing Department of the selected Institutions.

The consent of the respondents were obtained, as they were not under obligation to participate in the study. Also the anonymity and confidentiality of the respondents was assured.

**Procedure for Administering the Research Instrument:**

A total of one hundred and eighty (180) structured questionnaires were administered to the respondents from each category of the study population. The questionnaire was specially designed for this survey by the researcher and was completed under the supervision of the researcher; the research questionnaires were self-administered to the hundred and eighty respondents during the antenatal clinic session, explanation about the study and assurance of confidentiality was given to respondents before administration of questionnaire.

**Analysis of data:**

Data generated from this study was analyzed using social science statistical packages (SPSS) version 20.

**Presentation of Data:**

Results were presented in percentages, bar charts, Histogram and pie charts.



**Results:****1.1 Demographic Data:****Table 1: Distribution of Demographic Characteristics of respondents**

<b>Demographic factors</b>		<b>Frequency</b>	<b>%</b>
<b>Hospital</b>	General Hospital – Ikole Ekiti	50	30.7
	Federal Teaching Hospital – Ido Ekiti	57	35.0
	Comprehensive Health Centre – Oye Ekiti	56	34.4
<b>Marital status</b>	Never married	16	9.8
	Married	135	82.8
	Separated	5	3.1
	Widow	5	3.1
	Divorced	2	1.2
<b>Education level</b>	No formal education	4	2.5
	Primary	4	2.5
	Secondary	40	24.5
	NCE/OND	37	22.7
	HND/B.Sc	64	39.3
	Postgraduate	14	8.6
<b>Religion</b>	Christianity	124	76.1
	Islam	39	23.9
<b>Occupation</b>	No response	2	1.2
	Accountant	4	2.5
	Cleaner	3	1.8
	Civil servant	43	26.4
	Doctor	2	1.2
	Health Attendant	10	6.1
	House wife	2	1.2
	Nurse	39	23.9
	Student	18	11.0
	Teacher	20	12.3
<b>Age</b>	19 – 25 yrs	30	19.1
	26 – 30 yrs	25	15.9
	31 – 40 yrs	78	49.7
	Above 40 years	24	15.3
<b>Total</b>		<b>163</b>	<b>100</b>

Table 1 shows 50 (30.7%) of the respondents were from General Hospital – Ikole Ekiti, 57 (35%) of them were from Federal Teaching Hospital – Ido Ekiti, while 56 (34.4%) were from comprehensive Health centre – Oye Ekiti. Also, 16 (9.8%) were not married, 135 (82.8%) were married, 5 (2.5%) were separated, 5 (3.1%) were widowed, while 2 (1.2%). Four (2.5%) of the respondent had no formal education, 4 (2.5%) had primary education, 40 (24.5%) had secondary education, 37 (22.7%) of them had NCE/OND, 64 (39.3%) had HND/B.Sc, while 14 (8.6%) had postgraduate education.



**Okhakhume A.S. et al.** The Knowledge and Practices of Women of Child Bearing Age towards Safe Motherhood in Ekiti State Additionally, 124 (76.1%) of the respondents are Christians, while 39 (23.9%) are Muslims. 4 (2.5%) of the respondents were accountants, 3 (1.8%) were cleaners, 43 (26.4%) were Civil servants, 2 (1.2%) were Doctors, 10 (6.1%) were Health attendants, 2 (1.2%) were House wives, 39 (23.9%) were Nurses, 18 (11.0%) were Students, 20 (12.3%) were Teachers, while 20 (12.3%) were Traders. Finally, 30 (19.1%) of the respondents were in the age range of 19 – 25 years, 25 (15.9%) belong to the age range of 26 – 30 years, 78 (49.7%) belong to the age range of 31 – 40 years, while 24 (15.3%) of them belong to the age of above 40 years.

