Original Research Article

Survey on Rural Woman of Childbearing Age towards Utilization of Antenatal Care in Owerri West Local Government Area of Imo State

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Abstract: The study assed the utilization of antenatal care by rural women of child bearing age of Owerri West L.G.A., Imo State. The researcher selected 150 women as sample size out of 156. For the purpose of the study to be achieved, the researcher used questionnaire as the study instrument. Using Cochran (1967), the sample size was calculated. A cross-sectional descriptive study was used in this research adopting a mixed method. Scores were using simple descriptive statistics which included mean and standard deviation. From the result it shows that age group between 33-40 years were the highest participant and the least participant is age group 18-26years. From the respondent occupation distribution shows that the participants are mostly farmers followed by civil servants and the least is unemployment. From the result it shows that the perception of rural women in Owerri West local government area on antenatal care utilization is high and it is affected by ignorance of location and existence of facilities. Furthermore, their attitudes is affected by some factors like religion, culture and socio-economic factor rating the major factor followed by knowledge behavior, attitude and capability of the health workers. There are also factors that create barriers and the programme that rely on ANC for their integration and strengthening. On the factors that create barriers to effective utilization, ignorance/consent from their husbands is a major factor followed by educational level of the women. Improper site and location of the facilities is not a barrier to the effective utilization of ANC. In view of the above it shows that the utilization and perception ANC service is high.

Keywords: survey, rural woman, child bearing age, antenatal care

INTRODUCTION

World Health Organization (2014) estimates that more than half a million women lose their lives in the process of reproduction worldwide every year and most of these mortalities are avoidable if mothers have access to maternal health care services.

USAID global health initiative also targets reducing maternal mortality of 30% across all its assisted countries. The main objective of safe motherhood is ensuring that all women receive the care they need to be safe and healthy throughout pregnancy and childbirth. One of the key interventions needed to meet the objective of safe motherhood and millennium development goal is antenatal care (ANC). Since the launching of the safe motherhood initiative improving maternal health has continued to be the focus of many international health programs. For instance, improving maternal health is the 5th of the Millennium Development Goal (MDGs). This goal calls for a 75%

reduction in maternal mortality between 1990-2015 (USAID, 2014). Child bearing age is one of the hazardous experiences that women engage in while bringing new life to the world. It is often associated with complications that may cause morbidities, disabilities and mortalities.

According to WHO/UN1CEF (2014), ANC is the care a woman receives during pregnancy which helps to ensure healthy outcome for women and their newborns.

Access to information about maternal services should be available in the communities to help women make choice about whom to see, where to go as well as decide the type of care they require. Access to health care particularly at the critical time of birth can help ensure that child birth is a joyful event (WHO, 2010). Access means that women can reach maternal health care easily and not be deterred by cost or poor treatment

by staff. Women have been seen to travel long distance to access quality health care despite a ready availability of PHC facilities around where they live, work and school. However, lack of transport makes it difficult for pregnant women or women in labour to reach for help quickly. Fees charged for health care often put women off, having their babies with birth attendants because health workers are rude and unsympathetic. In many cases, decisions about seeking care are made by mother-in-laws, husbands or other family members (FMOH, 2013).

In the course of rendering professional nursing services at different hospitals that represent the 3 tiers of health care institution, the researcher observed that most clients attend any health institution, irrespective of the level of the health institution, indication for care or their identified health needs.

Aim
The researcher intends to find out the utilization of antenatal care services by rural women of child bearing age towards health care utilization despite the availability, affordability, accessibility and proximity of health care institution to the place where they live or work.

Objective of the Study
The objectives of the study are as follows:
- To ascertain the perception of rural women in Owerri West Local Government Area on Antenatal care utilization.
- To ascertain the attitude of women of child bearing age towards utilization of FANC care services.
- To ascertain different factors that create barriers to effective utilization of health care delivery services by the women of child bearing age in Owerri West L.G.A.
- To identify the multiple programmes that rely on ANC, their integration and strengthening.

RESEARCH METHODOLOGY
Research Design
A cross sectional descriptive study was used in this research adopting a mixed method. The study was conducted in Owerri West Local Government. Quantitative research methods were employed in this study using questionnaires and qualitative research methods using focus group discussions.

Study Setting
This study was carried out in Owerri West Local Government of Imo State, Nigeria. The local government is a part in Owerri Zone.

Population of the study
The study was conducted among all rural women of child bearing age in the study area.

Sampling and Sampling Technique
A minimum sample size of approximately 156 women of child bearing age participated in the study with a structured questionnaire. A 10% non-response rate was factored into it.

