

KNOWLEDGE AND ATTITUDE OF PREGNANT WOMEN TOWARDS FOCUSED ANTE NATAL CARE SERVICES IN UNIVERSITY OF CALABAR TEACHING HOSPITAL, CALABAR, CROSS RIVER STATE, NIGERIA

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ABSTRACT: *The study investigated pregnant women's knowledge and attitude towards focused antenatal care in University of Calabar Teaching Hospital, Calabar. Three research questions and two hypotheses were formulated to guide the study. The literature was conceptually, empirically and theoretically reviewed based on the main variables under study. The study adopted a descriptive design and the sample size was 174 pregnant women attending antenatal care clinic in UCTH from January – May, 2014. The instrument for data collection was a three section questionnaire. The instrument had a correlation coefficient of 0.79. Questionnaire was administered through face to face interaction and on the spot collection of completed questionnaire. The data collected from questionnaires were analyzed using frequencies and percentages, while chi-square test analysis was used to test the hypotheses. Findings of the study revealed that majority of the respondents had good knowledge and favourable attitude towards focused antenatal care. In testing the hypothesis using chi-square analysis, hypothesis one showed a statistical association between knowledge and attitude towards focused antenatal care, when the chi-square calculated of 20.6 was greater than the critical chi-square of 5.991 at 0.05 level of significance with 2 degrees of freedom. Although knowledge towards focused antenatal care high and attitude was favourable, some weakness still exist which posed as hindrance to utilization. Based on the above, intensive awareness creation on focused antenatal care for pregnant women recommended. Retraining of health workers and monitoring and supervision of health workers to improve on the hindrance identified as barriers to utilization was also recommended.*

KEYWORDS: Knowledge And Attitude, Pregnant Women, Ante Natal Care Services, University Of Calabar, Teaching Hospital, Calabar, Cross River State, Nigeria

INTRODUCTION

Antenatal care (ANC) coverage is a success story in Africa, since over two-thirds of pregnant women (69 percent) have at least one ANC contact. However, to achieve the full life-saving potential that ANC promises for women and babies, four visits providing essential evidence based interventions, a package often called focused antenatal care is required (World Health Organization, 2005). Antenatal services comprise complete health supervision of the pregnant women in order to maintain, protect and promote health and well being of the mother and the fetus (Ojo, 2004). These services, according to him are rendered to a pregnant woman at monthly intervals, to 28 weeks of gestation, then fortnightly until 36 weeks and finally weekly visit until the birth of the baby. Similarly, Adesokan (2010) describes antenatal services as the attention, education, supervision and treatment given to the pregnant women from the time

conception is confirmed until the beginning of labour, in order to ensure safe pregnancy, labour and puerperium. Qualitative antenatal services are care given to pregnant women by a skilled or trained health provider to promote the health and survival of mother and child (Adesokan, 2010). The focused antenatal services refer to minimum number of four antenatal clinic visits, each of which has specific items of client assessment, education and care to ensure early detection and prompt management of complication (Ekabua, Ekabua & Njoku, 2011)

Focused antenatal care, which is evidence based, client-centered, goal directed care, provided by skilled health providers with emphasis on quality rather than frequency of visits, is an approach to be adopted globally. The approach accepts the view that every pregnant woman is at risk of complication and that all women should therefore; receive the same basic care and monitoring for complications (World Health Organization, 2005). Obionu (2006) postulates some justification for focused antenatal services. These include that all pregnant women are at risk of developing complication, that more attention are given to individuals in the high risk group but the risk approach to antenatal services increase the like hood that a skilled healthcare provider will present at birth. Essential interventions in ANC include identification and management of obstetric complications such as preeclampsia, tetanus toxoid immunization, intermittent preventive treatment for malaria during pregnancy (IPTp), and identification and management of infections including HIV, syphilis and other sexually transmitted infections (STIs). ANC is also an opportunity to promote the use of skilled attendance at birth and healthy behaviours such as breastfeeding, early postnatal care, and planning for optimal pregnancy spacing.

