



## Original Article

# Knowledge about AIDS among the married women in field practice areas of a tertiary care hospital

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## Abstract

**Objective:** To assess the knowledge about AIDS among the married women in field practice areas of a tertiary care hospital.

**Methods:** The study was carried out on married women in the age group 15-45 years in both urban and rural areas of field practice areas of a tertiary care hospital. The study was carried out in both urban and rural areas using 30 cluster sampling technique as suggested by WHO. The women in the age group of 15-45 years from each cluster were interviewed and information was collected on a pretested questionnaire based on syndromic approach. It was proposed to cover 16 women per cluster both in urban and rural areas and finally, a total of 480 women each from urban and rural areas were included in the study.

**Results:** About one third (30.7%) of women had knowledge about AIDS of whom 32.5% were from urban area and 29% were from rural area. The majority of the women of urban areas were of the view that transmission of the disease is due to having sex with multiple partners (47.4 %). The women who had knowledge about AIDS were asked about preventive measures to be taken in the prevention of AIDS. The majority of the women (65.6 %) were not sure that whether there is possibility of having AIDS through STDs.

**Conclusion:** With the observations in the present study, it is clear that the awareness in rural areas among women is low as compared with the urban counterpart in the study areas. Therefore, the knowledge and awareness should be raised by the Government agencies as well as by Non-Government Agencies (NGOs) in both urban and rural areas.

**Keywords:** HIV/AIDS, Knowledge, Urban and rural areas.

## Introduction

The official estimates of HIV cases in India reached 2.39 million in the year 2010 of whom 39% were women amounting to 0.93 million of the total (Govt. of India, 2010). Despite of the decline in overall disease prevalence during the period 2000-09, the prevalence among women

continued to remain high (Thomas et al, 2009). Several socio-economic factors predispose Indian women for acquiring HIV/AIDS infection (Ghosh et al, 2011). These include early marriage, illiteracy, financial dependence, violence and sexual abuse against women (Raj et al, 2009). A large proportion of the women have poor access to

information and education (Krishnan et al, 2008). It is also suggested that knowledge of HIV is greater in better educated and from higher socio-economic classes compared to among the general population (Balk and Lahiri, 1997).

The National Family Health Survey, Phase-3, conducted by the Ministry of Health in India reported low level of knowledge about HIV infection among women as one of the factors promoting spread of HIV infection (NFHS-3). Earlier reports indicate that empowerment of women is fundamental in HIV/AIDS prevention in India. The studies indicate that the risk for women was high in young and poor urban widows, as well as in those who have suffered sexual violence (Ghosh et al, 2011).

Widespread ignorance, poor information and misconceptions about the disease in society are responsible to cause in social stigma and discrimination and stigmatization (Meena et al, 2013). Although there is a possibility that married women are given sexually transmitted diseases by their husbands, only 6% of them are able to avail themselves of condoms (NIPORT, 2011). The situation in Bangladesh may turn into an epidemic as a result of the low rate of condom usage (Islam and Conigrave, 2008). In such critical conditions, increasing public awareness may be a first step to prevent HIV/AIDS (Rahman et al, 2009).

The importance of mass media for health promotion and disease prevention is well known. Routine exposure and strategic use of mass media play a vital role in promoting awareness, increasing knowledge and changing health behaviors (Bertrand et al, 2006; Li et al, 2009). Mass media channels, radio, television, and newspapers for example, have been suggested to be vital sources of information about HIV/AIDS for ordinary people.

The present study was conducted to assess the knowledge about AIDS among the married women in field practice areas of a tertiary care hospital.

## Material and Methods

The study was carried out on married women in the age group 15-45 years in both urban and rural areas of field practice areas of a tertiary care hospital.

The study was carried out in both urban and rural areas using 30 cluster sampling technique as suggested by WHO. The women in the age group of 15-45 years from each cluster were interviewed and information was collected on a pretested questionnaire based on syndromic approach. It was proposed to cover 16 women per cluster both in urban and rural areas and finally, a total of 480 women each from urban and rural areas were included in the study.

An interview schedule was developed to collect various information from the women in the age group 15-45 years. The schedule was pretested. In view of the experience gained from pretesting, certain modifications were incorporated and schedule was finalised.

## Analysis

The data so collected by the team of investigators was analysed using SPSS 16.0 version (Chicago, Inc., USA). The tables were generated to cover various aspects of the study.

## Results

About one third (30.7%) of women had knowledge about AIDS of whom 32.5% were from urban area and 29% were from rural area. It was observed that the maximum knowledge about AIDS was found amongst 15-19 age group (45.0%) followed by 35-39 age group (37.5%) in the urban areas. The %age of women having knowledge about AIDS in rural area was quite reverse with that in urban area where maximum knowledge was amongst 25-29 age group (38.4 %) and minimum in 15-19 age group (13.3 %). Hindus (31.2 %) were more aware about AIDS than Muslims (29.9%) in the community. In urban areas, maximum knowledge about AIDS was found in women belonging to SC (37.2%) followed by general (36.1%) and backward caste

(25.1%). Knowledge about AIDS was maximum amongst women who have education level of High School. A low number was found amongst illiterates (23.0%). It was observed in urban areas that service professionals had more knowledge about AIDS (60%) than house wives (34.7%). In rural areas, similar trend was found. There was not much difference in knowledge about AIDS in different income-groups (Table-1).

