

Comparative Analysis of Patient Satisfaction Levels in HIV/AIDS Care in Secondary and Tertiary Health Care Facilities in Nigeria

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ABSTRACT

Background: Continuous quality improvement is linked to the use of timely and useful feedback from clients in HIV care. HIV experts and care professionals agree that consumer involvement, such as patient satisfaction survey, is an essential part of HIV care and policy making today. The introduction of Antiretroviral Drugs (ARTs) services in Nigeria has significantly impacted positively on the overall well being of people living with HIV/AIDS (PLWHAs). However, there is little understanding of their satisfaction and perception of quality of care provided.

Objective: This study comparatively assessed patients' satisfaction with ambulatory HIV/AIDS care in secondary and tertiary health facilities in Anambra State.

Methods: This was a descriptive comparative cross-sectional study of 300 PLWHAs conducted at Nnamdi Azikiwe University Teaching Hospital (NAUTH), Nnewi (150) and at St. Charles Borromeo Catholic Hospital (SCBH), Onitsha (150). Sample selection was by systematic sampling technique whereby every 3rd patient registered to see the doctor each day was recruited. Data was collected using a structured interviewer-administered questionnaire and analyzed using SPSS version 13.

Results: Patients in Nnewi were more likely to spend more money on transport ($\chi^2 = 33.36, p = 0.0001$), while those in Onitsha were more likely to incur more expenses on non-HIV tests ($\chi^2 = 5.73, p = 0.017$). Patients visiting the tertiary health facility were significantly more satisfied with access to care than those visiting the secondary health care facility were, ($p < 0.021$). Delay was mentioned as what the patients from both centers like least.

Conclusion: This study showed high patients' satisfaction with their care and management. However, there is need for regular (6-monthly or annual) patient satisfaction surveys, by the programme managers to help in review of patients' care and the improvement of the services in the area of HIV/AIDS care in both institutions studied as well as other institutions offering the same services.

Key Words: comparative analysis, patient satisfaction, tertiary, secondary health facilities.

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INTRODUCTION

Nigeria is the most populous country in Africa and was ranked third worst affected by HIV/AIDS in the world in 2003¹. Consequently, Federal Government of Nigeria (FGN) started offering antiretroviral treatment to few PLWHAs same year through six federal teaching hospitals where patients pay up to ₦11,000 per month for both laboratory investigations and treatment with Highly Active Antiretroviral Treatment (HAART). This treatment led to dramatic improvement in the quality of life of eligible enrolled PLWHAs.

Programme service delivery will be improved with the inclusion of patients' views of the performance of the programmer's services. This will be achieved with the help of time-series facility based patient satisfaction surveys². Therefore, in the management of HIV/AIDS, quality of care and patient satisfaction levels have to be assessed for programme success to be achieved.

A look into the patient tracking books of HIV/AIDS clinics in NAUTH, Nnewi and SCBH, Onitsha has revealed that a good number of patients have dropped out of the treatment programme most often because they are dissatisfied with some aspects of service provision³. The implications of patient dropout include treatment failure and emergence of resistant strains of the HIV that could lead to rapid increase in HIV prevalence with grievous public health consequences. In addition, no studies have been done on patients' satisfaction with ambulatory HIV/AIDS care around this area. This study will therefore, provide information that can influence planning and improvement of service towards ensuring patients' satisfaction with ambulatory HIV/AIDS care in secondary and tertiary health care facilities in Anambra State and by extension, the rest of the country.

METHODS

Study area: Anambra State has a population of 4,182,032 and a population density of 869/km^{4,5}. NAUTH is a federal university teaching hospital located in Nnewi, a town well known for fabrication and sale of automobile spare parts.

Onitsha on the other hand is a densely populated town with a projected population of 534,997 from the 1991 National census report⁶. Apart from harbouring the largest market in West Africa, it is also blessed with numerous healthcare facilities including tertiary, secondary and primary health institutions each

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categorized into private, public and mission ownership. St. Charles Borromeo Hospital (SCBH), a secondary mission health facility, is located in Onitsha.

