**RESEARCH ARTICLE** 

# KNOWLEDGE, ATTITUDE AND RISKY SEXUAL BEHAVIOUR ON HIV/AIDS AMONGST COMMERCIAL MOTORCYCLISTS IN OSOGBO, OSUN STATE, SOUTH WESTERN, NIGERIA

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#### **ABSTRACT**

Background: There has been global concern regarding HIV/AIDS epidemic particularly in developing countries. The magnitude of the epidemic result not only in the loss of human life but enormous financial burden to health care system and loss of productivity to the country. It has created unparalleled social and medical challenge.

Aims & Objective: This study assesses the knowledge, attitude and risky sexual practices on HIV/AIDS among commercial motorcyclist in Osogbo, Osun States.

Material and Methods: A cross- sectional survey of two local government areas in Osogbo town, Osun States, Nigeria was conducted in November, 2007. Study participants were selected using multi-stage sampling technique. A total of 298 participants were surveyed using a semi-structured, pre-tested interviewer administered questionnaire over a two weeks period. Data entry and analysis were carried out using SPSS version 11.

Results: Over 90% of the participants were aware of HIV/AIDS and a larger proportion (94%) believed in its existence, while comprehensive knowledge on its causative agent, mode of prevention and transmission are inadequate. Many of the respondents have poor attitudes towards people living with HIV/AIDS (61.7%). High-risk behaviours that can predispose to HIV/AIDS are still predominant as 52.5% takes alcohol, 18.0 % smokes and 55.0% indulge in extramarital affairs.

Conclusion: The findings in this study showed a high level of general awareness about the existence of HIV/AIDS but comprehensive knowledge remains low. Many of the respondents have poor attitudes towards People Living With Aids and also engage in high-risky behaviours that can predispose to HIV/AIDs. There is need for multi-pronged approach in the dissemination of information on the prevention and control of HIV/AIDs.

**KEY-WORDS:** HIV/AIDS; Awareness; People Living with HIV/AIDS; Prevention

# Introduction

There has been global concern regarding HIV/AIDS epidemic particularly in developing countries. According to Joint Nations programme on HIV/AIDS, estimated 33.4 million people living with HIV globally in 2008 and about 3.11 million people are estimated to be living with HIV in Nigeria by the end of 2010, thereby making about 9% of the global HIV burden.[1,2] The magnitude of the epidemic result not only in the loss of human life but enormous financial burden to health care system and loss of productivity to the country. It has created unparalleled social and medical challenge.

The prevalence is highest among productive young people between the ages of 20-29 years, with 60% of new cases occurring in the 15-25 years old age group.[3] In addition, prevalence among the most at risk populations sub-groups from 2007 integrated biological and behavioral surveillance survey (IBBSS) ranges from 37.4% among non-brothel based sex workers, 13.5% among men having sex with men, 5.6% among intravenous drug users, and 3.7% transport workers.[2]

Transport is a social vector in the transmission of the disease similarly to other high risk behaviours such as injecting drug use and commercial sex which fuel the epidemic. Transport sector workers

are twice as likely to acquire the HIV infection as workers in 'low-risk' occupations. They often serve as bridge populations linking with the general population.

HIV could be an occupational hazard among commercial drivers as several studies in Brazil, India, Mexico and other Sub - African continents have identified long distance tanker drivers, intra city and bus drivers among the high risk group in terms of HIV infection as a result of their lifestyle while on duty.[4-7] For instance, long distance drivers spend long periods away from home while on business, separated from spouses for a number of days every month and with comparatively higher levels of disposable income, have nonmarital sexual partners (including sex workers) mainly along their transport routes while experiences of sexually transmitted infections is common among intra city and bus drivers as result of high risk practices such as poor treatment of STIs, non-use of latex condoms during unsafe sexual intercourse, patronage of commercial sex worker. multiple relationships, alcohol and other substance abuse among others.[4-7]

Most of the studies done in Nigeria have linked commercial motorcyclists to increasing rate of road traffic accidents as a result of substance abuse and misuse affecting their mental faculty and behavior while their roles as potential carriers of HIV/STDs in the dynamics of HIV/AIDS infections have not been explored.[8]

