## Causes of Prolonged Waiting Time in Public Health Facilities among Health Care Seekers in Calabar Municipal Council of Cross River State, Nigeria

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#### Abstract

The purpose of this study was to investigate the causes of prolonged waiting time in public health care facilities among health care seekers in Calabar Municipal Council of Cross River State, Nigeria. To carry out this investigation, two hypotheses were formulated to guide the study. Survey research design was adopted for this study. A sample of one hundred and eighteen (118) respondents was selected. The selection was done through cluster sampling technique. The questionnaire was the main instrument used for data collection. It was constructed by the researchers with assistance of some measurement experts that gave it face and content validity. The Chi-square ( $X^2$ ) inferential statistics set at 0.05 was used to test the hypothesis. The result shows that there is significant contribution of poor record keeping and inadequate health personnel to the prolonged waiting time in public health care facilities among health care seekers. Based on these findings, some recommendations and suggestions for further studies were made.

**Keywords:** Prolong waiting time; Public health facilities, Health care seekers. Poor record keeping; inadequate health personnel.

#### INTRODUCTION

Waiting times at different hospitals can vary widely, depending on the number of patients seen, emergency department efficiency, admission procedures or the availability of inpatients beds (Andy 2013). According to Kirsten (2011), timely access to health care is an enormous challenger for health care system. It is especially an issue after-hours, nights and weekends.

The issue of long waiting time in public health care facilities has become a major challenge to Nigerian citizens as well as medical personal as a whole. It therefore goes contrary to the health insurance laws of Nigeria. According to the NHIS (2005), the objectives of Nigeria health insurance scheme are to ensure that every Nigerian has access to good health care, protect Nigerians from financial burden of medical bills, limit the rise in the cost of health care services, ensure efficiency in health care service etc. The objectives and functions of the NHIS, according to this review had not attained any height as health care delivery continues to be limited, not equitable and does not meet the needs of Nigerians. In the same report, Nigerians spend more time waiting for service in public hospitals than in private ones. The question now is, why waiting for too long? A Canadian author, Brian (2002), stated that poorly organized service, shortage of health care workers, physicians not working in teams and inadequate health facilities can greatly cause or lead to long time waiting in public hospitals. Ironically, this has posed a doubt to the 1999 decree of the Nigerian Health insurance scheme of ensuring that every Nigerian has access to health care services.

Uneke (2008), stated that the Nigerian health system is in a poor state and this is traceable to several factors especially the gross under-funding of the health sector and shortage of skilled medical personal at the primary health care level. Nigeria is one of the African countries that has continued to export health care professionals to the developed world. The continuous drain of health workers from Nigeria, combined with decades of harsh economic policies has led to chronically under-funded health system.

The concern about prolonged waiting time in public health care facilities has become a major challenge to the consuming public, health care providers and policy makers alike. These waiting times vary from one health care centre to another depending on the number of patients, efficiency of emergency department, admission procedures or and the availability of in-patient beds (Andy 2013). The problem has sometimes resulted to collapse/death of health care seekers while waiting, loss of man-hour and loss of revenue to both seekers and care providers. More importantly, it has eroded confidence in public health institutions that are sometime poorly manned.

#### Literature review

#### Poor record keeping and prolonged waiting time in public health care facilities.

Today, the bulk of the health services delivery in hospitals falls squarely at the doorstep of the tertiary health institutions primarily established to carry out research as well as handle delicate referral cases that cannot be

handled at the primary and secondary levels, (Chioma 2013). Most of the time the health workers forget the paramount thing that determines whether or not their services as health personnel will be needed, which is recording and keeping of patients data.

It is noticeably discovered that a patient's first appearance at the hospital always take him/her a longer time than expected before seeing a doctor; reasons being that most public health facilities are known for having a long queue, as a result of poor record keeping. At the records units, it is expected that patients folder will accompany them to the consultant or consulting rooms hence it takes up to two to three hours looking for folders and other related items of the patient.