Study site: The NAUTH, Nnewi, is one of the two facilities in Anambra offering comprehensive HIV/AIDS services, is a multi-complex comprising other outreach centers. The staff strength is 1714, including 70 medical specialists (consultants) in diverse fields of medicine⁴. The total bed capacity is 391 presently.

SCBH, Onitsha that belongs to the Catholic Archdiocese of Onitsha, is located close to the meeting point of Onitsha-Enugu road and Onitsha-Asaba road on the right and left respectively. It offers a wide range of medical services by its work force of about 287.

Study population: Adult Nigerian males and females, who had accessed the services of the HIV-clinics in the health facilities on at least three occasions, were included in the study. This is to ensure that such patients had passed through all the services offered in the HIV/AIDS care programme and thus, be in a better position to assess the quality of care in the institution.⁷ Such patients had also received at least three courses of anti-retroviral drugs from the clinics.

The exclusion criteria: Pediatric patients and in-patients accessing care from the wards. Exclusion of in-patients was necessary to avoid measure bias through contamination of patients' responses by their in-patient experiences⁸. Other patients excluded include; very sick patients who needed admission because they may not have had the strength and interest to respond to the questionnaire, patients attending the clinic for the first time and had not gone through the full process of care and may not have benefited from the treatment as to form an opinion of the services.

Study design/sample selection: This was a descriptive comparative cross-sectional study of 300 PLWHAs conducted at NAUTH, Nnewi (150) and at SCBH, Onitsha (150) using structured, interviewer-administered, pre-tested questionnaire. Sample selection was by systematic sampling technique whereby every 3rd patient registered to see the doctor each day was recruited.

Sample size determination: The New York State Department of Health AIDS Institute (NYSDOH AI) in facility-based self assessment programmes for

determining the minimum sample size for patient satisfaction survey based on caseload per year was used for this study⁹. The method stipulates that the minimum sample size for HIV programme caseload of >1000 per year as obtains in each centre is 125. The minimum sample size was however increased by 20% in each centre to sharpen the precision of the study findings. Therefore, 150 PLWHAs were recruited for each of the study sites.

Data Collection: The questionnaire used is one already developed by the Clinical Quality Services Branch of the Bureau of Primary Health Care (BPHC),¹⁰ and it covers the standard domains adapted from surveys by Donabedian¹¹ and Ware et al¹². The questionnaire seeks to find out, among others, the direct and indirect costs of care which have been shown to be major barriers to health care service utilization, particularly in the South-East Nigeria¹³. Furthermore, the domains contain appropriate number of items each of which was scored using a five-point Likert Scale.

Pre-testing of the questionnaire was done at each study site to find out how the questionnaire would interact with the target population¹⁴. This helped to forestall psychometric problems that would have developed during the main survey.

Four research assistants, two for each centre, who were non-clinic staff and who worked for the purpose of administering the questionnaires, were recruited and trained. The use of non-clinic staff to collect data ensured data-collector-neutrality, which was very important to gathering accurate data¹⁵.

The questionnaires were administered to the subjects in a private area, out of earshot of clinic personnel as soon as they finished their consultation with the doctor (exit interview).

Qualitative data were also collected by way of KIIs and FGDs to complement data obtained by quantitative method^{16,17}.

Data analysis: The Statistical Package for the Social Sciences (SPSS) version 13 was used to analyse the data. Comparative statistics was calculated using the standard error of difference between percentages for calculation of Z-test. The level of statistical significance was set at $p \leq 0.05$.

Ethical issues: Approval of the project was sought from the NAU/NAUTH Institutional Research Ethics Review Committee and from SCBH Management while informed consent was obtained from the participants after explanations on the purpose and process of the study.

RESULT

Table I shows that the mean ages of the respondents were 38.3 ± 9.1 years and 36.5 ± 9.2 years for NAUTH, Nnewi and SCBH, Onitsha respectively. More widows accessed the secondary health facility, while more divorced/separated patronized the tertiary health facility ($\chi^2 = 0.170$, $p = 0.002$). The pattern of educational status among the respondents did not differ significantly in both hospitals.