However, in Osogbo, Osun State, Nigeria just like other urban areas, commercial motorcyclists (popularly called okada) manned by youths are ubiquitous over the past two decades as a result of the decay in infrastructure, scarcity of taxis, buses to appreciable degree and failure of rail transport. The relatively low costs of purchase and operation/maintenance of commercial motorcycles keep attracting numerous job seekers, thus helping to reduce unemployment, particularly among school and college graduates.[9] Riding this two wheel machine with youthful exuberance exposes them on daily basis to interact closely with different segments of the population with their divergent views on HIV/AIDS infection which can expose them to multiplicity of sexual partners. This study addressed the level of awareness assessing HIVrelated knowledge, attitude and sexual behavior, particularly condom use, among commercial motorcyclists (otherwise known as okada riders) in Osogbo, Osun State, South-western Nigeria with a view of finding an effective way to curb this rapid spreading menace from our society.

# **Materials and Methods**

#### Study Design

The study which was cross-sectional and descriptive in design was under taken over a two weeks period in November, 2007 on HIV-related attitude and sexual behavior, knowledge, particularly condom use, among commercial motorcyclists. Research assistants were recruited and trained for the administration of the questionnaire. The questionnaire was pre-tested in a town outside Osogbo. This is to ensure validity and reliability of the instrument, following which necessary modifications were effected.

### Study Area

The study was conducted in Osogbo, a city of ancient historical importance in South Western, Nigeria. Majority of those living in the urban areas are civil servants while those living in the rural areas and peri-urban areas are mainly farmers, artisans and petty traders. The main modes of transportation are by privately owned vehicles, taxis, commercial mini buses and motorcycles.

#### Sampling Method

A multistage sampling technique was used in the selection of respondents of commercial motorcyclists registered with the central union after consent was obtained.

At the time of the study, there were 2,100 commercial motorcyclists distributed among fifteen terminals across two LGAs i.e. Olorunda and Osogbo Local Government Area (LGA) within Osogbo town.

The list of the terminals formed the primary sampling unit, while the registered motorcyclists formed secondary sampling unit.

Based on this, five terminals were chosen at random comprising 3 in Olorunda LGA and 2 in Osogbo LGA for the study while the list of registered motorcyclists was used to select the sample size.

Probability Proportional to Size (PPS) method was used to select the total number of motorcycle riders based on the population in selected park.

The register of the association in respective selected parks was used as a sampling frame. Simple random sampling technique was then applied to select respondents from the sampling frame in selecting a total of 298 respondents.

## Survey Instrument

Semi- structured closed ended and interviewer administered questionnaires were used to collect information on socio-demographic characteristics, of awareness assessing **HIV-related** knowledge, attitude and risky behavior.

#### Data Management

Questionnaires were checked and sorted out manually and the data were analyzed using SPSS version 11 software package. Frequency distribution table were generated while cross tabulation and chi-square was applied appropriately.

#### **Ethical Considerations**

Permission to conduct the study was sought from the chairman of commercial motorcyclist in both Local Government Areas as well as the ethical committee, Ladoke Akintola University Teaching Hospital, Osogbo. A letter of introduction was issued by Community Medicine Department to introduce the researcher to various terminals to allow Commercial Motorcyclists to participate in the study. The purpose of the study was explained to the participants collectively and individually. Individual consent was obtained before commencing the interview

#### **Results**

Majority of the respondents were of the age range 25-34 years with a mean age of  $33.1 \pm 9.6$  years. As expected, virtually all the respondents are Male (100%), Yoruba (96.3%) and majority were Moslems (74.8%). Nearly half of them had secondary education 181 (60.1%) and 22 (7.4%) had post-secondary education. Most of the respondents 220 (73.8%) were married. (Table 1) Almost all the respondents (97.0%) were aware of HIV/AIDS. Sources of contact of HIV/AIDS identified mostly by the respondents included the following: "penetrative sex (89.3%)", "Sharing shaver blade (60.1%)" blood transfusion (11.1%), other misconceptions of minor percentages include insect bite (10.7%)", kissing (2.1%) and sharing the same bed (2.7%). Majority of the respondents (85.5%) identified weight loss as a major symptom of HIV/AIDs and diarrhea (30.1%). Ways of preventing HIV/AIDS identified by respondents include being faithful to one partner 128 (42.9 %) use of condom 143 (49.4 %) and mother to child transmission 43 (14.4%). (Table 2)