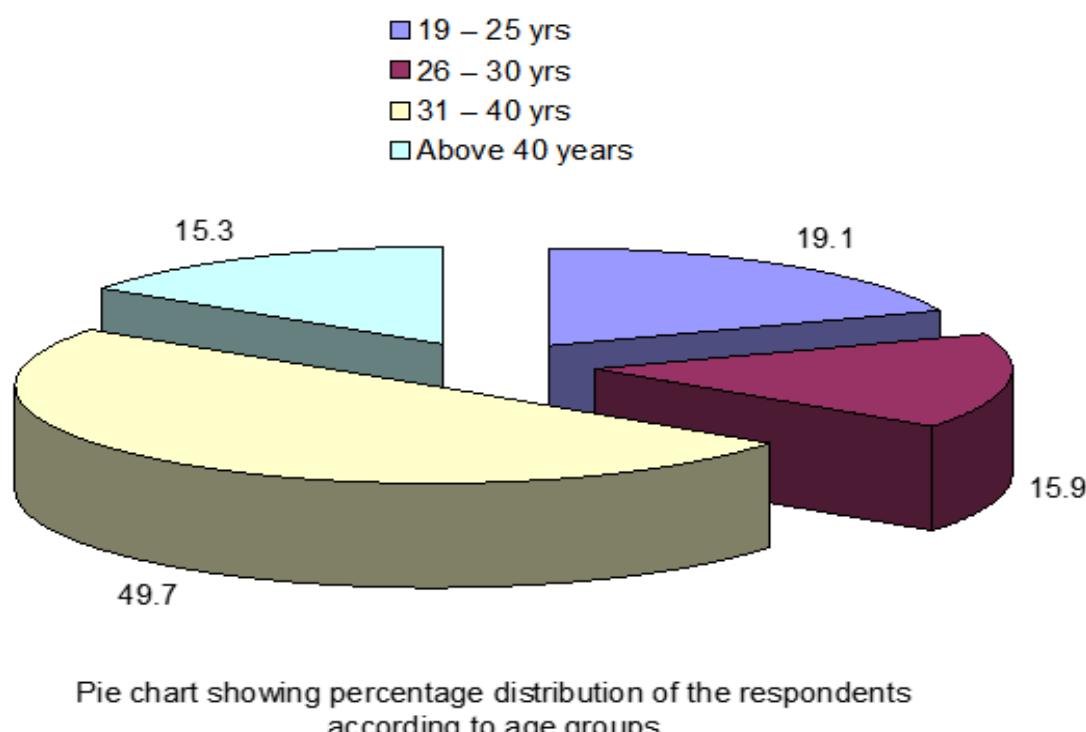
## 1.2 Research objectives:

The results were presented in Tables according to research objectives and hypothesis.

**Research objective 1:** Determine the nutritional knowledge and practices among women of childbearing age.

**Table 2: Knowledge of Safe Motherhood Practices (n=163)**

SN	Knowledge	Freq	%
1	Knowledge of number of recommended Antenatal care (ANC) visits	132	81.0
2	Knowledge of benefits of ANC visits	148	90.8
3	Knowledge of diseases preventable by medications given during ANC visits	111	68.1
4	Knowledge of maternal danger signs	113	69.3
5	Knowledge of actions in safe pregnancy plan	109	66.9
6	Knowledge of benefits of health facility delivery by skilled birth attendants	125	76.7
7	Knowledge of clean delivery practices	145	89.0
8	Knowledge of number of recommended ANC visits	132	81.0
	<b>Average</b>		<b>77.9</b>



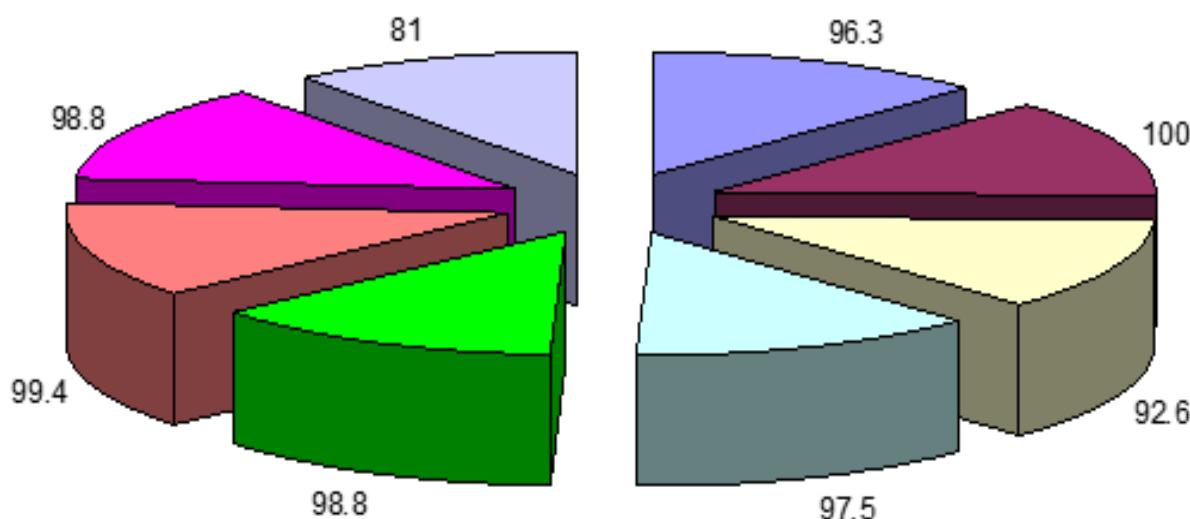
**Okhakhume A.S. et al.** The Knowledge and Practices of Women of Child Bearing Age towards Safe Motherhood in Ekiti State Table 2 and Figure 1 reveal that the knowledge of safe motherhood practices among Child Bearing Mothers (CBMs) were considered adequate (77.9%). Further, all items among knowledge of safe motherhood practices met the 50 per cent cut off as recommended by WHO international standard.

