

VOLUNTARY HIV COUNSELLING AND TESTING (VCT): A SURVEY OF ADOLESCENTS IN A NIGERIAN HIGH SCHOOL

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ABSTRACT

Reduction in the rate of new HIV infection is a global priority that is particularly relevant to Africa, and to Nigeria in particular as the second leading country in HIV in the world. This quantitative descriptive study was conducted to describe the knowledge, attitudes and practices of adolescents on voluntary counselling and testing (VCT). The purpose was to identify and make recommendations concerning the role of high school teachers in promoting VCT. A total of 124 students were sampled. However, 24 learners withdrew from participating. A total of 100 senior secondary school participants participated in the final study. Data were collected by means of a structured questionnaire. The findings of the study revealed that 59% of the adolescents are aware of VCT services but fear of positive results is a barrier to utilising the service. A strong recommendation was that education sessions on



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the subject for HIV be included in the school curriculum and testing centres should be created in high schools. The study concluded that there is a need to enhance dissemination of VCT information among the youth and to create youth friendly VCT school health services.

Keywords: voluntary counselling and testing (VCT), adolescent, knowledge, attitudes, practices

INTRODUCTION

Education on sexuality is one of the most important external influences on adolescents' sexual risk behaviour in many parts of Africa, including Nigeria. Such education generally comes from formal education system and significant others in the adolescent's life and this may include parents. Counselling has been identified as one of the effective interventions for controlling the HIV epidemic among this age group. Although this is the case, evidence seems to indicate that the epidemic is still significantly high. Young people are becoming infected with HIV despite the enormous increase in preventive messages.

In Nigeria, available statistics showed that HIV prevalence among the youth only dropped from 4.3% in 2005 to 4.2% in 2008. Iliyasu (2010) reported a low utilisation of voluntary counselling and testing (VCT). A similar concern was observed in South Africa, which prompted the Deputy Minister of Further Education and Training Colleges to speak about the role of Higher Education and Training sector in promoting VCT in learning institutions (Department of Higher Education and Training, 2013).

Reduction in the incidence of HIV is a global priority that is relevant to Nigeria, a country where over 4.2% of people, aged 15–24 years, are estimated to be HIV positive (UNGASS, 2010). The fact that youths have a burden of this disease is worrisome as young people constitute the majority (over 58%) of the population (National Population Commission: NPC, 2006; United Nations Office on Drugs and Crime UNODC, 2007).

BACKGROUND TO THE STUDY

Nigeria is located in west Africa with an estimated population of about 140 million people (NPC, 2006). It is one of the sub-Saharan African countries plagued with the HIV/AIDS epidemic. Youths aged 15 to 24 years comprise about 67% of the national HIV prevalence of 3.6%, reported by the National HIV/AIDS and Reproductive Health Survey (NARHS) conducted in 2007 (UNGASS, 2010). According to the United Nations Children's Fund (UNICEF) (2009), the greatest burden of the disease occurs in the age group 15–24 years (with the revision of HIV prevalence in India to less than 3 million people, Nigeria is ranked the second in the world after South Africa, which is the only country that has over 5.5 million HIV infected people (UNICEF, 2009)).

VCT is important for adolescents as they are a risk group for HIV infection. In Nigeria, the NDoH (2010) guideline explained that this group is particularly at risk of HIV infection because they are prone to early sexual debut, unprotected sex, high risk of sexual coercion and abuse, peer pressure and the need to belong. Evidence from research indicated that the global coverage of VCT programmes remains low, especially in countries with the highest HIV/AIDS burden (WHO, 2010). Fewer than one in 10 people know their HIV status in most parts of Africa (Mbengo, Ndou & Mavundla, 2014). For instance, a cross-sectional study among secondary school students in Ethiopia revealed that 97% of the students have heard about VCT but less than one-fifth (18.5%) had used VCT service. The authors cited perceived susceptibility as a major barrier in Ethiopia (Abebe & Mitikie, 2009), which reflects the amount of information available to them about VCT. Another study in Zimbabwe revealed that utilisation of VCT is about 11% in a population-based cohort study (Sherr, Lopman, Kakowa, Dube, Chawira, Nyamukapa, Oberzaucher, Cremin & Gregson, 2007). In the United States of America, only 12.9% of all high school students had ever been tested for HIV (Centre of Disease Control, 2007).

