

Conference Paper

Perceptions and Attitudes Towards HIV/AIDS Patients among General Public in Bahrain

Essam M. Janahi¹, Sakina Mustafa¹, Sajeda Alsari¹, Mariam Al-Mannai², and Ghada N. Farhat³

¹Department of Biology, College of Science, University of Bahrain, Sakhir, Kingdom of Bahrain
²Department of Mathematics, College of Science, University of Bahrain, Sakhir, Kingdom of Bahrain
³Hubert Department of Global Health, Rollins School of Public Health, Emory University, GA 30322, United States of America

Abstract

Introduction: HIV/AIDS is a major global health problem. In Bahrain, although the prevalence of HIV is low, awareness programs are of high importance for controlling and preventing the distribution of HIV infection. The aim of this study is to determine the attitudes and risk perceptions toward HIV/AIDS in Bahrain. Results of this study will provide background knowledge to inform existing and new educational and preventive programs.

Methodology: A self-administered questionnaire-based survey was conducted among 1038 Bahraini adults.

Results: The study showed varied attitudes toward HIV/AIDS, but mostly were negative, as 60% of participants agreed to isolate HIV/AIDS patients in workplaces and schools, and 52.4% of them believed that HIV is a divine punishment. A high proportion of respondents (84.4%) believed that religion plays an important role in minimizing the spread of the disease.

Conclusions: The Bahraini public negative attitudes toward HIV/AIDS was a major finding of this study. Successful control programs of HIV infection require limiting the negative attitudes toward HIV patients and the disease. Those negative attitudes found in this study need to be addressed through new and the currently existing education and health awareness programs in Bahrain.

Keywords: HIV/AIDS, Public Attitudes, Stigmatization, Bahrain

Corresponding Author:
Essam M. Janahi

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1. Introduction

One of the most serious health problems around the world is the infection with Human Immunodeficiency Virus (HIV) which causes Acquired Immunodeficiency Syndrome (AIDS), the fourth leading cause of death worldwide [1–3]. Millions of new cases are

emerging since it was first discovered in 1980s, and many efforts are being done to lower the risk of infection and mortality rates, through development of antiviral drugs and modern genetic technologies to eliminate the virus from infected bodies [4].

Once HIV infects the human body, it attacks the CD4 cells, damaging the immune system and developing a combination of serious diseases, collectively form AIDS, including several opportunistic infections and cancers, such as pneumonia, lymphoma, Kaposi's sarcoma, and AIDS dementia [1]. The main modes of HIV transmission are still the sexual and drug-related methods among the recent infections. In many developing countries, vertical HIV transmission from mother to child is noticeably reduced with the use of antiretroviral therapy [5]. Health care associated transmission of HIV, including blood transfusion, accidental health care procedures by health workers, and unsafe injections, is another mode of the virus transmission, mainly because of the inadequate awareness about the safe practices that prevent the virus distribution, specifically in the developing countries in the first decades of the epidemic, where the injection equipment and blood contaminated stuff were commonly and unsafely reused [3].

In the regions of Middle East and North Africa, UNAIDS estimations of HIV positive cases reached 500000, with steady increase in number [5]. In kingdom of Bahrain, although there is shortage in data on HIV, the prevalence is considered very low, from less than 0.1% among general population at low risk (blood donors and antenatal care women), to 3.3-4.6% among population groups at high risk (drug users), with increase in cases from heterosexual transmission, indicating the spread of the epidemic among the community [6].

One of the key instrumental methods to control the spread of the disease is the education and awareness programs regarding HIV/AIDS [7, 8]. They are important to lower the excessive concerns and fear from the disease specifically in low prevalence regions such as Bahrain [9, 10]. Successful efforts of disease control requires understanding the distribution of the different health behaviors among the population, and measuring the knowledge and attitudes of the public in regards to HIV infection and patients [11-15]. Therefore, the aim of this study is to determine the practices and preventive behaviors, their risk perceptions and attitudes towards HIV/AIDS, in association with socio-demographic factors. The study findings would help in providing information for the awareness programs carried out for controlling HIV/AIDS.