Knowledge has been variously defined. Hornby (2006) describes knowledge as information, understanding and skills that one gains through education or experience. Knowledge is critical to man's quality of life because everything that is done depends on knowledge. Knowledge is the sum of conceptions, views and propositions which have been established and tested. In the context of this study, knowledge refers to the act of having adequate information and understanding of the concept of focused antenatal care services. This knowledge can be obtained through health education, electronic media, prints and health education programmes. It could be in realization of the above assertion that Magadu, Maduse & Rodignes (2006) maintained that knowledge of pregnant mothers is a major factor in determining the extent of utilization of antenatal services. According to them, the educational status of pregnant mothers is an influencing determinant in the effective utilization of maternal and child health (MCH) services. Igbokwe (2008) indicated that urban and rural locations have great impact on the utilization of antenatal services.

Expectant mothers in the urban area utilize antenatal services better than their counterparts in the rural area who have the problems of accessibility to MCH services; some pregnant mothers in the rural area may have basic knowledge of the importance of antenatal services but due to problems of accessibility to health facilities will hinder them from such services (Igbokwe, 2008). Also inadequate knowledge concerning health related matters usually lead to negative attitude towards the health issue. Attitude is the person's affective feelings of like and dislike. Attitude emerges out of personal experience and can be positive or negative. It is positive when a person develops a strong attraction of likeness for the situation, objectives or other persons or groups while it is negative when the person develops dislike for such situations, objectives, group or any other identifiable aspects of our environment (Igbokwe, 2012). An attitude can be defined as a positive or negative evaluation of people, objects, events, activities, ideas, or

just about anything in your environment. An attitude is an expression of favour or disfavour towards a person, place, thing, or event (Whitley, 2010).

Park (2009) views attitude as acquired characteristics of an individual which predisposes him or her to respond in some preferential manner. In the present context, an attitude refers to expectant mothers' affective feelings of likes and dislikes to focused antenatal care services. Thus the pregnant women's personal experience to focused antenatal care services can be positive or negative. Ojo (2004) asserts that level of education, has a significant influence on the attitude of pregnant women to antenatal services. Pregnant women with basic education usually manifest positive attitude.

In spite of the abundant benefits of focused antenatal care in the maternity settings in University of Calabar Teaching Hospital, Calabar, Cross River State, most women who reside in the area and its environs do not still avail themselves of this inexpensive opportunity, hence the researcher sought to determine if the women have adequate knowledge concerning focused antenatal care, and their attitudes towards its services in the University of Calabar Teaching Hospital, Cross River State, Nigeria.

Purpose of the study

The main aim of the study was to determine the knowledge and attitude of pregnant women towards focused antenatal care services in UCTH, Calabar.

Research questions

- (a) What is the knowledge of pregnant women towards focused antenatal care services in UCTH, Calabar?
- (b) What is the attitude of pregnant women towards focused antenatal care services in UCTH Calabar.

Hypothesis

There is no significant relationship between pregnant women's knowledge and their attitude towards focused antenatal care in UCTH, Calabar.

Significance of the study

To the pregnant women

It acts as a tool in detecting early, the problems associated with pregnancy and delivery and prompt treatments before it results in complications.

It alleviates the complications resulting from maternal and child mortality rate in Nigeria especially in Cross River State.

The women are able to know what to do at each stage of pregnancy and the appropriate time for visit.

To the midwives/nurses

This research study assists in planning and educating pregnant women attending antenatal clinic in UCTH on the importance and uses of focused antenatal care services in Nigeria.

It helps the nurses to carryout intensive mobilization for the communities on the benefits of focused antenatal care to the mothers, family and community at large.

To the researcher

It acts also as a guide for further studies.

Knowledge of pregnant women towards focused antenatal care

According to Yang, Yoshitoku, Harun-or, and Junichi (2010), in a study on factors affecting utilization of antenatal services among women in Khan district, Xiengkhouang province, Lao PDR stated that out of 310 women who participated in the study, 229(73.9%) lacked sufficient knowledge on antenatal care. 200(76.6%) heard about antenatal care and its important from traditional birth attendant's while 126(48.6%) heard it from health personnel and 88 (33.7%) heard it from mass media (radio, TV, poster and brochure).

In a study conducted by Akpan-Nnah (2011) on knowledge and attitude of pregnant women towards focused antenatal care services in General Hospital, Ikot Ekpene it was affirmed that of 120 respondents, 77(64.1%) have good knowledge of focused antenatal care and the remaining 43(35.9%) are not knowledgeable about focused antenatal care services.