In a study carried out by Ogunfowokan and Mora (2012) at General Out-Patient Department (GOPD) of the National Hospital Abuja with 270 respondents, the median patient-clinic encounters was 2.7 hours, (range 0.2-7.2 hours). The long patient clinic encounter time was accounted for mainly by the waiting time to see a doctor, which was a median of 1 hour, (range 0-5-6 hours) and time spent at the medical records with median of 0.5 hours (range 0-5 hours).

Tertiary health institutions are challenged to provide accessible, ongoing, quality care while being sensitive to the special needs of their host community. They also maintain the goal to train new physicians in a fiscally viable manner. According to Curvas and Joseph (2011) nationally, residency teaching clinic have their inefficiency that causes long patient wait times". They asserted that patient wait-time for medical care has a direct impact on patient satisfaction, medical compliance, returns show rate and patients attitudes towards clinicians, staff and clinic in general.

Further studies by Ogunfowokan and Mora (2012), reveals disparity in waiting time between general out-patient clinics and specialized clinic such as, pediatrics, obstetrics and gynecology etc. The waiting time for the later was found to be shorter due mainly to the appointment method in practices in these clinics. The primary health and secondary institutions do not present different outcome from that of the tertiary level principally because of the prevalence of manual record keeping and low literacy level of many of the patients. The application of Electronic Health Record (HER), in our health institutions which serves as prompts and reminders to improve quality of patients care, remains a distant dream. Chioma (2013) went further to state that cases of patients slumping or even dying on the queue while waiting to see the doctor are common places. Granted, many government health institutions are overwhelmed and their facilities overstretched but the problems go deeper.

Ogunfowokan and Mora (2012), states that satisfaction during a health care encounter is related to the relationship between the patients expectation and experience at the hospital. When patient records are not found in the health facility, it is possible and most likely that his/her hopes of getting better from her present situation will drop due to anxiety and sometimes frustration. The inability of a health worker to satisfy a patient in terms of getting in touch with his/her folder or case notes gives a first impression that things are not well with the patients. "Patients satisfaction can be improved when health workers meet their expectations and decrease the total time spent in a clinic.

#### Inadequate personnel and prolonged waiting time in public health care facilities

The paramount thing outside equipment and facilities in any given health centre is the personnel, (Doctors, Nurses, Pharmacist, Laboratory technicians, Health assistants etc.). Without these set of people, the facilities and equipment in these hospitals, clinic or health care centers cannot be properly utilized, (Awofeso 2007). He stated that the Nigeria health care system is in a poor state and this is traceable to several factors especially the gross-under-funding of the health sector and shortage of skilled medical personnel at the primary health care level. According to him, Nigeria is one of the several major health staff-exporting countries in Africa. As a result of inadequate infrastructure and poor compensation, a sizeable number of physicians, nurses and other medical professionals are lured away to developed countries in search of fulfilling and lucrative positions. Doctors and nurses are reluctant to relocate to remote and forest locations that offer poor communications with the rest of the country and few amenities for health professionals and their families. Urban areas in Nigeria have been observed by Awofeso (2007), to be more attractive to health care professionals for their comparative social, cultural and professional advantages.

In the same context, Nnamuchi (2007), agreed that large metropolitan health centers in the country offer more opportunities for career and educational advancement, better employment prospects for health professionals and their families, easier access to private practices (an important factor in Nigeria because public salaries are relatively low) and lifestyle related services and amenities and better access to educational opportunities for their children. In addition, the low status often conferred to those working in rural and remote areas further contributes to health professional preference for settling in urban areas, where positions are perceived as more prestigious. Nnamuchi (2007), further attested that this has significant consequence on the health of inhabitants of rural areas as unavailability of physicians and nurses within close proximity often leads to delaying and postponing visits to health care facilities until the condition becomes unbearable.

According to the World Health Organization (WHO 2007) report, 432 nurses legally emigrated from

Nigeria to work in Britain between April 2001-March 2002, compared with 347 between April 2000 and March 2001. About 20,000 Health Professional are estimated to emigrate from Africa annually (BMJ 2002. 325: 65). Data on Nigerian doctors legally migrating overseas are scarce and unreliable. In a recent survey by WHO for example, only 41.9% of primary health care facilities provide antenatal and delivery service and 57.7% of such health facilities work without any midwife. Furthermore, 18.3% of such facilities operate without midwives or senior community health extension workers (SCHEWS).