**Research objective 2:** Ascertain the immunization knowledge and practices among women of childbearing age.

**Table 3: Immunization knowledge and practices among women of childbearing age (n=163)**

SN	Immunization knowledge and practices	Freq	%
1	Immunizing the child with DPT I, II, & III against diphtheria, pertussis and tetanus.	157	96.3
2	Immunization against poliomyelitis	163	100
3	Immunization against Hepatitis type A and B and yellow fever	151	92.6
4	Immunization against maternal neonatal tetanus	159	97.5
5	Immunization against whooping cough	161	98.8
6	Immunization against measles	162	99.4
7	Immunization against tuberculosis	161	98.8
	<b>Average</b>		<b>97.6</b>

- Immunizing the child with DPT I, II, & III against diphtheria, pertussis and tetanus.
- Immunization against poliomyelitis
- Immunization against Hepatitis type A and B and yellow fever
- Immunization against maternal neonatal tetanus
- Immunization against whooping cough
- Immunization against measles
- Immunization against tuberculosis
- Knowledge of number of recommended ANC visits

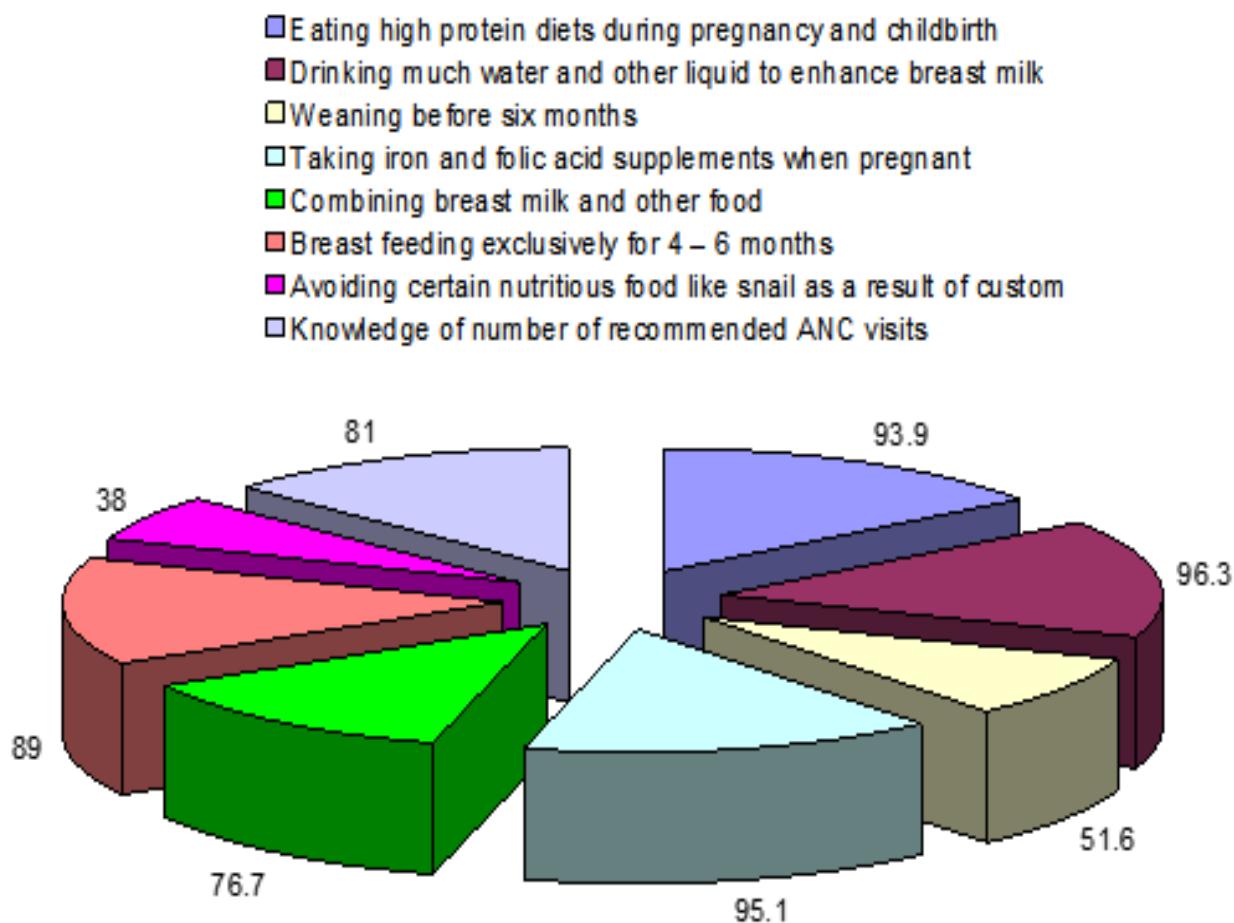


**Figure 2 showing immunization knowledge and practices among CBMs in Ekiti State**

**Okhakhume A.S. et al.** The Knowledge and Practices of Women of Child Bearing Age towards Safe Motherhood in Ekiti State Table 4.3 and Figure 2 shows that the immunization practices of CBMs was excellently adequate (97.6%) since it met the above acceptable standard by WHO.

**Table 4: Nutritional practices among women of childbearing age (n=163)**

SN	Nutritional Practices of Mother for safe motherhood	Freq	%
1	Eating high protein diets during pregnancy and childbirth	153	93.9
2	Drinking much water and other liquid to enhance breast milk	157	96.3
3	Weaning before six months	84	51.6
4	Taking iron and folic acid supplements when pregnant	155	95.1
