

Awareness, Knowledge and Attitudes Towards Human Immunodeficiency Virus Among High School Students

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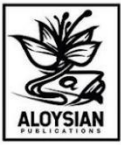
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Abstract

HIV, human immunodeficiency virus, throughout time has been a poignant health concern, specifically among teenagers. The study targeted to distinguish the level of HIV indicated as awareness, knowledge, and attitudes among high school students. In the same manner, it aimed to investigate the relationship amongst the mentioned variables. A descriptive-correlational design aimed to collect data from 304 Grade 9 students from Iligan City National High School, in which a self-developed, expert-validated research instrument, were analyzed using descriptive statistics, Pearson correlation, and regression analysis. Results showed that students illustrated high levels of HIV awareness with a mean of 4.15 and SD of 0.4; HIV knowledge with a mean of 4.43 and SD of 0.55; HIV positive attitudes mean of 4.43 and SD of 0.55. Similarly, poignant positive relationships were demonstrated between attitudes and HIV awareness ($r = .490$, $p < .01$) and knowledge ($r = .610$, $p < .01$). In addition, regression analysis demonstrated that social impact ($B = 0.553$, $p < .001$) and HIV testing and treatment services ($B = 0.166$, $p = .010$) significantly proposed students' attitudes. Lastly, regression analysis revealed that improving both knowledge and social understanding of HIV can enhance positive attitudes and thus, mitigating the stigma among these teenagers.

Keywords: *HIV, awareness, knowledge, attitudes, adolescents, descriptive correlational statistics, regression analysis, Philippines*



I. INTRODUCTION

Human immunodeficiency virus (HIV) remains a significant global public health concern, particularly among adolescents and young adults. Globally, approximately 39.9 million people were living with HIV in 2023, with adolescents representing a vulnerable population due to behavioral and social risk factors (UNAIDS, 2023). In the Philippines, the number of HIV cases among individuals aged 15–24 has increased substantially, highlighting the urgent need for targeted interventions (Department of Health (Philippines), 2024).

Despite ongoing public health efforts, gaps in HIV-related knowledge and persistent stigma continue to hinder prevention and treatment strategies. Studies have shown that adolescents often possess incomplete or inaccurate knowledge about HIV transmission and prevention, which contributes to risky behaviors and delays in seeking healthcare services (Sombrea et al., 2024; Snopkowska et al., 2024).

The present study is anchored on established behavioral theories, including the Health Belief Model (Rosenstock, 1974), Theory of Planned Behavior (Ajzen, 1991), and Social Cognitive Theory (Bandura, 1986). These frameworks emphasize that knowledge, perceived risk, and social influences significantly affect health behaviors and decision-making.

Understanding the level of HIV awareness, knowledge, and attitudes among adolescents is essential in designing effective school-based interventions. Therefore, this study aimed to assess these variables among high school students and examine their interrelationships.

II. METHODS

This study employed a descriptive-correlational design to assess HIV awareness, knowledge, and attitudes among students. A total of 304 Grade 9 students were selected using purposive sampling from Iligan City National High School.

A self-developed questionnaire was used to assess awareness, knowledge, and attitudes toward HIV. The instrument underwent expert validation and reliability testing, consistent with recommendations for survey-based research (Creswell & Creswell, 2018).

Descriptive statistics, Pearson correlation, and multiple regression analysis were used to analyze the data. The significance level was set at $\alpha = .05$, following standard statistical practices in health research (Field, 2018).

III. RESULTS

Results revealed that students demonstrated high levels of HIV awareness ($M = 4.15$), knowledge ($M = 4.11$), and positive attitudes ($M = 4.43$). Significant positive relationships were found between attitudes and both awareness ($r = .490$, $p < .01$) and knowledge ($r = .610$, $p < .01$). Regression analysis showed that social impact and HIV testing and treatment services significantly predicted attitudes.



IV. DISCUSSION

The findings indicate that students possess high levels of HIV awareness and knowledge, which are associated with positive attitudes toward HIV. This supports previous studies demonstrating that increased knowledge contributes to improved attitudes and reduced stigma (Liu et al., 2023; Fana, 2021).

However, certain gaps remain, particularly in advanced prevention strategies such as pre-exposure prophylaxis (PrEP), which aligns with findings from Snopkowska et al. (2024), who reported limited awareness of newer HIV prevention methods among students.

The significant relationship between knowledge and attitude is consistent with the Health Belief Model, which suggests that perceived knowledge influences health-related behaviors (Rosenstock, 1974). Similarly, Social Cognitive Theory emphasizes the role of observational learning and social context in shaping attitudes (Bandura, 1986).

Notably, social impact emerged as the strongest predictor of attitude, indicating that students' understanding of stigma and discrimination plays a crucial role in shaping their perspectives. This finding aligns with studies highlighting the influence of stigma on HIV-related behaviors and healthcare utilization (Cluver et al., 2019; Logie et al., 2019).

These results suggest that HIV education programs should not only focus on biomedical knowledge but also address social and emotional dimensions, including stigma reduction and peer influence.

V. CONCLUSION

High school students demonstrated high levels of HIV awareness, knowledge, and positive attitudes. Knowledge and awareness were significantly associated with attitudes, supporting the importance of comprehensive HIV education. Addressing both biomedical and social aspects of HIV may further improve attitudes and reduce stigma among adolescents (UNAIDS, 2023).

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