PREFERRED PLACE OF CHILDBIRTH IN RURAL SOUTHERN NIGERIA: A NECESSARY STEP TOWARDS MATERNAL DEATH REDUCTION.

¹Utoo B T and ²Utoo PM

¹Department of Obstetrics and Gynaecology, ²Department of Epidemiology and Community Health; College of Health Sciences & Benue State University Teaching Hospital, Makurdi, Nigeria.

ABSTRACT

Delivery outside orthodox health facilities without the assistance of a skilled birth attendant with consequent adverse maternal outcome is common in many developing countries. This cross sectional study using structured interviewer administered questionnaire for data collection was designed to determine the preferred place of delivery in the index pregnancy amongst antenatal attendees. Out of the 178 respondents, 35.4% were aged 25-29 years. Most (36%) were para 1 to 2, traders (40%), and about half had at least secondary education. Among the women who had previous home delivery, 84.2% preferred hospital delivery in index pregnancy. Overall, about 40% had hospital delivery in the last confinement. However, 93.8% preferred hospital delivery in the index pregnancy (p=0.0001). Cost 0.6%, distance 1.1%, Trust in God for safety 2.2%, self confidence 1.7% and harshness of hospital staff 0.6% were reasons for preference to deliver outside the hospital. Preference for hospital delivery was not associated with education (0.97) and parity (0.85). The study finds that majority of the women preferred hospital delivery. Tackling the challenges to hospital delivery and improving the quality of maternity services in orthodox health facilities will help to reduce maternal deaths in developing countries.

Keywords: Place of childbirth, millennium development goals, home delivery, maternal death, Nigeria. *Note: Abstract of this paper was presented at SOGON annual conference in Abakaliki 2012 and was thus published in the book of abstract.*

INTRODUCTION

Many efforts have been made in developing nations of the world towards the reduction of maternal deaths ¹. These became more intense since the beginning of programs such as the Safe motherhood initiative in Nairobi Kenya, 1987 and the United Nations millennium declaration at the millennium summit in New York, 2000, popularly known as the millennium development goals (MDGs) ^{2,3}. Despite these global Initiatives, maternal indices in

developing countries have remained unacceptably poor. The worse of maternal mortality ratios are in South Asia and Sub-

Correspondence author: Dr. Bernard Terkimbi Utoo,

Postal Address: GPO Box 239, Makurdi, Benue State, Nigeria.

Email: <u>bernardutoo@yahoo.com</u> Phone: +234(0) 08033725168.

Saharan Africa^{1,4}.

Some of the challenges militating against the reduction in maternal deaths particularly in developing countries include illiteracy, poverty, gender in-equality, culture, poor infrastructural development, political/ethnic conflicts, official corruption, and lack of political will by policy makers and failure of implementation of government policies regarding maternal health ^{3,5}.

Health facilities in most developing countries are inadequate, in-equitably distributed and poorly manned by well trained and motivated health workers⁵. Financing the health sector in some developing countries is far below the \$14 recommended by World Bank for Africa and \$34 per capital recommended by WHO macroeconomic commission for Health for low income countries⁶. In Nigeria a western African country, and the most populous in Africa, the annual budget to the health sector is \$5 per capital expenditure and yet full implementation for the benefit of the populace has never been achieved ^{3,6}. The overall performance of the Nigerian health system has been adjudged to be deplorable. The 2000 WHO Global rating of health system performance ranked Nigeria 187th out of 191 countries accessed³.

The hurdles experienced by women in accessing or utilizing orthodox health services has pushed several of them especially rural dwellers to seeking alternative means of health care. Thus, maternal health services including childbirth outside orthodox health facilities without the assistance of skilled birth attendants with consequent adverse maternal and fetal outcome is a common occurrence in many developing countries⁵.

Surprisingly, even women who attend antenatal clinics in hospital do prefer to deliver outside

the facility. A study in Northern Nigeria showed that utilization of antenatal care services does not necessarily equate to delivery at the orthodox health facility ⁷. Yet, planned place of childbirth has been shown to have a significant influence on mode of birth and rates of intrapartum intervention in childbirth ⁸. The present study was therefore designed to ascertain the preferred place of childbirth by pregnant women who were attending antenatal clinic in a rural secondary health facility in southern Nigeria.