Amosu, Degun, Thomas, Olanrewaju, Babalola, Omeonu, Ola, Oyerinde and Nwaogwugwu (2011), in a study on the acceptance and practice of focused antenatal care by health care providers in the South-West zone of Nigeria posited that of 500 participants used in the study, four hundred (80%) of the respondents were not aware of focused antenatal care, 60(12%) obtained the information from the internet, 140(28%) by attending seminars while 80(16%) could not remember how they received the information. Four hundred and seventy (94%) of the respondents agreed that the goal of focused antenatal is to prepare the pregnant mothers for delivery and possible complications, twenty (4%) said it is to ensure adequate exercise while 10(2%) felt it is to encourage the practice of traditional birth attendance.

The study on practice, knowledge and perceptions of antenatal care services among pregnant women and nursing mothers in South-West Nigeria by Fagbamigbe, Akanbienu, Adebowale, Olumide and Korter (2013), found out that of 460 study participants, the overall knowledge rate was 74.6%. 117(26%) respondents had good knowledge of antenatal care, 275(61.1%) had moderate knowledge and 58(12.9%) had poor knowledge of antenatal care services.

Two hundred and seven (45.0%) of the respondents stated that health workers were their source of information on antenatal facility, while 12.4%, 19.1%, 19.3% and 2.2% stated family, friends, relatives and news categorically is how they got to know about antenatal care.

Rosaliza and Muhamad (2011) in their study on knowledge, attitude and practice on antenatal among orang Asli women in Jempol, Negeri Semilan recorded that, of 104 women who participated in the study, that the knowledge score of the respondents ranged between 7-18 with the mean of 13.5 (SD-2.7) and the median of 14.0 (interquartile range, IQR=3). The proportion of respondents with good knowledge was 44.2 percent with 95% confidence interval of 34.7 to 53.7%. The study recorded that majority of women know that pregnant women need to go for antenatal check up should be done in the first three months. About a quarter did not know, half of the women did not know the complication which may arise with hypertension and diabetes in pregnancy. Only 80% of the Orang Asli women knew that primigravida should deliver in the hospital.

Attitude towards focused ante-natal

According to Akpan-Nnah (2011), 68(56.7%) women were classified as those with negative attitude towards the benefits of focused antenatal care while 52(43.3%) women had positive attitude towards the benefits of focused antenatal care. Amosu *et al.* (2011) opined that 42% respondents considered frequent routine as the norm and that women should be classified by risk category. It has been observed that visits were often irregular with long waiting time, little feedback to mothers and little or no communication with obstetrical or labour units. This is a component of traditional antenatal care resulting from lack of knowledge and practice. Yang *et al.* (2010), reported that 192(61.9%) of 310 study participants harboured a negative attitude towards the antenatal care services.

Rosliza and Muhamad (2011), opined that the attitude level of the Orang Asli women ranged from 46 – 70 with the mean score of 66.2, SD (2.3) and median of 64.0 (IQR = 12). The proportion of respondents with good attitude was 53.8% with 95% confident interval of 44.3 to 63.1 percent. They noted that there was a good response to the statement on the importance of early antenatal care booking where 88.5% of the respondents agreed to it. About 82.7% of the respondents strongly agreed to go for their first antenatal booking before the third month of their pregnancy. Almost all of the respondents (102 of 104) agreed that vitamin supplements are important for their pregnancy. In terms of their attitude regarding smoking and alcohol drinking during pregnancy, about three quarter of the women agreed that both practices might have harmful effects to the fetus. Majority of the women agreed to be screened if they need to go for antenatal care check-up.

MATERIALS AND METHODS**Research design**

A descriptive cross sectional survey design was used for the study.

Setting of the study

The study was carried out at the antenatal clinic of the University of Calabar Teaching Hospital Calabar. It is the only tertiary health facility in the state where women are attended to by specialized and their complaint are addressed by SERVICOM. The researchers chose this site because it is easily accessible and students are sent there for their clinical experiences and cases are referred from primary and secondary health facilities to the institution for expert management.

Sample and sampling technique

A sample of 174 pregnant women was selected using systematic random sampling method pregnant antenatal clinic attendees were selected on each clinic days for one month giving a total of 174.

Instrument for data collection

A self developed questionnaire divided into three sections was used to collect data. The questionnaire sought information on:

- a. Demographic data of respondents
- b. Measured the variables on knowledge and section c sought information on respondents attitude towards focused antenatal care. Positive comments by psychometric experts were suggestive of the face validity of the instruments. A

measure of its stability over time was assessed using a test-retest procedure which yielded a reliability coefficient of 0.79 after 2 weeks interval.