The residents within the State were more likely to visit the secondary health care facility than the tertiary health care facility ($\chi^2 = 6.750$, $p = 0.009$).

Table III depicts that clients in Nnewi were more likely to spend more money on transport ($\chi^2 = 33.36$, $p = 0.0001$), while those in Onitsha were more likely to incur more expenses on non-HIV tests ($\chi^2 = 5.73$, $p = 0.017$).

Table IV indicates that the patients visiting the tertiary health facility were more satisfied with access to care than those visiting the secondary health facility were and the difference was statistically significant ($p < 0.021$). Tertiary health facility Patients also considered the services received from the doctors as the most satisfactory compared to other service points in the facility. On the other hand, their secondary health facility counterparts were most satisfied with the

adherence counselling, when compared to other service points. In addition, these SCBH patients were more impressed with the laboratory, pharmacy, adherence counselling and other staff than the patients in NAUTH. Furthermore, they felt that their confidentiality was better respected and time spent in accessing care shorter than obtains among their tertiary health facility counterparts. On their overall satisfaction, the Onitsha patients were more satisfied with the HIV services received than those received by the Nnewi patients ($t = 4.51$, $p = 0.001$).

Majority of the patients from both facilities mentioned good patient care as what they like most. Subsequently, patients from Nnewi mentioned free treatment 16 (10.7%), quality service 13 (8.7%), effective treatment 13 (8.7%), non-discriminatory, friendly and helpful staff 13 (8.7%) and good care by doctors 8 (5.3%). Their counterparts from Onitsha mentioned neatness of hospital 28 (18.7%), quality of service 19 (12.7%), effective treatments 7 (4.7%) and mission hospital 7 (4.7%) as other things they like most about the hospital. Comparing confidentiality with other measures of quality of care in both institutions, it was found that 4 (2.7%) patients in NAUTH liked the confidentiality they enjoyed compared to most of them from SCBH that placed more value on other measures.

Delay was mentioned as what the patients from both centers like least. In NAUTH, Nnewi, the patients also did not like inadequate toilet facility 12 (8.0%), bad behaviour of record staff 6 (4.0%), inattentive staff and favoritism 5 (3.3%). In SCBH Onitsha, the respondents' other complaints were as follows: high service charge 18 (12.0%), bad behaviour of record staff 14 (9.3%), bad behaviour of staff 8 (4.0%), bad behaviour of nurses and costly non-HIV drugs 5 (3.0%) each.

TABLES AND FIGURES**Table I: Socio-demographic characteristics of the respondents of the two hospitals**

Socio-demographic characteristics		NAUTH N=150 (%)	Borromeo N=150 (%)	statistics	p-value
Age (in years)	=24	4 (2.7)	11 (7.3)	t=1.73*	0.083
	25-29	21 (14.0)	22 (14.7)		
	30-34	29 (19.3)	34 (22.7)		
	35-39	34 (22.7)	34 (22.7)		
	40-44	32 (21.3)	21 (14.0)		
	45-49	15 (10.0)	13 (8.7)		
	50-54	7 (4.7)	10 (6.7)		
	=55	8 (5.3)	5 (3.3)		
Sex	Male	62 (41.3)	56 (37.3)	$\chi^2 = 0.555^{**}$	0.503
	Female	88 (58.7)	94 (62.7)		
Marital Status	Never Married	37 (24.7)	32 (21.3)	$\chi^2 = 0.170^{**}$	0.002***
	Married	76 (50.7)	79 (52.7)		
	Divorced/separated	14 (9.3)	4 (2.7)		
	Widowed	23 (15.3)	35 (23.3)		
Educational Status	Primary Uncompleted	13 (8.7)	17 (11.3)	$\chi^2 = 3.99^{**}$	0.677
	Primary Completed	42 (28.0)	46 (30.7)		
	Junior Secondary Uncompleted	9 (6.0)	9 (6.0)		
	Junior Secondary Completed	11 (7.3)	4 (2.7)		
	Senior Secondary Uncompleted	13 (8.7)	13 (8.7)		
	Senior Secondary Completed	38 (25.3)	37 (24.7)		
	Tertiary	24 (16.0)	24 (16.0)		
Occupation	Professional	9 (6.4)	5 (3.7)	$\chi^2 = 1.81$	0.612
	Skilled	25 (54.3)	21 (45.7)		
	Semi-skilled	112 (48.5)	119 (51.5)		
	Unskilled	4 (4.4)	5 (5.6)		