METHODS Study Area

The study was done at the Holy Family Hospital, Ikom, Cross- River State, Nigeria. This 256 bedded health care facility that provide health care delivery services in the central district of the state as well as neighboring Cameroon's was built and in-augurated in 1956 by Bishop Thomas Megettrik. Although initially managed by the Irish reverend sisters, from 1985 to 2000 it became jointly managed with the State government. The catholic Diocese of Ogoja became the sole manager of the health facility in 2001 when government returned the health institutions in the state that were co-managed by her to their original owners. The hospital has the second comprehensive antiretroviral therapy (ART) care support in the state for HIV/AIDS intervention programs.

The maternity unit is a 40 bedded unit manned by medical officers, nurse/midwives, CHEWs, mission trained auxiliary staff and recently resident doctors and consultants in Obstetrics and Gynaecology from a University Teaching Hospital. The antenatal clinic which holds twice weekly attends to approximately 25 clients per booking visit. The hospital is equipped with an ultrasound machine, basic laboratory facilities and a surgical operating theatre. Approximately 700 deliveries are recorded annually. Patients are sometimes referred from the primary health care facilities, maternity homes and occasionally from the numerous private hospitals to the health facility for treatment.

Study Design

This was a cross sectional study using structured interviewer administered questionnaire to 178 pregnant women attending antenatal clinic at the hospital from August to October 2010.

Data analysis

Data collected include; initials, hospital numbers, age, occupation, parity, religion, educational status, tribe, place of delivery in last pregnancy, preferred place of delivery in index pregnancy, reasons for preference to deliver outside hospital. Data was analyzed using SPSS version 15 and presented as simple percentages in a tabular format. Chi-square was used as a test of statistics with p-value of 0.05 at 95% confidence interval considered statistically significant.

RESULTS

Out of the respondents, one third was aged 25-29 years. Most (36%) were para 1 to 2, traders (40%), and about half had at least secondary education (**Table I**). Among the 38 who had previous home delivery, 32(84.2%) preferred hospital delivery in index pregnancy. Overall, about 40% had hospital delivery in the last confinement, however, 93.8% preferred hospital delivery in the index pregnancy (p=0.0001) **Table II**. Cost 0.6%, distance 1.1%, Trust in God 2.2%, self confidence 1.7% and harshness of hospital staff 0.6% were reasons for preference to deliver outside the hospital.

Preference for hospital delivery was not associated with education (p=0.97) and parity (p=0.85).

TABLES

Table I: Socio	Demographic	Characteristics	0 f
Respondents.			

Characteristics	N(178)	100(%)
Age		
=19	11	6.2
20-24	42	23.6
25-29	63	35.4
30-34	44	24.7
=35	18	10.1
Education		
None	2	1.1
Primary	39	21.9
Secondary	93	52.2
Post-secondary	44	24.7
Occupation		
Civil servant	10	5.6
Teaching	10	5.6
Schooling	12	6.7
House wife	19	10.7
Farming	34	19.1
Trading	71	39.9
Others	22	12.4
Parity		
0	61	34.3
1-2	64	36.0
3-4	36	20.2
=5	17	9.6
Tribe		
Boki	10	5.6
Efutop	12	6.7
Etung	15	8.4
Ibo	19	10.7
Ekoi	62	34.8
Others	60	33.6

Figure 1: Distribution of place of delivery in last pregnancy.

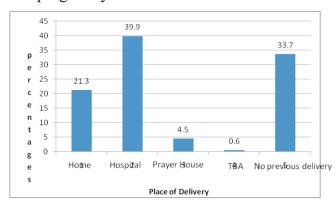


Table II: Relationship between Last child birth and preferred place of delivery in index pregnancy.