5	Combining breast milk and other food	125	76.7
6	Breast feeding exclusively for 4 – 6 months	145	89.0
7	Avoiding certain nutritious food like snail as a result of custom	62	38.0
	<i>Average</i>		77.2



**Figure 4 showing nutritional practices among CBMs in Ekiti State**

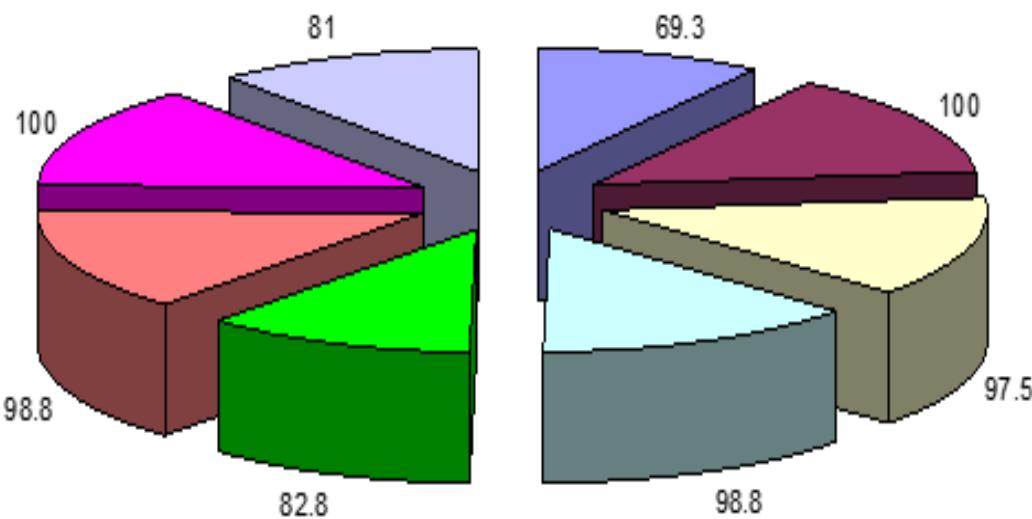
Table 4 and Figure 4 reveal that the nutritional practices among CBMs were considered adequate (77.2%). However, one item among nutritional practices did not meet the 50 percent cut off as recommended by WHO international standard.

**Research objective 3:** Identify personal hygiene knowledge and practices among women of childbearing age.

**Table 5: Personal hygiene knowledge and practices among women of childbearing age (n=163)**

SN	Personal hygiene knowledge and practices	Freq	%
1	Cleaning the breast with salt tepid water solution before breast feeding	113	69.3
2	Proper cleaning of the environment	163	100
3	Adequate washing of vegetables, fruits and other food items before consumption	159	97.5
4	Washing of hands after using the toilet	161	98.8
5	Bathing twice daily	135	82.8
6	Covering of cooked food against rodents and vectors	161	98.8
7	Use of safe and clean water	163	100
	<b>Average</b>		<b>92.5</b>

- Cleaning the breast with salt tepid water solution before breast feeding
- Proper cleaning of the environment
- Adequate washing of vegetables, fruits and other food items before consumption
- Washing of hands after using the toilet
- Bathing twice daily
- Covering of cooked food against rodents and vectors
- Use of safe and clean water
- Knowledge of number of recommended ANC visits



**Figure 3 showing personal hygiene practices among CBMs in Ekiti State**

Table 5 and Figure 3 shows that the personal hygiene knowledge practices of CBMs was excellently adequate (92.5%) since it met the above acceptable standard by WHO.