PROBLEM STATEMENT

Nigeria, being one of the most populous countries in the world, makes HIV/AIDS prevalence a significant share of the global HIV/AIDS burden. A report by UNGASS (2010) revealed that Nigeria has the second highest number of people living with HIV in the world after South Africa. It is estimated that 2.9 million Nigerians (4.6%) are living with the virus, which means Nigeria contributes 9% to the global HIV burden. According to this report, youth is an important risk group in the HIV epidemic in Nigeria (UNGASS, 2010). The NARHS conducted in 2007 stressed the fact that youth aged 15–24 years had a prevalence of 2.4%, which was about 67% of the national HIV prevalence of 3.6% in the survey.

AIM OF THE STUDY

The aim was to describe the knowledge and attitudes of adolescents on voluntary counselling and testing

RESEARCH OBJECTIVES

- To describe the knowledge of adolescents in senior high school on VCT.
- To assess attitudes and practices of adolescents in senior high school on VCT.
- To identify factors that influence the students' willingness to utilise the VCT services.

METHODOLOGY

Research design

A quantitative approach using a non-experimental, descriptive, cross-sectional design was adopted to describe the knowledge, attitudes and practices of adolescents about VCT. To achieve the study objectives, a sample of 100 adolescents was obtained from the study population of a high school in Nigeria. The participants were adolescents between the ages of 14–18 years in a senior secondary school. Systematic random sampling was used for sample selection. A total sample of 498 learners who met the inclusion criteria in one secondary school enrolled during the year of data collection was obtained. Learners at every 5th interval on the list were selected to participate in the study until the sample size of 100 was reached. The sample size of ($n = 100$) was calculated from the study population of the students in the school register, which was 498. An estimated 20% sample was selected out of this population as follows:

$20/100$ multiply by 498 = 99.6 approximated to 100. A breakdown of the sample is analysed as follows:

Senior secondary: = 112 students: 22 students were selected

Senior secondary: = 260 students: 52 students selected

Senior secondary: = 126 students: 26 students selected

Instrument

A self-administered structured questionnaire was used to collect data. The self-administered questionnaire required respondents to answer a series of closed-ended questions. The method was chosen because the respondents are literate; they are able to read and respond in English. The questionnaire consisted of information related to biographical data, knowledge, attitudes and practices towards VCT. Considering that respondents were adolescents who might be sensitive in responding to issues around VCT face to face with the researcher, the closed-ended questions were considered appropriate (Babbie, 2008). A pilot study was conducted to pre-test the questionnaire. Twenty (20) adolescents in different high schools close to the researchers' office were involved in pilot testing the questionnaire.

Validity of the content of the questionnaire was examined in collaboration with one HIV/AIDS programme manager for the purpose of appropriateness and clarity.

The reliability: Pre-testing the questionnaire with 20 adolescents who were not part of the final study helped to make the necessary modification on the clarity of the questions.

Data collection process: The data collection was undertaken in November 2011 at the school during extra-curricular activities days as permitted by the Principal. Respondents were gathered in the school multipurpose hall with the help of the school counsellor. Before the commencement of data collection, participants were informed of the objectives and significance of the study in an interactive manner. Thereafter, the questionnaires were administered to the participating students on the same day by the researchers and one trained research assistant who had been acquainted with the contents of the questionnaire prior to the day of data collection. Completed questionnaires were collected by the researcher.

Ethical clearance was requested and granted by the University of South Africa Higher Degrees and Ethics Committee before the study commenced. Prior to this, the research proposal and data gathering instrument were submitted for approval. A copy of the approval was attached to the research proposal and a letter seeking permission to conduct the study at the school was sent to the school principal. The request was granted by the principal and the school counsellor was assigned to be the contact person for the study.

The participants in this study were adolescents. Therefore, parental consent was obtained from their parents or guardians. Those selected were given assent and consent forms for parental endorsement. Twenty-four learners did not return the signed letters and were not included in the study.