	Preferred	Of	index		
	place	delivery in	pregnancy		
Place of	Home	Hospital	Prayer House	TBA	Total
LCB					
Home	4(10.5%)	32(84.2%)	2(5.3%)	-	38(100%)
Hospital	1(1.4%)	70(98.6%)	-	-	71(100%)
No previous	1(1.7%)	57(95.0%)	2(3.3%)	-	60(100%)
delivery					
Prayer	-	8(100%)	-	-	8(100%)
House					
ТВА	-	-	-	1(100%)	1(100%)
Total	6(3.4%)	167(93.8%)	4(2.2%)	1(0.6%)	178(100%)

Key: LCB, Last Childbirth, **TBA**, Traditional Birth Attendant, **Statistics** $X^2 = 189.6$ P=0.0001

DISCUSSION

The study showed a significant majority of women opting for hospital delivery in the index pregnancy. Out of the 71 who had previous hospital delivery, only 1(1.4%) would deliver at home in the index pregnancy. All the women who had previously delivered in a prayer house, and with exception of three, all primigravid women preferred hospital delivery. Similarly, among the 38 women who delivered at home in the last confinement; 32 (84.2%) would prefer hospital delivery in the index pregnancy.

Unlike what use to happen in the past, studies

are beginning to show that more women in developing countries are delivering their babies in hospitals. This is said to account for 40% of deliveries in developing countries with 36% being in Africa⁹. In Latin America, institutional births are said to account for 70% of all deliveries⁹. The increasing preference for hospital delivery in developing nations could be due to increasing public awareness and enlightenment regarding the benefits of supervised institutional childbirth. Hospital delivery in well equipped centres manned by skilled birth attendants will help reduce maternal morbidity and mortality.

However, some women still prefer to deliver outside orthodox health facilities. Among the 38 women who had previous home delivery, 10.5% would want a repeat experience. In the developed countries, there is increasing evidence that clinical outcomes associated with a home birth for low risk women are at least as good, if not better than, the clinical outcomes associated with giving birth in hospital¹⁰. Studies have shown higher home birth rates compared with hospital deliveries in the Netherland, Belgium and Sweden^{11, 12}. Research showed that women who planned a home birth have less satisfaction if referred for hospital delivery^{11, 13, 14}.

Home birth is valued for its family setting ¹⁵. The associated privacy, companionship and the ability of the woman to make decisions about what happens during labour and delivery ¹⁰. The merit for and increasing rates of home delivery in developed countries not withstanding, our experience in developing countries is not the same. Home deliveries are most often unsupervised by skilled birth attendants and in unhygienic environments thereby contributing

to adverse maternal and neonatal outcome.

The only respondent in the study who had a previous delivery in a traditional birth attendant home would prefer to deliver in the same place. Good companionship in labour and affordability were the reasons for her preference. TBAs have become an integral part of the birthing process throughout the developing world ¹⁶. Studies had shown that the potentials of TBAs in reducing maternal and perinatal mortality is promising, but there is no enough evidence to support their continued relevance in Obstetric practice ¹⁶. Although, the World Health Organization (WHO) issued a statement to suggest that training of TBAs have failed to reduce maternal mortality, limited availability of skilled birth attendants in rural areas have strengthened the practice of the TBAs¹⁶.

However, Mbaruku G et al demonstrated in a study in rural Tanzania that, although many women delivered at home, most of them reported higher confidence in doctors and nurses than in TBAs. The researchers concluded that, policy makers and program managers should not assume that women prefer TBAs to trained professionals for delivery but should consider systems barriers to facility delivery in interventions aimed at reducing maternal mortality¹⁷.

Another place preferred by the women for delivery is in spiritual homes or prayer houses. Whether this is on the account of trust in divine intervention from anticipated labour complications or inability to afford the cost of health services from orthodox facility as shown by studies carried out in selected areas in Benue State, Nigeria; Prayer homes are ideally not meant for child births. It is heart warming to note that all the women studied that had previous deliveries in prayer homes preferred to deliver in the hospital in the index pregnancy.

Although, preference for hospital delivery was not significantly related to education and parity; it was a good thing to note that the non-educated, young and primigravide women that belong to the high risk group of Obstetric population preferred hospital delivery¹⁸. The study find that 6.2% of the women who did not prefer medical or institutional birth gave reasons of cost, distance, self confidence, trust in God for safety and the poor attitude of hospital staff. Some of these problems are not new but have continued to be hindrances to hospital delivery in developing countries. It is therefore an obvious fact that leaders of governments, communities, religious groups and non-governmental organizations need to do more in improving access and utilization of maternity services in developing countries.