According to Cochran (1967), the sample size was calculated using the formula:

Sample size, $n = \frac{z^2 pq}{d^2}$

z is the confidence limits
p is the assumed prevalence of the dependent variable
q is given by 1-p
d is the acceptable deviation from the true value For this study:
z= 1.96 for Cl at 95%, p= 89.7% = 0.897
This indicates that 89.7% of ANC clients were satisfied with the quality of ANC in public hospitals.
q =1 -0.897=0.103 d =5%= 0.05
$n = \frac{1.96^2 \; x \; 0.897 \; x \; 0.103}{0.05^2}$
Adjustment for a 10% rate of non-responses of 141.97 yielded a final sample size of 155.97~156.

Sampling Technique
Systematic random sampling was employed in this study to recruit women of child bearing age for the study.

Sampling Procedure
The researcher had to concentrate using churches as a point of place in gathering information from the number of women of child bearing age that will participate in the study. Women of child bearing age that participated for services were samples. But before gathering this data, the researcher already visited the churches and the data collected showed that for over a 2 week period, it was estimated that 900 rural women of child bearing age were available to be surveyed. To determine the sampling interval at which the pregnant women were recruited was calculated as follows;

Daily attendance = 90

Data collection period over 2 weeks = 10 days excluding weekends since the ANC does not run during the weekends.

Number of pregnant women attending ANC during data collection period (N) = 90 x 10=900. To determine the sampling interval:
$(K) = \frac{N}{n}$

Where n = Sample size of 156 pregnant women K = Sampling interval
N = Population

$$(K) = \frac{900}{156} = 5.7 \cong 6.$$

Instrument for Data Collection

The instrument for data collection is a questionnaire developed by the research. The survey made used of Four Point Likert Scale Type of Questionnaire to gather information from rural women of child bearing age. The questionnaire designed considered the stated objective. It is divided into four sections. Section A ascertained the level of perception of rural women in Owerri West LGA on ANC utilization. Section B ascertained the level of attitude of WCBA towards utilization of FANCE services. Section C ascertained the different factors that creates barrier to effective utilization of health care delivery services by the WCBA in Owerri West LGA. Section D identified the multiple programme that rely on ANC, their integration and strengthening.

Validity of instrument

The instrument's validity was established by the project supervisor when the questionnaire which was formulated by the researcher was presented to her after making appropriate suggestions. Corrections and necessary adjustment were made by the researcher.

Reliability of Instrument

For the reliability of the instrument, a pilot study was conducted using test-retest method in which fifteen (15) copies of the question were distributed to 15 women of reproductive age in Umunna, After filling the questionnaire another fresh copies of the same questionnaire were administered to the same group of women after one (1) weeks. Responses from The two tests were correlated using Pearson Product Moment Correlation Analysis to test their significance at 0.05 significant levels. A result greater than 0.60 indicates that the questionnaire is reliable.

Method of Data Collection

An identification letter was collected from the Head of Department of nursing Imo State University (Dr. Mrs. Ibebuike Julia) and was presented to the Priest/Pastors of the church where most of the data were collected, who gave a go ahead permission to continue with the research. The copies of the questionnaire were shared to allow women of child bearing age who met the inclusion criteria to participate in the study by the researcher and enough time was given to fill it. A total of 156questionnaires were distributed. The researcher and the assistants collected the questionnaires from the respondents and the entire156 questionnaire distributed were retrieved which formed the data for the study.

Method of Data Analysis

The scores obtained from the instrument were subjected to simple descriptive statistics which included mean and standard deviation.

Ethical consideration

A letter was written to captioned "To Whom It May Concern bearing a research topic and seeking for administrative permission of the ethical committee of the institution. An introductory letter from the department and a copy of a self-written research proposal comprising of chapter one. Summary of chapter one and chapter three of the research work with the instrument for data collection was submitted after which an approval was made however, the researcher ensured. The informed consent of respondent confidentiality and privacy of information anonymity of the respondents.

RESULTS

Table-1: Respondent's Age Distribution

Age Group	N	(%)
18-26	27	17.31
27-32	34	21.80
33-40	53	33.97
>40	42	26.92
Total	156	100

Source: Field Work, 2018

The result in table-1 shows that the age group between 33 - 40years (33.97%) were the highest participants in the study, followed by those aged > 40years (26.92%), then the age group 27 - 32 years (21.80%) and the least participants which is very insignificant (17.31%) falls within the age group above 1 8 - 2 6 years of age. See figure 1 for a graphical representation of the result.

Table-2: Respondent's Occupation Distribution

Occupational Distribution	N	(%)
Civil Servant	42	26.9
Trader	41	26.3
Farmer	52	33.3
Unemployed	21	13.5
Any other	0	0
Total	156	100

Source: Field Work, 2018

Table-2 presents the occupational distribution of the respondents. The result showed that the participants were mostly farmers (33.3%), followed by civil servant (26.9%), then about 26.3% were trader while the rest of 13.5% were unemployed.