*t-test, ** chi square, *** statistically significant

Table II: Location of place of residence of the respondents

Location of place of residence	NAUTH N=150 (%)	Borromeo N=150 (%)	χ^2	p-value
Residing within Anambra State	111 (74.0)	129 (86.0)	6.750	0.009*
Residing outside Anambra State	39 (26.0)	21 (14.0)		

* Statistically significant

Table III: Travel time and user fees in accessing care in both hospitals per visit

	NAUTH N=150 (%)	Borrromeo N=150 (%)	X²	p-value
Time taken (in minutes)				
≤30	8 (5.3)	15 (10.0)	2.31	0.128
>30	142 (94.7)	135 (90.0)		
Cost of transport (in Naira)	N=150 (%)	N=150 (%)		
=240	52 (33.7)	102 (66.3)	33.36	0.0001*
>240	98 (67.1)	48 (32.9)		
Cost of non HIV test (in Naira)	N=29 (%)	N=92 (%)		
=750	9 (14.8)	52 (85.2)	5.73	0.017*
>750	20 (33.3)	40 (66.7)		
Cost of non ARV drugs (in Naira)	N=84 (%)	N=120 (%)		
=1200	42 (38.9)	66 (61.1)	0.50	0.421
>1200	42 (43.8)	54 (56.2)		

*Statistically significant

Table IV: Patients' perception of care in both hospitals

	NAUTH, Nnewi N=150	SCBH, Onitsha N=150	t-test	p-value
Access to care	2.66 ± 0.64	2.51 ± 0.52	2.32	0.021*
Waiting time	3.99 ± 0.57	4.33 ± 0.65	4.72	0.001*
Perception of doctor	4.67 ± 0.44	4.79 ± 0.50	3.18	0.030*
Perception of nurses	4.35 ± 0.74	4.32 ± 0.89	.352	0.725
Perception of Laboratory staff	4.09 ± 0.73	4.31 ± 0.92	2.29	0.023*
Perception of pharmacy staff	4.31 ± 0.48	4.82 ± 0.38	10.24	0.001*
Perception of Adherence Counsellor	4.34 ± 0.64	4.87 ± 0.53	7.71	0.001*
Perception of Records staff	4.14 ± 0.67	4.20 ± 0.87	0.641	0.520
Perception of Other staff	4.18 ± 0.71	4.55 ± 0.78	4.26	0.001*
Perception of Hospital	4.27 ± 0.48	4.41 ± 0.48	2.40	0.017*
Perception of Confidentiality	3.95 ± 1.05	4.83 ± 0.44	9.52	0.001*
Overall satisfaction	4.04 ± 0.33	4.25 ± 0.45	4.51	0.001*