2. Methodology

2.1. Study design, population and data collection

A cross sectional survey was held in the period from September 2014 to December 2014 in the Kingdom of Bahrain. Based on a literature review, a self-administered 50-items questionnaire was prepared by authors. The study population was Bahraini adults aged 18 or older, with no foreign population included in the study. A pilot survey was run on a 50 participant's sample. Some questions were rephrased and modified according to the pilot survey results. Cronbach alpha coefficient was used for computing the questionnaire internal consistency. Results ranged from 0.72 to 0.83 with an average of 0.78.

The questionnaire involved the participants' general socio-demographic characteristics and questions about perceptions and concerns towards HIV/AIDS, and perceptions of the Bahraini Government agencies and organizations efforts regarding HIV/AIDS. A five point Likert scale was used to indicate the answers of the participants (1= I do not know, 2= strongly disagree, 3= disagree, 4= agree and 5= strongly agree).

Both English and Arabic versions of the questionnaire were used for a total of 1630 participants. This sample size (1630 participants) was calculated according to the 2010 Bahrain's census data [16] with 95% confidence level and $\pm 3\%$ sampling error, considering the total Bahraini population size is 568,399. To ensure the demographical representation of the respondents to the general population, a systematic proportional quota sampling was applied, with quotas based on age, sex, and education level. The distribution of the hard copy of the questionnaire was done in public places in different regions of Kingdom of Bahrain, as well as a soft copy, which was sent by emails. The instructions of filling the questionnaire and the purpose of the study was clarified for the participants, in addition, they were advised not to ask for external help in order to get a more accurate idea about the degree of public awareness.

2.2. Statistical analysis

Data cleaning was performed by excluding the questionnaires done by non-Bahraini respondents and the incomplete questionnaires, those of more than three unanswered statements. Data then were analyzed using SPSS (version 21). Descriptive statistics (N, % and mean \pm Standard Deviation [SD]) were carried out to determine the attitudes and practices of the sample. T-test or ANOVA were used for continuous variables, and

chi square test for categorical variables, to analyze the association of these factors with gender, age, marital status, educational level, and employment status.

2.3. Ethical issues

This study was approved by University of Bahrain, head of Department of Biology and selected ethical committee. It conformed to the provisions of the Declaration of Helsinki in 1995 (and revised in Edinburgh 2000). All respondents signed the approval form before participation.

3. Results

3.1. Response rate

A total of 1286 questionnaires were returned out of the 1630 questionnaires distributed, (response rate = 78.9%), and out of which 1038 were complete (complete response rate = 80.71%).

3.2. The socio-demographic characteristics of the participants

The mean age of the study population was of 31 years, involving 43% males and 57% females. From the participants, 38.3% had a bachelor degree, 37.9% had school certificates, and the post-graduate education had a lower percentage (Table 1). In terms of age, gender, and educational level, there were no statistically significant difference between the study population and Bahrain's recent census data [16].

3.3. Participants' attitudes, opinions, and risk perception about HIV/AIDS

In general, mostly negative attitudes towards HIV/AIDS were expressed by the participants. For example, 77.5% of the participants agreed that they would avoid eating food if it was made by an HIV patient, more than 50% said that they won't shake hands or sit close to the patient. In addition, 82.9% of the participants believed that HIV patients should inform their colleagues about their illness, and 60.1% approved isolating them in schools and workplaces. Furthermore, 52.4% of the participants believed that HIV infection is considered a divine punishment. However, 65.8% of the participants felt

TABLE 1: *The Participants' socio-demographic characteristics.*

Variables		Frequency	Percentage (%)
Gender	Male	446	43
	Female	592	57
Age	< 20	198	19.1
	21-30	422	40.7
	31-40	238	22.9
	41-50	126	12.1
	>51	54	5.2
Marital status	Single	465	44.8
	Married	573	55.2
Educational level	School level	393	37.9
	Diploma	176	17
	Bachelors	398	38.3
	Post graduates	71	6.8
Employment status	Employed	572	55.1
	Unemployed	182	17.5
	Students	284	27.4

compassionate toward HIV patients, in addition of other feelings reported like hatred, apathy fear, sadness, and cautiousness. In addition, more than 50% agreed that HIV patients deserve a similar support and deserve as other diseases patients. More positive attitudes were expressed by married participants with only school level education than those of higher education levels and singles ($P < 0.05$). No statistically significant differences of attitudes between genders and different age categories were found (Table 2, Figure 1).