**Table 6: Competency of the health personnel among women of childbearing age (n=163)**

<b>SN</b>	<b>Competency of the health personnel</b>	<b>Freq</b>	<b>%</b>
1	I am satisfy with care given	159	97.5
2	Do you really have interest in client condition	120	73.6
3	Is the client aware of his illness	112	68.7
4	The health care giver is capable of allaying my fear	125	76.7
5	The health care worker capable of discharging his care consciously	143	87.7
	<b>Average</b>		<b>80.8</b>

Table 6 shows that the competency of the health personnel according to CBMs was very adequate (80.8%) since it met the above acceptable standard by WHO.

**Table 7: Factors that determine underutilization of safe motherhood facilities (n=163)**

<b>SN</b>	<b>Factors that determine underutilization</b>	<b>Freq</b>	<b>%</b>
1	I attended ANC regularly	131	80.4
2	Any problem during pregnancy, labor or puerperium	85	52.1
3	They have adequate facilities	131	80.4
4	Competent care giver available	157	96.3
5	I was adequately cared for	155	95.1
	<b>Average</b>		<b>80.9</b>

Table 7 shows that the factors that determine underutilization of safe motherhood facilities according to CBMs was very adequate (80.9%) since it met the above acceptable standard by WHO.

**Table 8: Availability and accessibility of facilities for safe motherhood (n=163)**

<b>SN</b>	<b>Availability and accessibility of facilities for safe motherhood</b>	<b>Freq</b>	<b>%</b>
1	The clinic is far from home	47	28.8
2	The clinic is not far from home	109	66.9
3	Road to the hospital is bad	37	22.7
4	Road to the hospital is good	124	76.1
5	It is cheap and readily available	80	49.1
6	I feel, it is important	154	94.5
7	Transport fare is cheap	81	49.7
	<b>Average</b>		<b>55.4</b>

Table 8 shows that availability and accessibility of facilities for safe motherhood according to CBMs was a little above average (55.4%). However, three items (1, 3 and 5) among the facilities did not meet the 50 percent cut off as recommended by WHO international standard.



**Table 9: Family Planning practice of safe motherhood (n=163)**

SN	Family Planning practice of safe motherhood	Freq	%
1	Do you agree to early marriage	83	50.9
2	Women who married early do not make good home	62	38.0
3	They are prone to risk during pregnancy and labour	115	70.6
4	Early marriage increase maternal death	100	61.3
5	My parents are relieved of burden	101	62.0
6	Mothers look younger	113	69.3
7	Food will be enough for the family	90	55.2
	<b>Average</b>		<b>58.2</b>

Table 9 shows that family planning practice of safe motherhood according to CBMs was above average (58.2%). However, one item (2) among the family planning practices did not meet the 50 percent cut off as recommended by WHO international standard.

- I attended ANC regularly
- Any problem during pregnancy, labor or puerperium
- They have adequate facilities
- Competent care giver available
- I was adequately cared for