* Statistically significant

Table V: What the patients like most/least about the hospitals

What the patients like most about this hospital	NAUTH N=150 (%)	Borromeo N=150 (%)
Good patient care	54 (36.0)	64 (42.7)
Quality service	13 (8.7)	19 (12.7)
Effective treatment	13 (8.7)	7 (4.7)
Neatness of hospital	3 (2.0)	28 (18.7)
Free treatment	16 (10.7)	0 (0.0)
Non discriminatory, friendly and helpful staff	13 (8.7)	0 (0.0)
Good care by doctors	8 (5.3)	6 (4.0)
Mission hospital	0 (0.0)	7 (4.7)
Attentive staff	1 (0.7)	6 (4.0)
Counselling service	5 (3.3)	1 (0.7)
Confidentiality	4 (2.7)	1 (0.7)
Others	20 (13.3)	10 (6.7)
What the patients like least about this hospital		
Nothing	58 (38.7)	58 (38.7)
Delay	45 (30.0)	28 (18.7)
Bad behaviour of records staff	6 (4.0)	14 (9.3)
High service charge	1 (0.7)	18 (12.0)
Inadequate toilet facility	12 (8.0)	3 (2.0)
Bad behaviour of staff	4 (2.7)	8 (4.0)
Bad behaviour of nurses	3 (2.0)	5 (3.3)
Inattentive staff	5 (3.3)	3 (2.0)
Costly non-HIV drugs	0 (0.0)	5 (3.0)
Favouritism	5 (3.3)	0 (0.0)
Others	11 (7.3)	16 (10.7)

DISCUSSION

This study focused on assessing patient satisfaction with HIV out-patients services in secondary and tertiary health facilities. Patients' perception is accepted as one of the fundamental outcomes that compares favourably with the more technical aspects because patient satisfaction is the overriding consideration of health service delivery¹⁸. This study which measured patients' perception of care no doubt provides a structured mechanism for patient feedback and communication and if done from time to time, will go a long way in improving the care provided to PLWHAs¹⁹.

The socio-demographic pattern of participants in this study was similar to that found in another study by Opara et al in Uyo, where majority of PLWHAs attending HIV clinic in University of Uyo Teaching Hospital, Uyo were aged 31-43 years (51.4%), mostly females and were married¹². The socio-demographic characteristics of patients in the secondary and tertiary facilities were similar except for the marital status where more divorced/separated patients attended the tertiary facility.

Patients' overall satisfaction in this study was quite high (mean=4.05) and (mean=4.25) for the tertiary and secondary facilities respectively. As is usual in most satisfaction studies, the scores obtained tended to be skewed towards the upper (satisfied) end of the scale. A similar study involving Malaysian public hospitals reported an overall satisfaction mean of 3.97 for outpatient services²⁰. Patient satisfaction has been shown to correlate positively with perceived service quality and it is indirectly related with health outcome and service utilization. In Ethiopia, Abdosh reported a mean score for overall satisfaction based on a five-point Likert scale to be 3.44 ± 0.84 ²¹.

Patients in both health facilities were least satisfied with access to care. The patients in Nnewi incurred more cost on transport compared to those visiting the secondary health facility. This may be because more people residing outside the State patronized the tertiary health facility. Those patronizing the secondary health facilities spent more on non-HIV test than their counterparts did in the tertiary health facility. HERFON in a national survey carried out in 2007 also reported that some patients had to travel very long distances to

access care primarily because of limited access to HIV care but also may be due to stigma and discrimination¹⁹. Similarly, some patients in this study came from outside of the state to access care in either of the facilities.

Patients were satisfied with clinic hours but requested that when necessary it should be extended in the event of increased patient load, which is usually the case after public holidays. It should be pointed out that there is inherent limitation in access to HIV services in developing countries because of weaknesses in the existing health systems. Presently, access to health services in the country is poor, more so for ART services because only few centers have the capacity to provide such services. Thus, the patients are faced with little or no choice and have to choose from the few facilities closest to them despite the odds.

The actual duration of time spent by each respondent at various service points was not measured. However, their perception of the waiting time at these points was assessed. Similar approach was adopted in a study in Uganda, because it is believed that subjective time assessment personalizes the interpretation of waiting and its consequences²². Patients were relatively satisfied with the time spent accessing care in both health facilities. However, the patients accessing the secondary health facility were more satisfied with their overall time spent accessing care. For the PLWHAs, the time spent with their doctors was satisfactory, which probably suggests that the number of doctors is adequate for the current patient load. However, provider-patient ratio with respect to other cadre of health workers is lower in the tertiary facility than the secondary facility.