Table-1: Socio-Demographic Characteristics

Characteristics		Frequency (n=298) N (%)
Age group (years)	15 – 24	48 (16.1)
	25 – 34	138 (46.3)
	35 – 44	72 (24.6)
	45 – 54	33 (11.1)
	≥ 55	7 (2.3)
Ethnicity	Yoruba	287 (96.3)
	Others (Hausa, Ibo)	11 (3.7)
Religion	Islam	223 (74.8)
	Christianity	75 (25.2)
	No education	11 (3.7)
Educational Status	Primary education	84 (28.2)
	Secondary education	181 (60.7)
	Post-Secondary education	22 (7.4)
Marital	Single	78 (26.2)
Status	Married	220 (73.8)

Of the two hundred and eighty that believed in its existence in Nigeria (94%), 74 (24.8%) thought of germ as a cause while the remaining 224 (75.2%) believed in non-viral causes. (Table 3)

In terms of attitude towards individual living with HIV/AIDS, majority i.e. 67.4% of the respondents could not eat, 61.7% could not transport infected individuals while 55.0% could not sleep in the same room with infected individuals out of fear of contacting the virus. (Table 4)

Table-2: Respondents Knowledge on HIV/AIDS

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Charact	Frequency (n=298) N (%)			
Awareness of	Yes	289 (97.0)		
HIV/AIDS	No	9 (3.0)		
	Blood transfusion	33 (11.1)		
M 1 Cm · ·	Sexual intercourse	266 (89.3)		
Mode of Transmission	Barbing/Clipper	179 (60.1)		
of HIV/AIDS (Multiple Responses)	Insect bite	32 (10.7)		
(Multiple Responses)	Kissing	6 (2.1)		
	Sharing toilets	8 (2.7)		
Symptoms & Signs	Weight loss	242 (85.5)		
(Multiple Responses)	Diarrhoea	30 (10.1)		
HIV/AIDs Infected Still	Yes	156 (52.3)		
Looking Healthy	No	142 (47.7)		
Mode of Prevention of	Faithfulness	128 (42.9)		
HIV/AIDS	Condom use	143 (49.4)		
(Multiple Responses)	Mother to child	43 (14.4)		

Table-3: Belief in Existence of HIV/AIDS

Charac	Frequency (n=298) N (%)	
Belief HIV/AIDS	Yes	280 (94.0)
Exists	No	18 (6.0)
Cause of HIV/AIDS	Viral	74 (26.4)
	Non-Viral	206 (73.6)

Table-4: Attitude towards PLWHA

Characteristic	Frequency (n=298) N (%)	
Eating with HIV/AIDS	Yes	97 (32.6)
infected individual	No	201 (67.4)
Transporting an infected	Yes	184 (61.7)
individual	No	114 (38.3)
Sleeping in the same room	Yes	134 (45.0)
with infected individual	No	164 (55.0)

Table-5: Risky Sexual Behavior

Characteristi	Frequency (n=298) N (%)	
Alcohol intake	Yes	165 (55.4)
Alcohol ilitake	No	133 (44.6)
Cooraloina	Yes	64 (21.5)
Smoking	No	234 (78.5)
History of extramarital	Yes	164 (55.0)
affairs	No	134 (45.0)
Use of condom with sexual	Sometimes	57 (42.5)
	Always	30 (22.4)
partners	Never	47 (35.1)
Casual sex with commercial	Yes	23 (7.7)
partner last 12 months	No	275 (92.3)

More than half (55.4%) were engaged in alcohol intake while one quarter (21.4%) smokes cigarette. One hundred and sixty four (55.0%) were involved in extramarital affairs, 35.1% of which never use condom before, 22.4% used condom always while 42.5% used condom sometimes. Also, 23 (7.7%) had sex with commercial sex partner in the last 12 months before the onset of the study. (Table 5)

## **Discussion**

All the respondents according to the study were males within the age group 25 – 34 years which is the most economically productive segment of Nigerian society and also the group with the greatest risk of HIV/AIDS infection. A similar age bracket was observed among motorcycle riders in Lagos and Benin Cities, Southern, Nigeria and Thailand.[11-13] Knowledge are the first stage in the behaviour change continuum. In the case of HIV, it is almost certain that knowledge about a disease can lead individual adopting required behaviour, to protect against being infected, agreeing to being tested and consequently lead to a significant reduction in stigma and discrimination against those infected with HIV. This study revealed that majority of commercial motorcyclists were aware and believed in the existence of HIV/ADS, similar to that observed in Benin and Lagos cities in Nigeria where over 95% of the respondents had heard about the disease called AIDS.[12,13] The general high levels of HIV/AIDS awareness in Nigeria might be due to increased mass media campaigns going on globally and within the country on the infection.