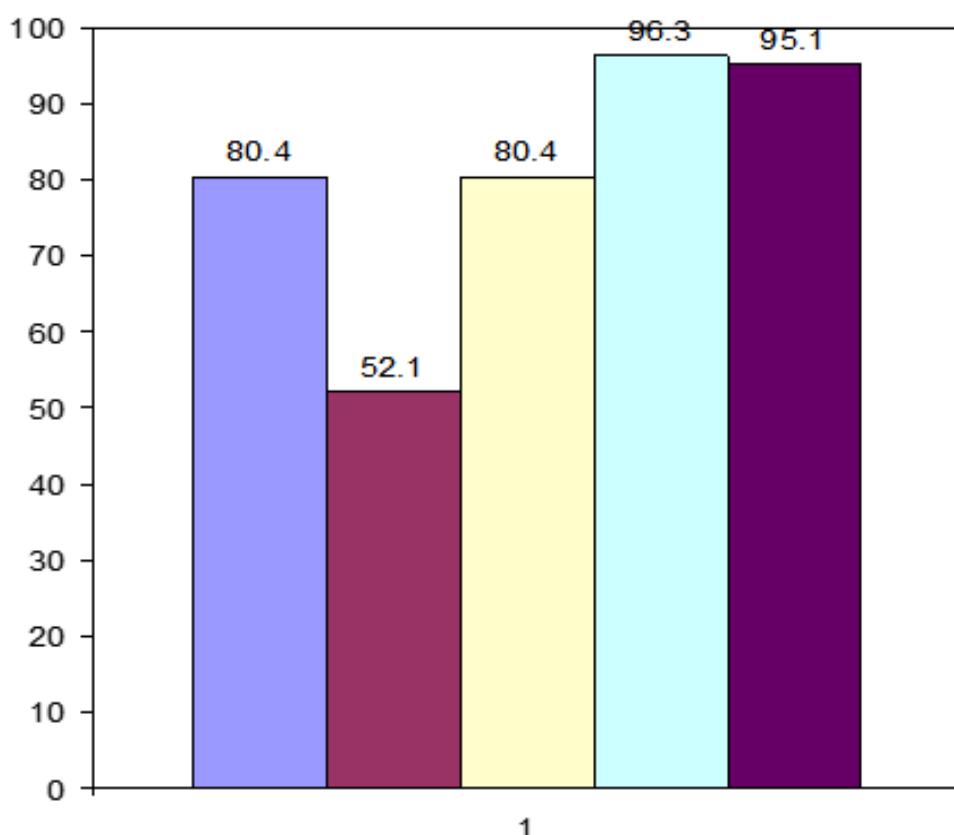
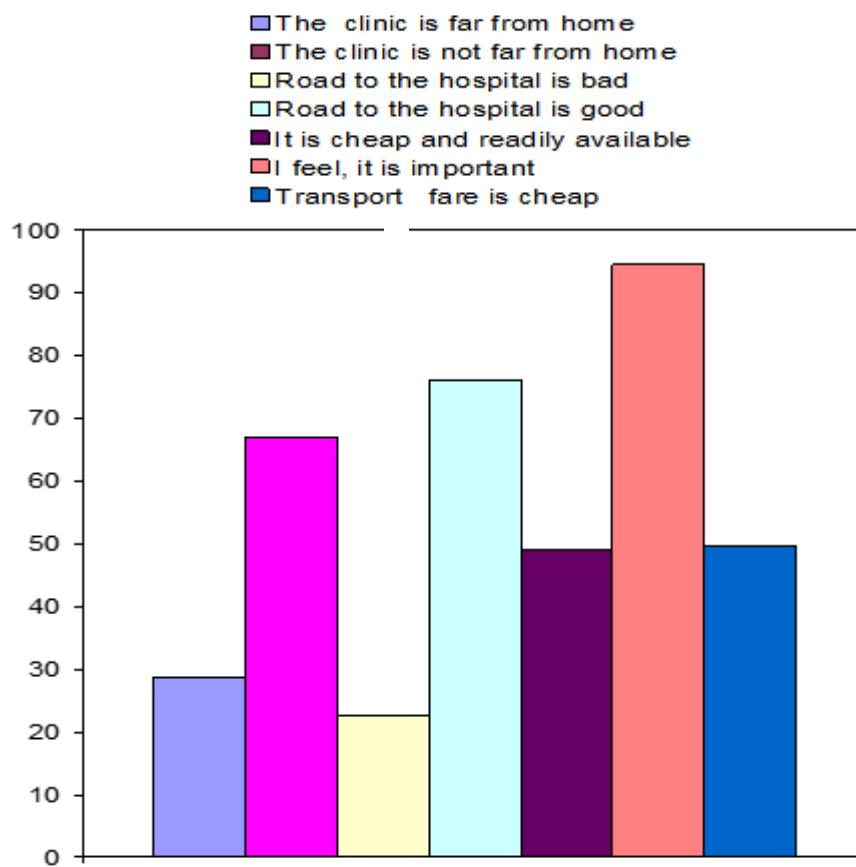
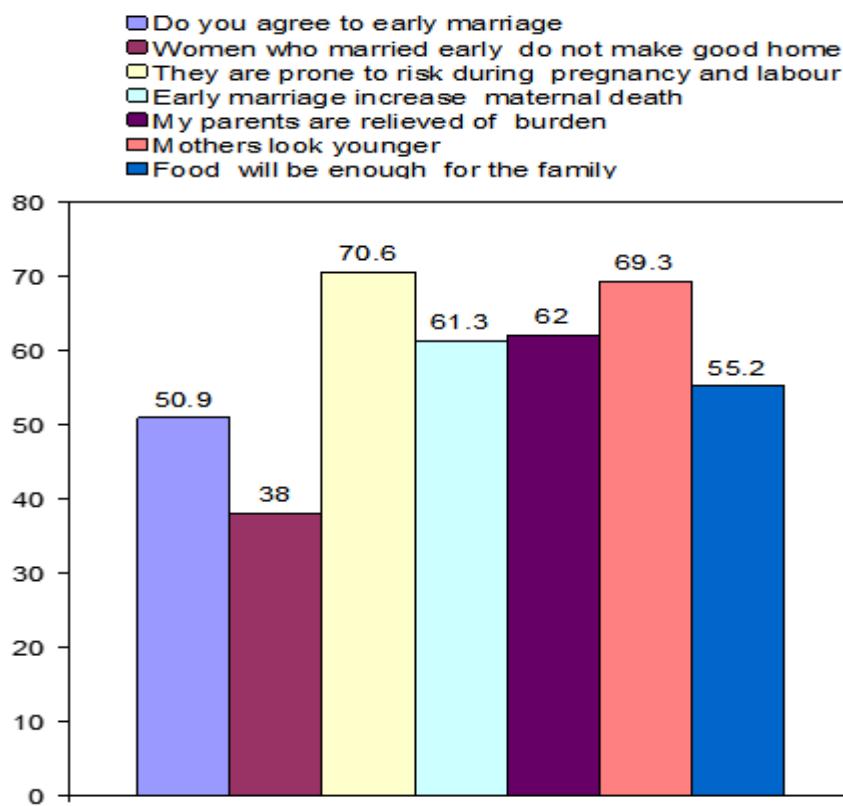