Table-3: The perception of rural women in Owerri West Local Government Area on Antenatal care utilization

S/No.	Perception of rural women is affected by the following	SA	A	D	SD	Mean	Stand. Dev.
1	Ignorance of the location and existence of ANC/health centres and their services	120	28	6	2	3.71	0.603
2	Low capacity/knowledge of health workers in the ANC/health centres in Owerri West LGA	36	84	32	4	2.97	0.736
3	Impede by inadequate number and location of health centres in Owerri West LGA	90	30	30	6	3.31	0.913
4	The cost of ANC service in our facilities is not affordable	87	51	10	8	3.39	0.824
5	Poor road network and terrain of sites where our facilities are located in Owerri West	114	34	4	4	3.65	0.659
6	Some religious and cultural beliefs and discriminations	54	69	29	4	3.11	0.792
7	Inadequate motivation and incentives by the government	72	57	25	2	3.28	0.775
8	Lack of confidence on the health workers	51	51	48	6	2.94	0.889
9	Insufficient time and longer time spent in the health facilities	54	69	23	10	3.07	0.866
10	Educational background of women	108	40	4	4	3.62	0.667
					Grand	3.304	0.7148

Source: Field Work, 2018

The result in table-3 presents the perception of rural women in Owerri West Local Government Area on antenatal care utilization. The result discloses that the respondents' perception of rural women in Owerri West Local Government Area on antenatal care utilization is high as the result account a grand mean of 3.3 with a standard deviation of 0.715. The result shows that the majority of the respondents agreed that their perception on antenatal care utilization is affected due to ignorance of the location and existence of ANC/health centres and their services (3.71 ± 0.603), followed by poor road network and terrain of sites where facilities are located in Owerri West (3.65 ± 0.659) and educational background of women (3.62 ± 0.667).Other factors that affect respondents' perception on antenatal care utilization are low capacity/knowledge of health workers in the ANC/health centres, impede by inadequate number and location of health centres, the cost of ANC service in our facilities is not affordable, some religious and cultural beliefs and discriminations, inadequate motivation and incentives by the government, lack of confidence on the health workers and insufficient time and longer time spent in the health facilities (as their x is greater than 2.5).

Table-4: The attitude of women of child bearing age (WCBA) towards utilization of FANC care services

S/No.	Attitudes of WCBA is affected by the following	SA	A	D	SD	Mean	Stand. Dev.
1	Religious, cultural and socio-economic factors	123	27	4	2	3.74	0.569
2	Knowledge behaviour, attitude and capability of the health workers	90	48	14	4	3.44	0.764
3	The number of 4 visits is enough before delivery	36	57	55	8	2.78	0.862
4	Client is accompanied before she can attend ANC clinic	75	69	12	0	3.4	0.63
					Grand	3.34	0.645

Source: Field Work, 2018

The result in table-4 shows that women of child bearing age attitude towards utilization of FANC care services. The result discloses that the respondents agreed to the fact that their attitudes towards antenatal care services is affected by some factors as the result account a grand mean of 3.34 with a standard deviation of 0.645. The result shows that the majority of the respondents strongly agreed that religious, cultural and socio-economic factors (4.39±0.649) are the major factor influencing their attitudes towards utilization of FANC care services, followed by knowledge behaviour, attitude and capability of the health workers (3.44 ±0.764), and the fact that client needs to be accompanied before she can be attended with ease at ANC clinic as the result accounts a mean of 3.4 and standard deviation of 0.645.

Table-5: Respondents' view on different factors that create barriers to effective utilization of health care delivery services by the women of child bearing age in Owerri West L.G.A

S/No.	Factors that create barrier to effective utilization of health care delivery services are as follows	SA	A	D	SD	Mean	Stand. Dev.
1	Ignorance/consent from their husband	132	16	6	2	3.78	0.571
2	Low educational level of women	72	72	10	2	3.37	0.664
3	Religious and cultural beliefs of the women	51	84	19	2	3.18	0.686
4	High cost of services	57	81	18	0	3.25	0.649
5	Improper site and location of health facilities	19	54	61	22	2.45	0.882
6	Poor behaviour/attitude of health workers The services provided at the health facility from	46	107	3	0	3.28	0.49
7	reception, sitting area comfort, competence of health personnel and competences of health talk.	47	79	30	0	3.11	0.696
					Grand	3.20	0.423

Source: Field Work, 2018

Table-5 reports the respondents' view on different factors that create barriers to effective utilization of health care delivery services in Owerri West L.G.A. The result discloses that the respondents agreed to the fact that there are factors that create barrier to effective utilization of health care delivery services as the result account a grand mean of 3.20 with a standard deviation of 0.423. The result shows that the majority of the respondents agreed to the fact that ignorance/consent from their husband is the major factor that create barrier to effective utilization of health care delivery services (3.78 ±0.571), followed by low educational level of women(3.37 ±0.664), poor behaviour/attitude of health workers (3.28 ± 0.490), and high cost of services(3.25 ± 0.649). The women of child bearing age in Owerri West L.G.A disagreed to the statement that improper site and the location of health facilities is a factor that create barrier to effective utilization of the health care delivery services in in Owerri West L.G.A.