However in this study, the levels of knowledge of the other routes of transmission are quite low when compared to findings from Thailand, where more than 90% of respondents provided correct answer about risk in getting HIV from needle sharing practice and from infected mother to their new born.[11] This is not surprising because most of the programmes on the electronic media which is the major source of information about HIV/AIDS among transport workers in Nigeria talk about unsafe hetero-sexual practices as the main mode of transmission in Africa.

It was observed that some respondents had several misconceptions, though minimal, about means of transmission of the virus. There was incorrect knowledge that HIV could transmitted through insect bites (10.1%), kissing

(2.1%) and sharing toilets (2.67%). Similar misconceptions were also documented among commercial motorcyclists in Benin and Lagos cities of Nigeria where 1% of the respondents mentioned use of the same towels and food utensils.[12-13] This knowledge gaps needs to be bridged, as this will have an effect on the respondents' attitude to people living with HIV/AIDS, their acceptance of these groups of people as well as their care for them. In addition, more than one quarter of the respondents (44.7%) had an incorrect perception that an infected person will not look healthy. This type of knowledge could give a sense of false security to the respondents as healthy looking partners might actually be harbouring the virus. Regarding prevention of HIV/AIDS, the most common form of prevention mentioned by the respondents was usage of condom (49.4%) followed by faithfulness (42.9%). This is lower than the figure (58% condom use) reported from Kenya, 60% condom use and 37% abstinence in Nigeria.[12,14]

It is alarming that some respondents (6%) were doubtful of the actual existence of the disease. This figure was lower than the findings at Benin, Nigeria and Thailand where 14% and 26% doubted the existence of the disease respectively. [11,12] This group of respondents was therefore less likely to modify their sexual behavior.

However, one quarter of those that believed in the existence of HIV/AIDS (26.4%) mentioned germ as the major cause of the disease while more than three quarter (73.6%) in both groups ascribed the disease to unseen evil forces, sex with dogs etc. This contradicts findings in a study in Benin, Nigeria where 81% thought the disease was caused by microbes, 12% by poisoning and 7% ascribed it to unseen forces.<sup>[12]</sup> This may probably explain why many of the infected AIDS patients in the country present quite late for medical attention as all types of unorthodox therapies would have first been sought.

The attitude of respondents toward People living with HIV/AIDS was not encouraging as more than half (61.7%) could not convey an infected individual and more than one quarter of the respondents could neither eat (32.6%) nor sleep

(45.0%) in the same room with PLWA. This is consistent with a report of the Behavioral surveillance survey in Nigeria, 2005 where only about 33% were not willing to share meal with HIV infected persons and 23% would not buy food from an infected shop keeper.[15] The findings revealed the problem of stigmatization and discrimination of HIV/AIDS in the general populace and even among commercial motorcyclist as most of them when asked further exhibited the fear of contacting the infection through sweat, breath and saliva of infected individual as a major reason for discrimination among those people living with the infection.

High risky sexual behaviour was recorded in this study. Half of the respondents had taken alcohol (55.4%) and more than one quarter (21.5%) had smoked cigarette. In addition, many of the respondents had extra marital affairs (55.0%) in the last 12 months before the onset of the study. Similar findings was reported in Thailand where six out of ten admit of having sexual partner other than their regular spouse during their life time period and one out of five (22.7%) had this practice during the last 6 months and Nigeria.[11] Higher percentage was observed in a study in Benin, Nigeria where 66% of commercial motorcyclist studied had multiple partners.[12] and another study done in North West, Nigeria where 31% of commercial motorcyclist interviewed had girlfriends.[16]

### **Conclusion**

The findings in this study showed a high level of general awareness about the existence of HIV/AIDS but comprehensive knowledge of HIV/AIDS remains low. Many of the respondents have poor attitudes towards people living with behaviours that HIV/AIDS. High-risk predispose to HIV/AIDS are still predominant among respondents. However, appropriate health education will be effective in improving HIV/AIDS knowledge as well as shaping the attitude and high risk behaviours among commercial motorcyclists. Osun State Government through National HIV/AIDS control agencies should collaborate with various commercial motorcyclists association in organising workshops/outreach exercises at various

motorcycle parks on regular basis geared towards creating awareness as well as ensuring clients are tested for HIV/AIDS.

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