The researchers ensured strict anonymity and confidentiality. The names of the participants were not mentioned in the data collection instrument but numeric codes were used to identify the questionnaires. Teachers were not present during data collection. They only helped assemble the students in the hall and left thereafter.

DATA ANALYSIS

Data were analysed using a Microsoft Excel and EPIINFO Version 3.4.3. Summary statistics used for the responses to each question included frequencies and percentages.

RESULTS

Respondents' profile (n = 100)

Learners in this study were between the ages 12–18 years. Females made up 62% and more than half (52%) were in senior secondary. The senior secondary age group is usually between 14–18 years (Federal Republic of Nigeria 2009). The respondents were mostly Christians (59%), and belonged to the Yoruba language group (54%). This was not unexpected as the site where the study was conducted is located in the south-western part of Nigeria, a predominantly Christians region that comprises mainly the Yoruba-speaking people.

Respondents' knowledge of VCT

Understanding the respondents' knowledge about VCT was explored with questions asked about its awareness, what it entails and where it is offered. The students were allowed to give more than one answer in each case.

Awareness of VCT (n = 100)

Of the respondents, 41% (n=41) had never heard of VCT, but the remaining 59% (n=59) were aware of VCT services

Sources of VCT information (n = 59)

Of the total of 59% (n=59) who were aware of VCT, 52.5% (n=31) identified mass media as the main source of information. Those who learned about it from their friends constituted 22.0% (n = 13), 18.6 % (n = 11) heard from health workers, 3.4 % (n = 2) got information from the internet, and one (1) heard from the teacher.

Table 1: Respondents' sources of VCT information (n=59)

VCT information medium	Frequency=n	Percentage (%)
Mass media	31	52.5
Friends	13	22.0
Health worker	11	18.6
Church/mosque	1	1.7
Internet	2	3.4
Teacher	1	1.7
Total	59	100.0%

Knowledge of confidentiality of VCT (n = 100)

A total of 55% (n=55) of the respondents knew that VCT involves confidentiality in contrast to 45% (n=45) who were unaware.

Opinions about VCT utilisation services

The majority (84%, n=84) of respondents did not know where VCT services were offered, and only 16% (n=16) knew where the services were offered.

Motivating factors for VCT utilisation

About 13% respondents thought it was unnecessary to undergo VCT and gave various reasons that would motivate them to do so. This is shown in Table 2, and the reasons cited were to get job in future (n = 4), for marriage purposes (n = 4), if there is a cure for HIV (n = 4) and for an overseas opportunity (n = 1).

Table 2: Factors that would motivate learners to go for VCT (n = 13)

Motivation to undergo VCT	Frequency
To get a job in future	4
For marriage purposes	4
During pregnancy	4
If there is a cure for HIV	4
Overseas opportunity	1
Total	13

Preference of VCT information and uptake source

The issue around HIV testing is still a sensitive one as shown in the Table 3. Of the 59% (n = 59) respondents who preferred to seek information in hospitals and get tested there. Very few (2%, n = 2) preferred to get their information from family members. Less than 10% (n = 9%) preferred the youth club at school, some (18%, n = 18) indicated private clinics, only 1% (n = 1) indicated a drug store.

Table 3: Preferences of VCT information and uptake source (N = 100)

I will prefer to seek information about VCT and get tested for HIV via?	Frequency	Percentage
Hospital	59	59
Private clinic	18	18
Health teacher	10	10
Youth club at school	9	9.0
Family member	2	2.0
Drug store	1	1.0
others	1	1.0
Total	100	100%

Opinion on who should go for VCT

Respondents were asked who they thought should go for VCT. Table 4 shows the results. It appears that respondents were well informed about the need for people to have HIV tests as the majority (94%, n = 94) felt that everyone needs to undergo VCT, 3%(n = 3) indicated promiscuous people, 2% (n=2) felt it is for couples in marriage, and 1%(n = 1) cited that it is only for sick people.

