Full Length Research Paper

Knowledge of sexually transmitted Infections among patients attending outpatient clinics at University Teaching Hospital, Ado-Ekiti, Nigeria

Adegun, P. T.¹*, Solomon, O. A.², Adegoke, S. A.³, Ade-Ojo, I. P.⁴ and Fape M. O.⁵

¹Department of Surgery, University Teaching Hospital, Ado-Ekiti, Ekiti State, Nigeria.
²Department of Family Medicine, University Teaching Hospital, Ado-Ekiti, Ekiti State, Nigeria.
³Department of Paediatrics, University Teaching Hospital, Ado-Ekiti, Ekiti State, Nigeria.
⁴Department of Obstetrics and Gynaecology, University Teaching Hospital, Ado-Ekiti, Ekiti State, Nigeria.
⁵Department of Microbiology, University Teaching Hospital, Ado-Ekiti, Ekiti State, Nigeria.

Accepted 19 November, 2012

The study was designed to assess the level of knowledge of sexually transmitted infections and possible factors associated with knowledge of patients attending outpatient clinic in University Teaching Hospital, Ado-Ekiti, Nigeria. This is to enable appropriate advocacy targeted on at risk population so as to control sexually transmitted infections and prevent its complications in this environment. A cross sectional descriptive study was carried out on patients attending outpatient clinics of the hospital from February to July, 2010. All volunteered participants were given a self-administered structured questionnaire. Out of the 592 interviewed, 242 (40.9%) were males and 350 (59.1%) were females. Although knowledge of sexually transmitted infections was high in the general population, especially among those with postsecondary school education (85.4%) and the drivers (90.9%), it was relatively low among the adolescents and the youths who are the most vulnerable in this environment ($\chi^2 = 14.343; p < 0.05$). News media was the highest source of information about Sexually Transmitted Infections. Age, educational level and the type of occupation appear to be important factors affecting knowledge. Therefore, health education about Sexually transmitted infections targeted at this risk group may yield positive result.

Keywords: Sexually transmitted infections (STI), knowledge, Ekiti, Nigeria, youths and adolescents.

INTRODUCTION

Sexually transmitted infections (STI) are spread primarily through person-to-person contact, although some of the pathogens that cause it, especially Human immunodeficiency virus (HIV) and syphilis, can be transmitted from mother to child during pregnancy and childbirth, and through blood products and tissue transfer (World Health Organization (WHO) Media centre, 2011; Nsuami et al., 2010). Sexually transmitted can be divided into those caused by bacteria, viruses and parasites (WHO media centre, 2011). STI are most common in young sexually active people. It has been reported that the incidence declines with age and that adolescents and young adults experience the highest risk of exposure to STI (Richard and Jay; 2002; Mudassir et al., 2010).

According to 1999 WHO estimates, 340 million new cases of curable STIs (Syphilis, Gonorrhoea, Chlamydia and Trichomoniasis) occur annually throughout the world in adults aged 15 to 49 years. In the developing countries, STI and their complications rank in the top five disease categories for which adult seek health care (WHO...
Some of these STI when not controlled can lead to severe complications. In men, gonorrhoea and *Chlamydia trachomatis* can lead to epididymitis. Inflammatory urethral stricture may arise later from poorly treated gonococcal urethritis, which in turn may lead to urinary retention and possibly chronic renal failure if not properly managed. Some of the diseases may result to genital ulcers, with few cases developing severe sacral dysfunction resulting in urinary retention (Richard and Jay, 2002; Gerald and Steven, 2002). Consequences of these STI include AIDS, spontaneous abortions, stillbirths, perinatal and neonatal morbidities, chronic pelvic pains, dyspareunia, infertility, increased risk of ectopic pregnancy and even death (Whitfield, 1986; De Schryver and Meheus, 1990; Chamberlain, 1995; Westrom and Mardh, 1990; Rice, 1991; Robinson and Ridgeway, 1996; Otolorin, 1999).

Interestingly, STI are preventable diseases and their prevention is even a priority for World Health Organisation (WHO) (WHO media centre, 2011). For adequate prevention, sound knowledge of the disease is very crucial. Knowledge of STI complication may play an important role in encouraging safer sexual behaviours (Mmbaga et al., 2007). Historically, knowledge about STI had been very low in communities where there is high prevalence of STI. Some communities viewed STI as unavoidable or as an "initiation into adulthood". In Tanzania, the prevalence of STI knowledge is very low (22.0%) (Mudassir et al., 2010; Mmbaga et al., 2007). Also in Nepal, the knowledge about STI is low (about 40%) (Jaiswal et al., 2005).

In Nigeria, 62% of young women and 40% of young men lack knowledge of STIs (National Population Commission, 2004). More importantly, report on STIs knowledge in southwest Nigeria is scantly and that of Ekiti land is not available. The purpose of this study was to assess the level of knowledge of STIs and possible factors associated with the knowledge of patients attending outpatient clinics in the University Teaching Hospital, Ado-Ekiti, Nigeria. This will enable advocacy to be targeted on at risk population, in order to control STIs and prevent its possible sequelae.