The combined effects of inadequate personnel will definitely cause prolonged waiting time in public health institutions. This could result from fewer doctors consulting, fewer medical tests being carried out and fewer nurses being overworked. Awofeso (2007), also stated the main problems of prolong waiting time among health care seekers in public health care facilities to include among others poor human resources planning, lack of professional autonomy and poor supervision and support.

#### Methodology

**Design:** The study adopted a survey research design. This is because it allows the researcher to examine the phenomenon under study as it exists at the time of the study.

**Population:** The population of this study was eight hundred and six (806) comprising of men and women drawn from staff and health seekers (patients) of the General Out-Patient Departments (GOPDs) of University of Calabar Teaching Hospital and General Hospital both in Calabar Municipal Council of Cross River State.

**Sample:** A total number of one hundred and eighteen (118) respondents were selected. The cluster sampling technique was used in which the forty one (41) GOPD staff of both health institutions constituted a subset. The other cluster (765) representing patient was further sub-sampled by employing 10% to systematically draw 77 patents in three days to constitute a sample size. This is consistent with the prescription of Ogolo (1996) and will enable some generalization to be made.

**Instrumentation:** The major instrument used for data collection was the questionnaire. The questionnaire was designed and administered to the respondents to elicit their choice of alternatives that best suit them. The questionnaire contained two sections. Section 1 is focused on the demographic data of the respondents, while section 11 contained data on causes of prolonged waiting time in public health facilities among health care seekers.

**Validation of the instrument:** The instrument used for data collection was validated with the help of some measurement experts that gave it face and content validity. All the items in the questionnaire were formulated to relate to the topic under investigation.

**Reliability of the instrument:** The study employed the test- retest method to ensure reliability of the instrument. The researchers administered the designed questionnaire on a smaller sample size using Pearson Product Moment Correlation Coefficient (r) and the result yielded 0.70. This indicates a high level of reliability.

#### **Hypothesis One:**

The hypothesis stated that poor record keeping does not significantly contribute to the prolonged waiting time in public health care facilities. Independent variable: poor record keeping

Dependent variable: prolonged waiting time.

#### Table 1

# Chi-square analysis of observed and expected frequencies on the contribution of poor record keeping to prolonged waiting time (N = 105)

S/N	POOR KEEPING	RECORD	SA	Α	D	SD	TOTAL
1.	KEEPING		O=65 <sup>1</sup> E=55	28 <sup>2</sup> 33.8	$7^{3}$ 10.8	5 <sup>4</sup> 5.5	105
2.			O=42 <sup>5</sup>	47 <sup>6</sup>	87	8 <sup>8</sup>	105
3.			E=55 O=31 <sup>9</sup>	<sup>33.8</sup> 45 <sup>10</sup>	10.8 22 <sup>11</sup>	$\frac{5.5}{7^{12}}$	105
4.			E=55 O=82 <sup>13</sup>	33.8 15 <sup>14</sup>	10.8 6 <sup>15</sup>	$\frac{5.5}{2^{16}}$	105
	TOTAL		E=55 220	33.8 135	10.8 43	5.5 22	420

Critical value: At  $\alpha = 0.05$ ,  $X_{1-4}^2$ : (r-1)(c-1)

 $X^{2}0.95$  (4-1) (4-1),  $X^{2}0.95$ ; 9=16.92

Therefore,  $X^2$ cal = 68.58 and  $X^2$ crit = 16.92

The result of the statistical analysis as presented in Table 1, indicates that the calculated  $X^2$ -value of 68.58 is greater than the critical  $X^2$ -value of 16.92 at .05 level of significance with 9 degrees of freedom. The result is significant and the null hypothesis was rejected. This means that poor record keeping contributed significantly to the prolonged waiting time in public health care facilities among health care seekers.