The service points they were least satisfied with were the waiting rooms and records unit. This might be explained by the inadequate number of seats in the waiting rooms to accommodate growing number of PLWHAs accessing care in the state and the poor attitude of the records staff. Thus, it is expected that patients who do not have a convenient waiting room, as obtains in Nnewi, will feel uncomfortable while waiting to be attended to. In addition, the high patient load in the facilities means that patients will really have to wait for a long time to be seen. In Ethiopia, patients were least satisfied with the cleanliness of the facility, and then followed by waiting time between registration and being seen by the provider and providers' behaviour²¹.

Long waiting time discourages patients from going to the clinic. Consequently, among the things they wished could be improved upon is reducing delays in service

delivery. Other sub-Saharan countries have also reported long waiting among HIV patients accessing care^{23,12}. The importance of waiting time in patient satisfaction cannot be overemphasized because timeliness of care is the second most important driver of patient satisfaction, after service delivery¹⁸. A patient's experience of waiting can radically influence his/her perceptions of service quality. Excessive patient waiting time undermines the efficiency of health care services. Such delay leads to patient dissatisfaction and thus, may eventually result in loss of patronage in a competitive health care system. In this case, patients have limited choice as not many centers are providing HIV services. The threat of cheaper and more convenient unorthodox alternatives should be borne in mind. Health care providers in the HIV clinics can use the waiting period to deliver health education, in the form of health talks, to the patients. A study done in Ibadan, Nigeria had found that waiting time in the out-patient setting could be put to better use if the health personnel use the period to provide health education on specific diseases²⁴.

The satisfaction of the patients with the healthcare providers was quite high in both facilities. The patients based in Nnewi were most satisfied with their doctors while their counterparts in Onitsha were most satisfied with the adherence counsellor. In Malaysia, it was observed among patients utilizing the out-patients services that most of them were most satisfied with the service of the doctors (mean 4.22)²⁰.

The NAUTH clients were least satisfied with the laboratory. Some of them complained that the workers were unfriendly and even stigmatized them. Those utilizing the secondary health facility were least satisfied with the records section. They complained about the location and that it did not guarantee privacy as most times they were forced to mingle with non-HIV clients. They felt that if they were given the opportunity to decide on changes to be made in the hospital, they would relocate the records section. Though the patients did not want to be stigmatized, yet they considered actions that might encourage stigmatization such as providing separate records unit.

Creating a separate records section for the PLWHAs will mark them out and deepen stigmatization. It is a well known fact that there exist objective and subjective aspects of stigma. Objective aspect of stigma is with respect to other people's negative attitude towards the victim, while the subjective stigma is the individual's perception of his condition^{33 25}. Thus, it can be said that the reaction of the participants in SCBH Onitsha no doubt reinforced the subjective aspect of

stigmatization, a situation which if not properly addressed, may negatively affect HIV service utilization. Further education of the patients therefore should be a preferred approach for addressing this challenge than acceding to their demand as it may defeat the policy of integrating HIV services with other health services. Their perception of the hospitals with respect to cleanliness in NAUTH and SCBH was quite satisfactory, and is similar to findings in Malaysian public hospitals that reported mean = 4.38²⁰.

More patients in Onitsha than Nnewi complained about high cost of accessing services. SCBH, Onitsha offered more non-HIV tests and drugs to their patients. These obviously increased the cost of accessing care. Another source of increased cost of access in Onitsha is the consultation fee or service charge of ₦500, which the patients complained of, and which they wished could be removed. High user fees could be a barrier to utilization of HIV services¹² and the Onitsha focus group discussants and the key informant that the ₦500 service charge make some patients not want to see the doctors highlighted this issue. The implication is that some patients may not be able to go for their drug refill when they do not have the ₦500. However, the high user fees did not significantly influence the patients' satisfaction in Onitsha.

On interpersonal relationship, it was found that high number of patients complained of bad attitude of staff though this was more in Onitsha than Nnewi. A peculiar complaint of favouritism appeared in Nnewi where staff were alleged to facilitate access to some patients over others and it was even complained that the security personnel demand financial gratification before allowing some patients to go in and see the doctor. This is against the spirit of SERVICOM, which calls for equal access and treatment for all customers¹⁸. It is noteworthy, however, that no patient complained about the doctors in either facility. This finding agrees with that in another study by Ofovwe and Ofili in Benin City in which the doctors were rated higher than the nurses²⁶. More patients in Nnewi (n=92) than Onitsha (n=55) suggested employing more staff or retraining existing ones as a way of reducing delays but more especially to improve their attitude and ensure confidentiality.