**RESULTS**

Out of the 592 interviewed, 242 (40%) were males while 350 (59.1%) were females. The total number of respondents with knowledge of STIs was 481 (81.2%) while 111 (18.8%) had no knowledge of STI. Figure 1 shows the age-specific prevalence of knowledge of STIs. The highest prevalence was in the age range 25 to 54 years while the lowest was noted in the adolescents and youths (age group 10 to 24 years). \( \chi^2 = 14.343; \ P < 0.05 \). Figure 2 is a chart showing the knowledge of STIs according to educational level. Respondents in post-secondary level have the highest knowledge of STIs with a prevalence of 85.4%, while the lowest was with respondents with no education with prevalence of 72.7%; \( \chi^2 = 9.572, \ P > 0.05 \). Figure 4 is a chart showing the occupational pattern of knowledge of STIs. The drivers appeared to have the highest knowledge of STI with a prevalence of 90.9% while the lowest was the artisans with prevalence of 72.5%; \( \chi^2 = 10.188, \ P < 0.05 \). Figure 5 shows a pie chart of the sources of information about STI. The highest source of information was through the news media followed by the hospital (\( P > 0.05 \)).

**DISCUSSION**

Although this is an hospital based study, the finding of high prevalence of knowledge of STIs in this environment is quite encouraging, especially when compared with that of Tanzania and the report on Nigeria (National Population Commission, 2003). However, it is worrisome to note that the knowledge of STIs was relatively low in the adolescents and the youths which are the future of any nation. This observation might mean that the adolescents and the youths in this environment are more prone to STIs with their attendant complications (\( P < 0.05 \)) (Richard and Jay, 2002; Gerald and Steven, 2002; Whitfield, 1986; De Schryver and Meheus, 1990; Chamberlain, 1995; Westrom and Mardh, 1990; Rice, 1991; Robinson and Ridgeway, 1996; Otolorin, 1999). The low prevalence recorded in this study is similar to the
findings in Malaysia which is a developing country like Nigeria (Mudassir et al., 2010). Therefore, awareness exercise must be targeted at the youths and the adolescents in this environment to control STIs.

This study has revealed that educational level is a key factor in acquiring knowledge of STIs because Figure 3 has shown that the higher the education, the higher the knowledge, even though not statistically significant; this is a similar trend observed in Ecuador (Nsuami et al., 2010; Solomon et al., 2007). The fact that our findings was not statistically significant (p > 0.05) may be due to the limited samples collected because the more educated one is, the more one is able to acquire knowledge, and poorer knowledge has been found to be associated with lower educational level (Solomon et al. 2007).

Further more, the commonest source of information in this environment was found to be through the news media. This is not surprising because apart from the fact that many people possess small transistor radio all over the community, the advent of information and communication technology (ICT) has made information easier to acquire anywhere as a result of the in-built radio in the telephone handsets, which are commonly available in this community. This finding is in keeping with the result of the study conducted in southeast Nigeria (Obiechina et al., 2001). Since the next source of information is the hospital, health workers should find a way of giving information to their patient, especially on STIs, so as to improve the patient’s knowledge. This may be done through regular health talks or distribution of literatures.

In addition, awareness may be created also by the health workers disseminating information to the rural populace through the churches, mosques or the markets. It is important for health workers to note that studies have shown that educating patients about STIs, which may be by mere explaining literature on it in a simple and direct manner, may foster a trusting patient/provider relationship throughout the health-seeking encounter (Johnson-
Mallard et al., 2007). However, a study on how effective
health education may be on the prevalence of STIs in this
environment is highly desirable.

Finally, this study has shown that the drivers have more
knowledge about STIs than any other occupation. This
may not be unconnected with the easy access they have
to car or handset radio, as many of them move within the
state and outside the state wherefore they have
opportunity to listen to news. A study to actually
determine the reason for this high prevalence would be
undertaken in a future study. It is therefore not out of
place to target advocacy at various occupational group
for effective control of STIs.

Conclusion

The prevalence of knowledge of STIs is high (81.2%)
among patients attending Outpatient clinics of University
Teaching Hospital, Ado-Ekiti, Nigeria, especially among
the age group 25 to 54. However, the prevalence among
the adolescents who are the most vulnerable is relatively
low. Age, educational level and sources of information
are important factors affecting the knowledge of STIs.

REFERENCES

Chapter 3, pp. 126-135.
PC, Retik AB, Weinberg AJ (Eds.), Campbell's Urology, 8th edn.
Johnson-Mallard V, Lengacher CA, Kromrey JD, Campbell DW, Daley
E, Schmitt K (2007). Increasing knowledge of sexually transmitted
infection risk. The nurse practitioner: Am. J. Primary Healthc, 32:26
-32.
HIV/AIDS and STI related knowledge, attitude and practice among
high school students in Kathmandu valley. Kathmandu Univ. Med. J.
3(9):69-75.
Mmbaga EJ, Leyna GH, Mnyika KS, Klepp K (2007). Knowledge of
sexually transmitted infections complications strongly predicts risky
sexual behaviours and HIV aerosats: results from rural Kilimanjaro,
Anwar M, Sulaiman SAS, Ahmad K, Khan TM (2010). Awareness of
school students on sexually transmitted infections (STIs) and their
sexual behaviour; a cross-sectional study conducted in Pulau Pinang,
Malaysia. BMC Public Health 10:47.
Demographic and Health Survey.
transmitted infections among high school students. Am. J. Health
Obiechina NJA, Diwe K, Ikpeze OC (2001). Knowledge, awareness and
perception of sexually transmitted diseases (STDs) among Nigerian
Akuse JT (ed.), Proceedings of workshop on strategies for the
reduction of high maternal mortality. Safe motherhood at the local
disease. What are the questions? J. Am. Med. Assoc. 266:2587-
2592.
Richard EB, Jay CH (2002). Sexually transmitted diseases: the classic
Diseases. In: Walsh PC, Retik AB, Weinberg AJ (eds.), Campbell's
671-691.
Westroom L, Mardh PA (1990). Acute pelvic inflammatory disease
[PID]. In: Holmes KK, Mardh PA, Sparling PF, Wieser PJ, Cates W