Figure 6 showing Percentage Factor that determine underutilization of safe motherhood facilities in Ekiti State





**Figure 7 showing Availability and accessibility of facilities for safe motherhood in Ekiti State**



**Figure 8 showing Percentage Family Planning practice of safe motherhood in Ekiti State**

**Hypothesis Testing:**

HO1 There is no statistically significant difference on safe motherhood practices among childbearing mothers (CBMs) in Ekiti State based on level of maternal education.

**Table 10 ANOVA showing the effect of level of maternal education on Safe motherhood practices**

<b>Safe Motherhood Practices</b>		<b>SS</b>	<b>df</b>	<b>MS</b>	<b>F</b>	<b>Sig.</b>
Knowledge of SM	Educational level	159.174	5	31.835	6.026	.000
	Error	829.427	157	5.283		
	Total	988.601	162			
Nutritional practices of SM	Educational level	365.859	5	73.172	4.848	.000
	Error	2369.417	157	15.092		
	Total	2735.276	162			
Immunization practices of SM	Educational level	435.119	5	87.024	12.366	.000
	Error	1104.856	157	7.037		
	Total	1539.975	162			
Personal hygiene practice	Educational level	100.188	5	20.038	2.934	.015
	Error	1072.229	157	6.829		
	Total	1172.417	162			
Competency of the health personnel	Educational level	35.851	5	7.170	6.913	.000
	Error	162.848	157	1.037		
	Total	198.699	162			
Factors that determine underutilization of SM	Educational level	9.120	5	1.824	2.436	.037
	Error	117.579	157	.749		
	Total	126.699	162			
Availability and accessibility for SM	Educational level	290.029	5	58.006	4.331	.001
	Error	2102.572	157	13.392		
	Total	2392.601	162			
Family planning practice of SM	Educational level	1186.750	5	237.350	11.039	.000
	Error	3375.814	157	21.502		
	Total	4562.564	162			

The table shows that maternal educational level had significant effect on all the safe motherhood practices, Knowledge of SM [ $F(5,157)=6.026$ ,  $p<.001$ ]; Nutritional practices of SM [ $F(5,157)=8.848$ ,  $p<.001$ ]; Immunization practices of SM [ $F(5,157)=12.366$ ,  $p<.001$ ]; Personal hygiene practice [ $F(5,157)=2.934$ ,  $p<.05$ ]; Competency of the health personnel [ $F(5,157)=6.913$ ,  $p<.001$ ]; Factors that determine



**Okhakhume A.S. et al.** The Knowledge and Practices of Women of Child Bearing Age towards Safe Motherhood in Ekiti State underutilization of SM [ $F(5,157)=2.436$ ,  $p<.05$ ]; Availability and accessibility for SM [ $F(5,157)=4.331$ ,  $p<.001$ ] & Family planning practice of SM [ $F(5,157)=11.039$ ,  $p<.001$ ].