Poverty reduction, education, economic empowerment and infrastructural development in the communities will certainly go a long way in improving the utilization of hospital facilities for delivery. The provision and equitable distribution of these facilities as well as their equipment with drugs and well trained birth attendants who are skillful in communicating with patients is recommended. Maternity services should also be made to be affordable if not free. Advocacy to traditional and religious leaders aimed at encouraging them to promote the utilization of these maternity services by their subjects should be given due attention by policy makers and programme planners seeking to reduce maternal mortality.

In conclusion, majority of the women prefer to deliver in the hospital. More efforts aimed at promoting hospital delivery should target

Trop J Obstet Gynaecol, 30 (2), August 2013

provision and equitable distribution of more well equipped health centers, reduction in cost 6. of health care services, infrastructural development, and training of birth attendants with communication skills among others.

Limitation of the study

Most women might have given the ideal answers to the questions asked rather than the actual thing they would like to do.

ACKNOWLEDGEMENT

We appreciate Miss Grace Mark (RN) for ⁸. assisting with data collection. Thanks to the hospital management for approving the study. Our subjects were understanding and cooperated well.

9.

7.

REFERENCES

- Oladapo OT, Dada OA. Strategic dialogue to reduce maternal and newborn deaths in Nigeria: Dialogue between policy makers and researchers-An overview.Trop J Obstet Gynaecol 2010; 27(1): 6-10.
- Onu A. The millennium Development Goals: Counting down 2015. Jos J Med 2007; 2(1):5.
- Adinma BJI, Adinma ED. A critic of maternal mortality reduction efforts in Nigeria. Trop J Obstet Gynaecol 2011; 28(1):5-13.
- Goswami A, Kasliwal MR, Lekharaj GH and Urala. Maternal Mortality in a Tertiary Care Centre in Nepal. Trop J Obstet Gynaecol 2004; 21(2): 168-171.
- Okonofua F. Reaching the Unreachable in Africa: The role of Professional Organizations in providing reproductive Health Services to poor and Rural Women.Trop J Obstet Gynaecol 2000;

17(1): 3-9.

- Sambo MN, Ejembi CL, Adamu YM and Aliyu AA. Out-of-pocket health expenditure for under-five illnesses in a semi-urban community in Northern Nigeria. J Community Health & Primary Health Care 2004; 16(1): 29-32.
- Ekele BA, Tunau KA. Place of delivery among women who had antenatal care in a teaching hospital. Acta Obstet Gynecol Scand 2007; 86 (5):627-30.
- Davis D, Baddock S, Pairman S, Hunter M,
 Benn C, Wilson D et al. Planned place of
 birth in New Zealand: does it affect mode of
 birth and intervention rates among low-risk
 women? Birth 2011; 38(2):111-119.
- . Maduma-butshe, Adele Dyall, Paul Gartner. Routine Episiotomy in developing countries, time to change a harmful practice.BMJ 1998; 316:1179.
- Longworth L, Ratcliffe J, Boulton M. Investigating women's preferences for intrapartum care: home versus hospital births. Health Soc Care Community 2001; 9(6):404-413.
- 11. Christiaens, W. Place of birth and satisfaction with childbirth in Belgium and the Netherlands. Midwifery 2009; 25(2):11-19.
- Hildingsson I, Waldenström U, Rådestad I. Swedish women's interest in home birth and in-hospital birth center care. Birth 2003; 30 (1):11-22.
- Wiegers TA. The quality of maternity care services as experienced by women in the Netherlands. BMC Pregnancy Childbirth 2009; 9:18.
- 14. Christiaens W, Gouwy A, Bracke P. Does a referral from home to hospital affect satisfaction with childbirth? A cross-national

comparison. BMC Health Serv Res 2007; 17. 12(7):109.

- Davies J, Hey E, Reid W, Young G. Prospective regional study of planned home births. Home Birth Study Steering Group. BMJ 1996; 313(7068):1302-1306.
- Fasubaa OB. The traditional birth attendant's debate and the challenges ahead. Trop J Obstet Gynaecol 2011; 28(1): 3-4.
- . Mbaruku G, Msambichaka B, Galea S, Rockers PC, Kruk ME. Dissatisfaction with traditional birth attendants in rural Tanzania. Int J Gynaecol Obstet 2009; 107(1):8-11.
- Iyaniwura CA and Yussuf Q. Utilization of Antenatal care and Delivery services in Sagamu, South Western Nigeria. Afr J Reprod Health 2009; 13(3):111-112.