Scoring of items

In order to produce a more objective assessment of knowledge of focused antenatal care and attitude towards focused antenatal care, a scoring method was used correct item was scored "I" and incorrect item "O". Scores for each of the respondents on knowledge and attitude was obtained by adding up the scores for correct answers given to section B and C of the questionnaire.

A score more than 50% indicates good knowledge and positive attitude respectively

Data analysis

The data entry and analysis were performed using SPSS version 14. Association between variables was tested using chi-square test analysis. All results were confined at 0.05 level of significance.

Ethical consideration

A written permission was sought from and granted by the Assistant Director of Nursing Services in charge of the hospital. A letter of introduction was presented to the Medical Director of the Hospital and the Chief Nursing Officer in Charge of the ANC clinic. Participation in the study was voluntary. The purpose, general content and nature of the investigation were explained to each respondent to obtain a verbal and written consent before inclusion into the study.

Results

A total of 174 valid responses were obtained representing 100% response rate. Thus all the percentage were calculated using only the valid responses (n = 174). The findings of the study were presented based on the research questions and formulated hypothesis.

Research question I

What is the level of knowledge among pregnant women towards focused antenatal care in UCTH, Calabar?

TABLE 1

Knowledge of focused antenatal care among pregnant women in UCTH N = 174

S/N	Variables	Yes	No
1.	Focused antenatal care emphasizes quality of care rather than quantity of used	164 (94.3%)	10 (5.7%)
2.	FANC helped in birth preparedness and complication _____ planning	90 (51.7%)	84 (48.3%)
3.	Focused antenatal care is four visit approach	170 (97.7%)	4 (2.3%)
4.	FANC deals within each woman's specific need.	96 (55.2%)	78 (44.8%)
5.	FANC goal is to health promotion and disease prevention	170 (97.7%)	4 (2.3%)

The result in Table 1 on respondents knowledge of focused antenatal revealed that majority of the respondents had knowledge on FANC as emphasizing quality of care rather than quantity of care as 164(94.3%) said Yes while 10(5.7%) said no. Majority of the respondents 170(97.7%)

agreed that it involved four visits and FANC goal is for health promotion and disease prevention while 4(2.3%) respondents disagreed to the above. Ninety (51.7%) respondents agreed that FANC helped in birth preparedness and complication readiness planning while 85(48.3%) respondents disagreed. Ninety-six (55.2%) of respondents agreed that FANC deals with each women's specific need while 78(44.8%) disagree.

TABLE 2**Summary of respondents' knowledge of FANC in UCTH**

Variable	Frequencies	Percentage
Good knowledge	138	79.3
Poor knowledge	36	20.7
Total	174	100

Table 2 shows that 138(79.38%) of pregnant women attending Ark in UCTH had good knowledge of FANC, while 36(20.7%) had poor knowledge FANC. This calls for intensive health education on components and benefits of ANC during Ark visits.

Research question two

What is the attitude of pregnant women towards focused Ante-natal care in UCTH, Calabar?

TABLE 3**Attitude of pregnant women towards FANC in UCTH****N = 174**

S/N	Statement	Agreed	Disagreed
1.	I hate traditional ANC because it does not use screening for risk facilities	108 (62.1)	66 (37.9)
2.	I prefer FANC because seeing other women in the clinic relieves anxiety	120 (69%)	54 (31%)
3.	I feel FANC of the opportunity for individualized care.	110 (63.2%)	64 (36.8%)
4.	I prefer FANC because it involves counselling about women's health	116 (66.6%)	58 (33.4%)

Table 3 showed respondents options on attitude towards FANC, 108(62.1%) agreed that they hate traditional ANC because it does not use screening risk facility, while 66(37.9%) agreed. Similarly, 120(69%) respondents agreed that they preferred FANC because it helps in seeing each other women in the clinic and relieves anxiety. One hundred and ten (63.2%) agree that FANC gives them opportunity for individualized care while 64(36.8%) respondents disagreed. Majority of the respondents, 116(66.6%) agreed that FANC involves counseling about important issues affecting women while 58(33.4%) women disagreed to the option.