## **Discussion:**

### **Knowledge of Safe Motherhood Practices among CBMs in Ekiti State:**

The findings in table 2 shows that knowledge of safe motherhood practices (77.9%) were adequate among CBMs in Ekiti state. This is really expected because majority of the mothers are fairly well educated, they value the importance of knowledge of safe motherhood practices. This finding is in support of UNICEF (2004) which stated that adequate knowledge of safe motherhood practices during pregnancy and after delivery would save millions of life yearly. Obionu (2006) agreed that knowledge of safe motherhood practices is really the most powerful cost effective means of preventing some of the deadly disease of childhood.

### **Immunization Practices among CBMs in Ekiti State:**

The findings in table 3 shows that immunization practices (97.6%) were excellently adequate among CBMs in Ekiti state. This shows that most of the mothers value the importance of immunization. This finding also lays credence to that of UNICEF (2004) which stated that adequate immunization during pregnancy and after delivery would save millions of life yearly. Obionu (2006) also agreed that immunization is really the most powerful cost effective means of preventing some of the deadly disease of childhood.

### **Nutritional practices among CBMs in Ekiti State:**

The findings in table 4 revealed that there were good nutritional practices (77.2) among CBMs in Ekiti state. The finding is not surprising as it appears to resemble the good nutritional practices of most CBMs in Ekiti state. The finding is in contrast with Adeyemi (2004) assertion that many women have poor nutritional practices which contribute to low rate of maternal mortality in the area. This perhaps could be the reason UNICEF (2003) had earlier stipulated that poor nutritional practices among CBMs attributed to increased maternal mortality and major developmental challenges in the health of mothers. Surat (2002) also reported that safe motherhood practices are the application of good health to daily living of pregnant women. According to him, they include practices like adequate nutrition, personal hygiene, family planning, immunization practices to mention a few.

### **Personal Hygiene Practices among CBMs in Ekiti State:**

The findings in table 5 presented an over whelming result concerning the personal hygiene practice (92.5%) among CBMs in Ekiti state. This is supported by Surat (2002) who reported that safe motherhood refers to the application of good health to daily living such as personal hygiene and nutrition in order to ensure that the health of the mother and that of the baby is not jeopardized. He further explained that safe motherhood is ensured through effective and efficient practice of health care services. Lawoyin (2008) also reported that in order to ensure good and safe health of the mother and her baby, women should endeavour to take their bath at least twice daily, clean their vagina thoroughly with tepid water and keep their finger nails short so as not to harbour germs and dirts. This shows that mothers now appreciate the importance of personal hygiene as a preventable tool in health education. The findings were in consonance with Babafemi (2002) who stated that despite the challenges facing women as home carers; they still have skills for positive personal hygiene practices. The findings were expected and should be a heart – warming news to personal hygiene proponent.

### **Competency of the health personnel among CBMs in Ekiti State:**

The findings in table 6 presented an over whelming result concerning competency of the health personnel (80.8%) among CBMs in Ekiti state.



### **Factors that determine underutilization of safe motherhood facilities among CBMs in Ekiti State:**

The findings in table 7 presented an overwhelming result concerning factors that determine underutilization of safe motherhood facilities (80.9%) among CBMs in Ekiti state.

### **Availability and accessibility of facilities for safe motherhood among CBMs in Ekiti State:**

The findings in table 8 presented above average result concerning availability and accessibility of facilities for safe motherhood (55.4%) among CBMs in Ekiti state.

### **Family planning practice of safe motherhood among CBMs in Ekiti State:**

The findings in table 9 presented above average result concerning family planning practice of safe motherhood (58.2%) among CBMs in Ekiti state.

### **Effect of Maternal level of education on safe motherhood practices among CBMs in Ekiti State:**

The result in Table 10 shows that maternal level of education has significant impact on safe motherhood practices in Ekiti State. The findings were not surprising and expected. However, the finding goes to contradict Agu's (1999) report that education has no influence whatsoever with the practices of safe motherhood.

### **Conclusion:**

Based on the result of the study and discussion, the following conclusions were made:

1. There were adequate knowledge of safe motherhood practices (77.9%) among CBMs in Ekiti State.
2. There were adequate nutritional practices (77.2%) among CBMs in Ekiti State.
3. The immunization practices among CBMs (97.6%) in Ekiti State were excellently adequate.
4. The personal hygiene practices among CBMs (92.5%) in Ekiti State were more than adequate.

### **Recommendation**

Based on the findings and discussion, the following recommendation

1. Health educators, institutions and other health professional should design better educational strategies to improve health education practices among CBMs in the area of study.
2. Seminars and workshop should be organized for CBMs to improve their utilization of MCH services.
3. All stake holders including churches, parents and all concerned in child up bringing should be mobilized and sensitized to modify the health education myths among CBMs in the area of study.
4. Institutions should be established to organize, coordinate and fund state and national research on sustainable practice of safe motherhood among CBMs.

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