TABLE 2: *P-values of participants' attitudes and opinions towards HIV patients and the disease.*

Variables	P value of the participants attitudes towards HIV patients	P value of the participants attitudes towards HIV disease
Gender	0.470	0.000
Age	0.609	0.048
Marital status	0.000	0.005
Educational level	0.012	0.381
Employment status	0.103	0.001

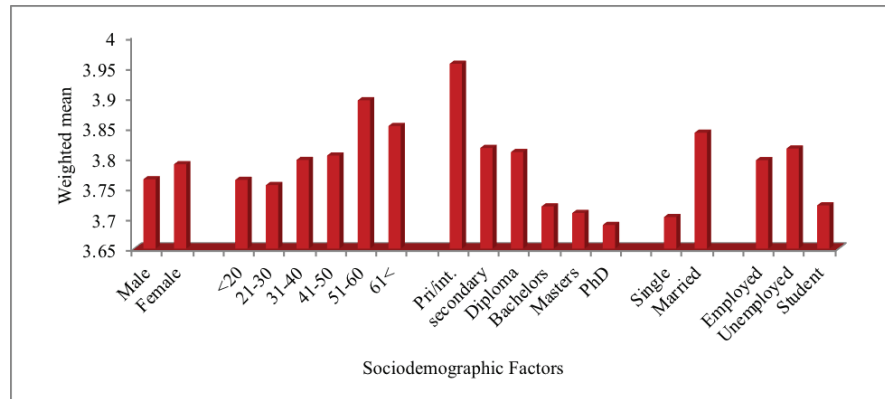


Figure 1: Participants' attitudes and opinions towards HIV/AIDS patients.

Regarding the participants' worries and threat perceptions toward HIV/AIDS epidemic, more than 59.1% of the participants believed that in the next 10 years, the number of HIV cases in Bahrain will have a sharp increase, and about 80.2% of them agreed that AIDS could become a threat to Bahraini society. More than half of the participants (54.5%) appropriately identified that the incidence of HIV in Bahrain is low, and that the drug users cover half of cases. About 77% of the participants informed they were never tested HIV, and 68.6% of them showed no concern from getting HIV. Compared to other groups, married, male and employed participants who are aged above 50 showed a considerably higher concern of contracting HIV/AIDS (Table 2, Figure 2).

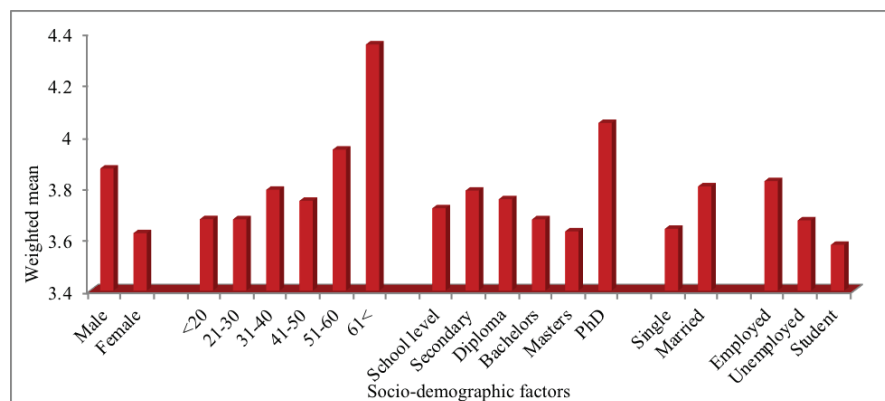


Figure 2: Participants' attitudes and opinions towards HIV disease.

Most of the participants (84.4%) thought that following the Islamic doctrines through avoiding homosexuality, drug abuse and premarital sex will lower the distribution of HIV infection. Of all participants, about 49.9% were distrustful about whether male circumcision would play a role in reduction of HIV transmission. Comparing to other groups in regards to religious beliefs; married, male and employed participants who are aged between 41 and 50 strongly believed in the role of religious beliefs

($P < 0.05$), although in terms of educational level, there was no statistical difference (Table 3).