Table-6: Respondents' view on programmes that rely on ANC, their integration and strengthening

S/No	Programmes that rely on ANC for their integration and strengthening are:	SA	A	D	SD	Mean	Stand. Dev.
1	Infant welfare and immunisation services	100	47	6	3	3.56	0.664
2	Prevention from mother to child transmission of HiV/AIDS services	57	75	20	4	3.19	0.752
3	safe motherhood and post abortal care	48	51	45	12	2.87	0.944
4	Adolescent health care services	37	6	96	17	2.4	0.969
					Grand	3.01	0.608

Source: Field Work, 2018

Table-6 reports the respondents' view on programmes that rely on ANC, their integration and strengthening. The result discloses that the respondents agreed to the fact that there are programmes that rely on ANC for their integration and strengthening as the result account a grand mean of 3.01 with a standard deviation of 0.608. The result shows that the majority of the respondents agreed that infant welfare and immunisation services is a major programme that rely on ANC, their integration and strengthening (3.56 ±0.664), followed prevention from mother to child transmission of HIV/A1DS services (3.19 ±0.752), and safe motherhood and post abortalcare (2.87 ± 0.944) as programmes that rely on ANC, their integration and strengthening. The respondents disagreed to the fact that adolescent health care service (2.4 ± 0.969) is a programme that relies on ANC, their integration and strengthening.

DISCUSSION

The study has shown that perception of rural women in Owerri West Local Government Area on antenatal care utilization is high. The finding from the study has further shown that the majority of the women of child bearing age they agreed that their perception on antenatal care utilization is affected due to ignorance of the location and existence of ANC/health centres and their services followed by poor road network and terrain of sites where facilities are located in Owerri West. Other factors that affect respondents' perception on antenatal care utilization are low capacity/knowledge of health workers in the ANC/health centres, impede by inadequate number and location of health centres, the cost of ANC service in our facilities is not affordable, some religious and cultural beliefs and discriminations, inadequate motivation and incentives by the government, lack of confidence on the health workers and insufficient time and longer time spent in the health facilities.

The findings from the study discloses that majority of the rural women of child bearing age were

of the view that agreed to the fact that their attitude towards antenatal care services is affected by some factors. They see religious, cultural and socio-economic factors is the major factor that affected their attitudes towards FANC care services, followed by knowledge behaviour, attitude and capability of the health workers and the fact that client needs to be accompanied before she can be attended with ease at ANC clinic.

The women of child bearing age studied agreed to the fact that there are factors that create barrier to effective utilization of health care delivery services. They are of the view that ignorance/consent from their husband is the major factor that create barrier to effective utilization of health care delivery services followed by low educational level of women, poor behaviour/attitude of health workers and high cost of services.

The findings also showed that women of child bearing age studied agreed to the fact that there are programmes that rely on ANC for their integration and strengthening. Infant welfare and immunisation services is a major programme that rely on ANC, their integration and strengthening, followed prevention from mother to child transmission of HIV/AIDS services, and safe motherhood and post abortalcareasprogrammes that rely on ANC, their integration and strengthening. This finding supports WHO (2015) reports on programmes that rely on ANC for their integration and strengthening. Infant welfare and immunisation services are a major programme that relies on ANC, their integration and strengthening.

CONCLUSION
On the basis of the findings and discussions, the following conclusions were made:
- The perception of rural women in Owerri West Local Government Area on Antenatal care utilization is high and that their perception on antenatal care utilization is affected due to ignorance of the location and existence of ANC/health centers and their services followed by poor road network and terrain of sites where facilities are located in Owerri West.
- Religious, cultural and socio-economic factors is a major factor that affected the attitudes of rural women in Owerri West Local Government Area towards FANC care services, followed by knowledge behaviour, attitude and capability of the health workers and the fact that client needs to be accompanied before she can be attended with ease at ANC clinic.
- Ignorance/consent from their husband is the major factor that create barrier to effective utilization of health care delivery services followed by low educational level of women, poor behaviour/attitude of health workers

and high cost of services.
- Infant welfare and immunisation services is a major programme that rely on ANC, their integration and strengthening, followed prevention from mother to child transmission of HIV/AIDS services, and safe motherhood and post abortal care as programmers that rely on ANC, their integration and strengthening.

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