Overall, it was found that patients' perception of the care by all cadres of staff was significantly higher in Onitsha than Nnewi. The rating of other patient satisfaction drivers like waiting time, confidentiality, hospital structure and environment were higher in SCBH, Onitsha than NAUTH, Nnewi. It was not surprising then that overall patient satisfaction with HIV/AIDS services was significantly rated higher in

SCBH, Onitsha than NAUTH, Nnewi even as more patients in Onitsha than Nnewi complained of higher user fees. This goes to support Beller's views that, "No matter how sophisticated and reputable a medical facility may be and no matter how brilliant and knowledgeable the physicians practicing there, patients will not perceive their care as being excellent unless they are satisfied with respect to many of the behaviours cited above and that result in high patient satisfaction is having physicians and other care givers who are truly concerned about their patients"²⁷. This is aptly demonstrated here where NAUTH, Nnewi, a federal government tertiary health institution with all her sophisticated equipment and array of specialists and reputed to be the best in comprehensive HIV/AIDS care in the south east Nigeria, is found trailing behind SCBH, Onitsha, a resource-constrained faith-based secondary health institution in almost all the measured domains of patient satisfaction.

In conclusion, this study has brought out the importance of regular (6-monthly or annual) patient satisfaction surveys, by the programme managers to help in review of patients' care and the improvement of the services in the area of HIV/AIDS care in both institutions studied as well as other institutions offering the same services. User fees for HIV related services should be discouraged to reduce the burden on the patients. This is especially so for the clients of SCBH, Onitsha where majority of them complained of high user fees. Also adequate amenities and space should be provided in the waiting area. Considering the time spent by the patients in the clinics, efforts should be made to provide them with relevant Information, Education and Counselling (IEC) materials including televisions and video machines that display information on HIV/AIDS care. Efforts should be made to further decentralize ART services to enhance access to PLWHAs to reduce patient load in both centers. NAUTH, Nnewi is already doing this by activating ART services in her satellite stations located in four different LGAs of Anambra State. The Anambra State Government should contribute to this drive by cooperating with Global HIV/AIDS Initiative in Nigeria (GHAIN) to open ART outlets in other Secondary health facilities in the State.

Finally, the Federal and State Governments should collaborate with the donor agencies to address the challenge of shortage of work force in HIV services. More staff should be recruited and trained while periodic retraining should be organized for staff already working in HIV/AIDS services provision. This would ensure sustained good provider-patient relationship and confidentiality, which are both known strong drivers of patient satisfaction.