#### **Hypothesis** Two

This hypothesis stated that inadequate health personnel do not significantly contribute to the prolonged waiting time.

Independent variable: inadequate health personnel

Dependent variable: prolonged waiting time

#### Table 2

Chi-square analysis of observed and expected frequencies on the contribution of inadequate health personnel to prolonged waiting time (N = 105) Table 2

S/N	INADEQUATE HEALTH PERSONNEL	SA	Α	D	SD	TOTAL
5.		O=29 <sup>1</sup> E=47.3	$55^2$ 36	$15^{3}$ 14.3	$6^4$ 7.3	105
6.		E=47.3 $O=65^5$	30 16 <sup>6</sup>	14.5 18 <sup>7</sup>	7.5 6 <sup>8</sup>	105
		E=47.3	36	14.3	7.3	
7.		$O=48^9$	37 <sup>10</sup>	10 <sup>11</sup>	$10^{12}$	105
		E=47.3	36	14.3	7.3	
	TOTAL	142	108	43	22	315

From the above data, we have:

O = obs	erved	$X^2 \operatorname{crit} = 12.59$
E = expected		$X^2$ cal = 38.62
Exp	=	column total X row total
•		grand total

The result of the analysis as presented in Table 2 indicates that the calculated  $X^2$ -value of 38.62 is greater than the critical  $X^2$ -value of 12.58 at .05 level of significant with 6 degrees of freedom. The result is significant and the null hypothesis is rejected. This means that inadequate health personnel contributed significantly to prolonged waiting time in public health care facilities among health care seekers.

#### **Discussion of findings**

This section is concerned with the discussion of findings of the hypotheses directing the study. 105 questionnaires were returned, showing a return rate of 88.98%. The finding of the first hypothesis reveals that poor record was a significant contributor to prolonged waiting time. The result of this hypothesis is in line with Ogunfowokan and Mora (2012), which stated in their findings at the General Out-Patient Department (GOPD) of

the National Hospital, Abuja that the medical records contributed the second highest waiting time of patients encounter period of 2.7 hours compared to 5.9 hours found in this study. The wide margin may be due to the acceptance of "referral" cases only in Abuja compared to Calabar that accepts both "referral" and "non-referral" cases. Nevertheless, Andy (2013) attested to this variability when he stated that waiting time at different hospitals can vary widely depending on the number of patients seen, emergency department efficiency, admission procedures or the availability of in-patient beds.

The result of the second hypothesis indicates that inadequate health personnel contributed significantly to prolonged waiting time. The result of this hypothesis is in line with previous finding of Awofeso (2007) who traced the poor state of Nigeria health sector to gross under-funding and shortage of skilled medical personnel. He stated that Nigeria is one of the several major health staff-expecting countries in Africa. He further identified factors such as poor compensation packages and search for fulfilling and lucrative position as compelling reasons for physicians, nurses and other medical professionals to seek greener pastures in Europe, Middle East and North America.

#### **Conclusions and recommendations**

This study assessed the causes of prolonged waiting time in public health care facilities among health care seekers in Calabar Municipal Council of Cross River State, Nigeria. Based on the findings, the following conclusions were made:

Poor record keeping contributed significantly to prolonged waiting time.

Inadequate health personnel contributed significantly to prolonged waiting time.

To address this problem and guide future policies, the following recommendations are made:

- 1. Federal and state governments should encourage the adoption of information technologies, including the use of electronic health records (EHR) which serves as prompt and reminders to eliminate most of the waiting time encountered at the records section and doctors consultation period.
- 2. Adoption of appointment system for repeat patients at the secondary and tertiary health sectors. These appointments should be culturally sensitive to prevent over-crowding and long waiting time in the general out-patients department.
- 3. Enactment of strategies by government to increase wages and benefits for direct care workers and development of a federal system for the dissemination and application of comparative effective research in dealing with issues such as the subject of this study.
- 4. Further research may be necessary to identify other possible causes of prolonged waiting time in public health care facilities in order to engender holistic policy interventions by relevant authorities.

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