TABLE 3: *Participants' opinion on religious beliefs about HIV/AIDS.*

Variables		Mean	SD	95% CI	P value
Gender	Male	4.00	0.91	3.91 - 4.08	0.000
	Female	3.79	0.94	3.71 - 3.86	
Age	< 20	3.75	0.98	3.61 - 3.89	0.001
	21-30	3.78	0.95	3.69 - 3.88	
	31-40	3.98	0.87	3.87 - 4.09	
	41-50	4.10	0.87	3.94 - 4.25	
	> 51	4.07	0.92	3.63 - 4.51	
Marital status	Single	3.78	0.96	3.69 - 3.87	0.003
	Married	3.95	0.90	3.88 - 4.03	
Educational level	School level	3.97	0.93	3.80 - 4.13	0.114
	Diploma	3.85	0.96	3.71 - 4.00	
	Bachelors	3.88	0.90	3.80 - 3.97	
	Post graduates	4.02	0.80	3.71 - 4.33	
Employment status	Employed	3.94	0.89	3.87 - 4.01	0.027
	Unemployed	3.86	0.96	3.72 - 4.00	
	Students	3.76	1.00	3.64 - 3.87	

4. Discussion

One of the key measures to control HIV/AIDS epidemic is to provide educational awareness programs to the public, as they advocate maintaining the healthy behaviors in the general public [15, 17, 18]. The present study is the first study in kingdom of Bahrain to determine the attitudes of the general Bahraini public towards HIV/AIDS, which may help in positive contribution to the clarification of the HIV prevention plans and regulation programs in Bahrain.

Negative attitudes towards HIV/AIDS patients were evident among the participants, through avoid shaking hands, sharing meals, or sitting near HIV/AIDS patients, and through thinking that HIV patients should inform their colleagues about their medical condition and believing to isolate them in work areas and schools. Many other studies conducted in several countries showed similar results [10, 19, 20]. Taher and Abdelhai (2011) showed in their study that 75.7% of the respondents marked uncomfortable feeling if they would work with HIV/AIDS patients in the same office [21]. However, another study showed that 52.3% of the respondents agreed that HIV/AIDS patients

deserve having equal rights in study and work as healthy people [22]. Another study also showed that 25% of participants agreed that HIV/AIDS patients have the right to keep their medical condition confidential [23].

Feelings of anger and lack of sympathy leads to generation of the negative attitudes toward HIV/AIDS patients [24]. In our study, the case was opposite. Although negative attitudes were common, many participants reported their feelings towards HIV patients to be compassionate. This suggests that those negative attitudes are due to feeling of fear from getting infected with the disease, which was conspicuous through the other responses, such as a high proportion of the participants strongly agreed to have HIV test among the regular medical checkup, and many agreed that AIDS could be a threat in the future to Bahraini society. In addition, the strong agreement of a high proportion of the respondents that HIV patients should receive a similar support and respect as other diseases patients is another evidence of the compassionate feeling.

Similar to the results of some studies, [14, 24], a big proportion of the participants believed that HIV infection is a divine punishment. In contradictory, studies from USA, Kenya, South Africa and Tanzania didn't show that [25]. Generally, in Islamic countries, the idea that HIV can be a punishment from God is more common, believing that it can be a result of not following the Islamic rules, since the major modes of HIV transmission, such as drug abuse, homosexual behaviors, and sexual relations outside marriage are forbidden in Islam [18, 26]. In addition, a high proportion of the participants thought that following Islamic rules can reduce the spread of HIV infection. A study suggested that the attitudes towards HIV/AIDS are one of the aspects in life that is controlled by culture and religion [18]. Those findings were expected, as Bahrain society is diverse in terms of ethnic, culture, and religion, with Muslim population of about 99.8% of the total population [16].

The negative attitudes towards HIV/AIDS patients, whether it was due to feeling of fear, or religious beliefs, or even due to lack of knowledge; it cause stigmatization against those patients, which forms a difficulty in prevention of the disease [19, 24]. Successful prevention programs need to reduce or eliminate the stigmatization, by introducing legislations to reduce HIV/AIDS discrimination, and development of informative campaigns [27-28].

5. Conclusions

In conclusion, this study gives a general idea of the Bahraini population's attitudes towards HIV/AIDS. The negative attitudes towards HIV/AIDS patients were the major

finding of this study. The public health education and awareness campaign need to be revised by the Bahraini authorities in cooperation with the local media and Ministry of Education. Reducing those negative attitudes by such programs is important to step in the control of HIV/AIDS.

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