TABLE 4**Summary of pregnant women is attitude toward FANC in UCTH, Calabar.**

Statement	Frequencies	Percentage
Positive attitude	114	65.5
Negative attitude	60	34.5
Total	174	100

Table 4 showed that 114(65.5%) of the pregnant women showed favourable attitude towards FANC in UCTH while 60(34.5%) women showed unfavourable attitude towards FANC in UCTH Calabar.

Test of hypothesis

Hypothesis 1

There is no significant association between pregnant women's level of knowledge and their attitude towards focused ante-natal care.

TABLE 5

Chi-square analysis showing the association between pregnant women's knowledge on their attitude towards focused ante-natal care in UCTH, Calabar.

Knowledge of FANC	Attitude toward FANC		Total	df	X ² Cal	X ² Cri
	Favourable	Unfavourable				
Good knowledge	102	36	138	2	20.6	5.991
Poor knowledge	12	24	36			
Total	114	60				

Significant at 0.05, df 2, X₂ calculated 20.6, X₂ critical 5.991

The result from table 5 above showed a statistical relationship between knowledge of FANC and attitude towards FANC when the chi-square calculated of 20.6 was greater than the X₂ critical of 5.991 at 0.05 level of significance with 2 degrees of freedom. With this result, the null hypothesis was rejected, while the alternate was upheld, meaning there is a significant relationship between knowledge of FANC and attitude towards FANC among pregnant women in UCTH Calabar.

DISCUSSION OF FINDINGS

Knowledge of focused ante-natal care

The result from the findings on knowledge of pregnant women on focused ante-natal care revealed that majority of the respondents had good knowledge of FANC while minority had poor knowledge of FANC. The above result is supported by Yang *et al* (2010) in their study on factors affecting utilization of FANC who discovered respondents high level of knowledge on FANC as a factor affecting utilization of FANC. Also in line with the above, Akpan-Nnah (2011) in a study on knowledge and attitude toward FANC discovered that 77(64.1%) of respondents had good knowledge of FANC. Rosaliza and Muhammed (2011) also are in support of the above. Their result showed that majority of the respondents had good knowledge of FANC. Minority of the respondents demonstrated poor knowledge of FANC. This calls for intensive health education on components and benefits of FANC during ANC visits.

Attitude towards focused Ante natal care

The result on attitude towards focused ante-natal care showed respondents favourable attitude towards FANC. This is also supported by Rosalia and Muhammed (2011) in their study on attitude towards FANC which revealed positive respondents attitude towards FANC. Akpan-Nnah (2011) result in attitude towards FANC was not in agreement with the above findings when she discovered that majority of the respondents showed negative attitude towards FANC. The disparity between the two results may be attributed to the fact that traditional ante-natal

care gives them the opportunity to have regular contacts with their doctors and also seeing other clients with help to allay their anxiety.

Relationship between knowledge and attitude towards focused ante natal care

The result of hypothesis one using chi-square test statistical analysis showed a statistical association between knowledge of FANC and attitude towards FANC when the chi-square calculated was greater than the chi-square critical. The above result is supported by Rosalia and Muhammed (2011) on knowledge attitude and practice of FANC. The women had good knowledge score and their attitude towards FANC was positive. Also Fagbamigbe et al (2013) in their study on perception of FANC by pregnant mother and nursing mothers in South East Nigeria, support the above finding when they discovered that their clients had good knowledge and their attitude towards it was positive and their main source of information was from ANC.

Implications for nursing practice

The overall finding obtained from the result revealed pregnant women knowledge of FANC. However, there still exist poor knowledge and unfavourable attitude towards FANC by some pregnant women. This calls for intensive awareness creation on FANC for these women during ANC visit. Also workshop and retraining on component of FANC should be conducted for nurses in UCTH to update their knowledge and careful monitoring and supervision in order to improve on those observed weaknesses which posed as barriers to utilization of FANC.

CONCLUSION

The study revealed that respondents knowledge of FANC was good and there was uniformity in attitude toward FANC. However despite the above, minority of the respondents still demonstrated poor knowledge and unfavourable attitude which may be due to those factors identified as hindrance to FANC. Effort should be made to address those falls to improve utilization.

FUTURE RESEARCH

Based on the findings, the researchers suggest that further studies should be conducted on:

- Factors influencing the utilization of FANC in UCTH
- Similar study should be conducted in General Hospital, Calabar for comparism using a larger target population.

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