REFERENCES

1. Federal Ministry of Health, National Agency for Control of AIDS and Sexually Transmitted Infections. National Health Sector Strategic Plan for HIV & AIDS, 2005: 6.
2. WHO. National AIDS Programmes: a guide to monitoring and evaluating HIV/AIDS care and support. Geneva 2004. 15-103.
3. Poole WK, Peritt R, Shah KB, Lou Y, Turner J, Kvale P, Hopewell PC, Glassroth J, Rosen M, Reichman L, Wallace J. A characterisation of patient drop-outs in a cohort of HIV positive homosexual/bisexual men and intravenous drug users. *J. Epidemiol. Community Health*, 2001; 55: 66-67.
4. Park K. Opportunistic Infections. In: Park's Textbook of Preventive and Social Medicine, 18th ed, M/S Banarsidas Bhanot Publishers, India, 2005: 87.
5. Idoko JA, Taiwo B, Murphy RL. Treatment and care of HIV disease. In: Adeyi O, Kanki PJ, Odunolu O, Idoko JA (eds). *AIDS in Nigeria: a nation on the threshold*. Harvard University Press, Cambridge, 2006: 285-428.
6. Popoola SO. Consumer health information needs and services in Nigeria. *Library Review* 2000; 49(3): 129-134.
7. Taylor D, Kennedy MP, Virtue E, McDonald G. A multifaceted intervention improves patient satisfaction and perception of emergency department care. *Int. Journal for Quality in Health Care*, 2006; 18(3): 238-45.
8. New York State Department of Health AIDS Institute. Create a sampling plan. In: *Patient satisfaction survey for HIV ambulatory care*, 2002, New York: 11-3.
9. Bureau of Primary Health Care. Patient Satisfaction. Available at. www.bphc.hrsa.gov/quality. Accessed 20/8/07.
10. Donabedian A. Evaluating the quality of medical care. *Milbank Mem. Fund Q*, 1966; 44(SUPPL): 166-206.
11. Ware JE Jr, Davies-Avery A, Stewart AL. The measurement and meaning of patient satisfaction. *Health Med Care Rev*, 1978; 1: 3-15.
12. Opara DC, Umoh BI, John M. Socio-demographic and anthropometric variables of persons living with HIV and AIDS in Uyo, South Eastern Nigeria. *Pakistan Journal of Nutrition*, 2007; 6(6): 547-557.
13. Stump T, Dexter P, Tierney W, Wolinsky F. Measuring patient satisfaction with physicians among older and diseased adults in a primary care municipal out-patient setting: an examination of three instruments. *Medical Care*, 1995; 33(9): 958-72.
14. Fitzpatrick R. Surveys of Patient Satisfaction: II - Designing a questionnaire and conducting a survey. *British Medical Journal*, 1991; 302: 1129-32.
15. National Planning Commission, Abuja, and UNICEF Nigeria. *Children's and Women's Rights in Nigeria: a wake-up call. Situation assessment and analysis*, 2001: 73-76.
16. Ajayi IO, Olumide EA, Oyediran O. Patient satisfaction with the services provided at a general out-patient clinic, Ibadan, Oyo State, Nigeria. *Afr J Med Sci* 2005; 34(2): 133-40.
17. WHO. National AIDS programmes: a Guide to monitoring and evaluating HIV/AIDS care and support, Geneva 2004: 15-103.
18. Federal Government of Nigeria. The SERVICOM Index. In: *The SERVICOM Book*. The SERVICOM Office, Abuja, 2006: 17-25.
19. Health Reform Foundation of Nigeria (HERFON). *Impact, challenges & long-term implications of antiretroviral therapy program in Nigeria*. 2007: 34-45.
20. Noor-Hazilah AM, Phang SN. Patient satisfaction as an indicator of service quality in Malaysian public hospitals. *QMOD Conference: our dreams of excellence*, 18-20 June 2007. Helsingborg, Sweden. Issue 26 Article 11.
21. Abdosh B. The quality of hospital services in eastern Ethiopia: patients' perspective. *Ethiop J Health Dev.*, 2006; 20(3): 199-200.
22. Lochoro P. Measuring patient satisfaction in Uganda Catholic Medical Bureau Health Institutions. *Health Policy and Development*, 2004; 2(3):243-248.
23. Hardon AP, Akurut D, Comoro C, Ekezie C, Irunde HF, Gerrits T. Hunger, waiting time and transport costs: time to confront challenges to ART adherence in Africa. *AIDS Care*, 2007; 19(5): 658-665.
24. Ajayi IO. Patients' waiting time at an out-patient clinic in Nigeria-can it be put to better use? *Patient Edu Couns* 2002; 47(2): 121-6.
25. Herek GM, Capitanio JP, Widaman KF. Stigma, social risk and health policy: public attitudes towards HIV surveillance policies and the social construction of illness. *Health Psychology*, 2003; 22(5): 533-540.
26. Ofovwue CE, Ofili AN. Indices of patient satisfaction in an African population. *Public Health*, July 2005; 119(7): 582-586.
27. Beller GA. President's page. Patient satisfaction: a personal perspective. *J. Am. Coll. Cardiol.*, 2001; 37: 687-688.