Table 4: Opinions of respondents about who should go for VCT (N = 100)

Who should go for VCT	Frequency	Percentage (%)
Only sick people	1	1.0
Everybody	94	94.0
Promiscuous people	3	3.0
Couples in marriage	2	2.0
Total	100	100%

Perceived barriers to utilisation of VCT services

As shown in Table 4, those who had not been tested previously were asked the reasons that prevented them from doing so. As many as 45.4% (n = 39) felt that they were sure they did not have HIV, 25.5% (n = 22) indicated that they did not know where to test, some 11.6% (n = 10) feared positive results, 10.5% (n = 9) were afraid of stigmatisation. Confidentiality was not the main barrier to testing among these adolescents as only 1.2% (n = 1) feared others would know their HIV status.

Table 5: Why have you not tested for HIV? (n = 86)

Reasons for respondents decision not to test	Frequency	Percentage (%)
Scared of positive result	10	11.6
The test is expensive	5	5.8
Afraid of stigmatisation	9	10.5
I don't know where to test	22	25.5
Afraid other people will know	1	1.2
I am sure I don't have HIV	39	45.4
Total	86	100.0%

Utilisation of free VCT services

To know if respondents would be willing to utilise free VCT services, they were asked if they would go for HIV testing if it is free. A high percentage of the respondents (89%, $n = 89$) indicated that they would make use of VCT services, while some (11%, $n = 11$) would not do so.

DISCUSSION

The age of the study respondents ranged from 15–17. A total of 62%, that is more than half, were in their senior secondary. The respondents were mostly Christians 59% and 41% was from other religious beliefs. It was important for this study to know the location and religious background of the students as religion has been identified as one of the socialisation institutions for adolescents.

Respondents' knowledge towards VCT

The results showed that 59% of the students were familiar with VCT. This is similar to an earlier study done in Nigeria where more than 55.0% of respondents knew about VCT (Illiyasu et al., 2006), but much lower than 70.6% reported among youths in Nigeria in a more recent study (Joseph, 2010). A study conducted in Ethiopia already reported 96.7% VCT awareness among students (Abebe & Mitike, 2009). This is an indication that awareness about VCT is yet to reach the majority of adolescents in one school.

Mass media was identified as the major source of VCT information as the majority (52.5%) of the respondents in this study heard about VCT through mass media. This is almost similar to the 47% reported among students of a tertiary institution in Nigeria by Ikechebelu et al. (2006). Olugbenga et al. (2008) also found that electronic media played a major role as a source of information about VCT in Nigeria as 71.5% of their respondents were informed about VCT through electronic media. From the results of this study and the literature, it appears that electronic media in the Nigerian society is a good source of dissemination of information on health-related issues.

As many as (68%) of the respondents did not know the benefits of VCT as a preventative tool for HIV, half (50%) of them did not know that VCT is done voluntarily for willing individuals. Almost half (45%) of the respondents did not know about the confidentiality of VCT, and about 50% of the respondents knew that VCT involves pre-test counselling and post-test counselling. These findings appear to be better than an earlier study in Nigeria (Illiyasu, 2006) where none of the respondents knew the steps involved in undergoing VCT (pre-test counselling, testing and post-test counselling). There seems to have been an improvement in VCT knowledge among Nigerians as a recent study in Nigeria by Joseph (2010) reported that over 75% of the participants knew about VCT.

With regards to where to access VCT services, the results show that the majority (84%) of the respondents did not know where VCT services were offered; this is in sharp contrast to a Burkina Faso study where 73.7% of adolescents knew where to get HIV tests done (Guiella, 2007), and the findings from Joseph (2010) that reported that about 60% of his study's participants knew where to access VCT services. The respondents' ignorance of where to access VCT services is not surprising because most of the VCT centres in the area where the study was done are located in general hospitals and primary health care centres, and most of these health institutions cater for referred hospital patients (FHI, 2011). People who are not sick and who do not need to visit health institutions might not be aware of the VCT services at these centres.

Attitudes of the respondents towards VCT

Despite the fact that over 40% of the study participants claimed they had never heard of VCT, as many as (89%) of the respondents agreed they would recommend VCT to friends and relatives. As many as 87% of them thought that undergoing VCT was necessary and 94% said that everyone needed to undergo VCT. This proportion is higher than the 49.8% reported by Abebe and Mitike (2006) and 81.2% reported in the study by Joseph (2010). This is an indication that the students had good attitudes towards VCT by appreciating the need to know one's HIV status, although they demonstrated poor attitudes towards VCT in light of the motivating factors that would compel them to undergo VCT: employment purposes (30.8%), marriage purposes (30.8%), availability of cure for HIV (30.8%) and for an overseas opportunity (7.7%).

Fear of positive results has been reported as one of the barriers that prevents people from testing for HIV (Weiser et al., 2006; Iliyasu et al., 2006; UNAIDS, 2009:2–5). In this study, 11.6% of respondents feared positive results. This is much lower than 61.3% reported earlier in Nigeria (Joseph, 2010:308), 45.5% reported among adolescents in Ethiopia (Abebe & Mitike 2006) and in another study conducted in Malawi where the majority (88.9%) of young people cited fears of positive results as a barrier that prevented them from testing (Mphaya 2006). A large proportion (82%) reported that they would take an HIV-positive result in good faith, indicating their positive attitudes towards VCT. In this case 'good faith' has to do with the belief system of the participants to accept an occurrence as being inevitable. However, a small proportion (4%) said they would commit suicide if tested HIV positive, but none reported they would spread the virus to others. The 4% might account for adolescents who have suicidal tendencies when faced with difficult situations in life. In a focus group study that examined attitudes towards VCT among adolescents in South Africa, almost half the respondents who expressed fear of HIV-positive diagnoses said they would attempt suicide if they are HIV positive (MacPhail, Pettifor, Coates & Rees, 2008).

Practices of respondents towards VCT

With regards to the utilisation of HIV testing services, the finding in this study concurs with earlier studies (Iyaniwura & Oloyede, 2006; Joseph, 2010; Iliyasu et al., 2006) in Nigeria that reported low VCT uptakes as only 14% of the respondents had previously tested for HIV. Less than 2% of respondents in a study by Iliyasu et al. (2006:) had undergone VCT. Iyaniwura and Oloyede (2006) reported 11.5% utilisation among youth of a local population in Nigeria, and 33% VCT uptake was reported by Joseph (2010) among youth in another Nigerian study. The low VCT uptake appears not to be limited to Nigeria as a study in Ethiopia by Abebe and Mitike (2006:150) also revealed low (18.5%) uptake among adolescents, whereas a higher level (31.9%) of uptake was reported among adolescents in Tanzania (Assenga 2009).

Most (86%) of the respondents were willing to undergo VCT if the service is available in the school health club, which is a better acceptance proportion when compared with 35.1% of university students who preferred VCT to be given at youth clubs in Ethiopia (Alemayehu, 2010). Furthermore, a high percentage of the respondents (89%) indicated they would go for VCT if the services were free of charge; this is supported by findings of Abebe and Mitike (2006) in their study where most (84.3%) participants indicated that they would go for free HIV testing, also a similar percentage (80%) was reported by Iyaniwura and Oloyede (2006).

RECOMMENDATIONS

Based on the findings of this study, the following recommendations were made for educators to promote the utilisation of VCT services by the adolescents in schools.

- Schools and religious places should contribute largely to disseminating information encouraging HIV testing. More electronic mass media campaigns on the importance of VCT in the prevention of HIV and its process need to be put in place. The benefits of VCT as a means of behaviour modification, early treatment and care for HIV/AIDS need to be more emphasised. Increasing more public awareness, targeted particularly at adolescents and youth on about the available VCT centres emphasising personal susceptibility to HIV/AIDS.
- An appropriate model of VCT services that is accessible client-initiated and youth friendly needs to be implemented.
- VCT services should not be limited to health institutions, the establishment of HIV rapid testing centres should be introduced in high schools.
- Putting policy in place to provide free VCT for adolescents 12–19 years in government schools as part of a school health programme.

LIMITATIONS

The study was conducted only on a small size of the study population of one school registered for the academic session at the time of data gathering. The sample size used in this study was too small for the purpose of generalising the results to a larger population. In addition, due to the sensitive nature of the topic investigated, there might have been a certain degree of inaccurate responses provided the adolescents.

CONCLUSION

This article presented the knowledge attitudes and opinions of adolescents in a high school on VCT. Schools as social institutions have a responsibility to promote health practices. These were found to be lacking in learners on VCT. Recommendations were made for the implementation by educators for dissemination of information and promotion of VCT services in schools.

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