The majority of the women of urban areas were of the view that transmission of the disease is due to having sex with multiple partners (47.4 %). It was surprising that there were 33.4 % women were unaware about mode of transmission of this disease in the urban areas. There were 16.7 % women who were unable to express their views.

Almost same trend was found in rural women (Table-2).

The women who had knowledge about AIDS were asked about preventive measures to be taken in the prevention of AIDS. Majority of women (48.4%) had knowledge about safe sex for the prevention of AIDS. There were 33.7 % women who were not aware about the knowledge of prevention of AIDS (Table-3).

The majority of the women (65.6 %) were not sure whether there is possibility of having AIDS through STDs. A total of 11.8 % knew that there was possibility of having AIDS through STDs. This knowledge was more in urban women (13.3 %) ( $X^2=8.89$ ,  $df=2$  and  $p<0.01$ ) than in rural women (10.4 %) (Table-4).

**Table-1:** Knowledge about AIDS by demographic characteristics

Age in years	Urban			Rural			Total		
	No. Inter-viewed	With knowledge		No. Inter-viewed	With knowledge		No. Inter-viewed	With knowledge	
		No.	%		No.	%		No.	%
15-19	20	9	45.0	30	4	13.3	50	13	26.0
20-24	96	32	33.3	98	34	34.6	194	66	34.0
25-29	143	41	28.6	117	45	38.4	260	86	33.0
30-34	105	35	33.3	120	30	25.0	225	65	28.8
35-39	64	24	37.5	74	16	21.6	138	40	28.9
40-44	52	15	28.8	41	10	24.3	93	25	26.8
<b>Total</b>	<b>480</b>	<b>156</b>	<b>32.5</b>	<b>480</b>	<b>139</b>	<b>29.0</b>	<b>960</b>	<b>295</b>	<b>30.7</b>
<b>Religion</b>									
Hindu	302	110	36.4	417	115	27.5	719	235	31.2
Muslim	178	46	25.8	63	24	38.1	241	72	29.9
<b>Caste</b>									
Upper	163	59	36.1	90	46	51.1	253	105	41.2
Backward	159	40	25.1	215	60	27.9	374	100	26.7
Scheduled	153	57	37.2	174	33	18.9	315	90	28.5
Scheduled Tribe	5	0	0.0	1	0	0.0	6	0	0.0
<b>Education</b>									
Illiterate	373	86	23.0	327	70	21.4	700	156	22.2
Primary	33	21	63.6	33	12	36.3	66	33	50.0
Middle	48	26	54.1	84	40	47.6	132	66	50.0
High School	13	12	92.3	27	10	37.0	40	22	55.0
Intermediate	8	7	87.5	9	7	77.8	17	14	82.3
Graduates+	5	4	80.0	0	0	0.0	5	4	80.0
<b>Occupation</b>									
House wife	368	128	34.7	389	115	39.5	757	243	32.1
Labor	85	15	17.6	69	15	21.7	154	30	19.4
Service/ Domestic help	15	9	60.0	7	6	85.7	22	15	68.1
Petty Business	12	4	33.3	11	2	18.1	23	6	26.0
Others	-	0	0.0	4	1	25	4	1	25.0
<b>Family income per month (Rs.)</b>									
4000 +	44	16	36.3	53	15	28.3	97	31	31.9
3001-4000	69	26	37.6	58	20	34.4	127	46	36.2
2001-3000	130	41	31.5	98	20	20.4	228	61	26.7
1001-2000	197	51	25.8	216	60	27.7	413	111	26.8
Upto 1000	40	22	55.0	56	24	42.8	96	46	47.9

**Table-2:** Knowledge about mode of transmission of AIDS

Mode of Transmission	Urban (n=156)		Rural (n=139)		Total (n=295)	
	No.	%	No.	%	No.	%
By having multiple sex	74	47.4	79	56.8	153	51.8
By infected blood	3	1.9	0	0.0	3	0.9
By multiple use of infected needle by Drug addicts	1	0.6	0	0.0	1	0.3
By infected mother to unborn child	0	0.0	0	0.0	0	0.0
Can't say	26	16.7	20	14.4	46	15.5
Don't know	52	33.4	40	28.8	92	31.5

**Table-3:** Knowledge about prevention of AIDS

Methods of Prevention	Urban (n=156)		Rural (n=139)		Total (n=295)	
	No.	%	No.	%	No.	%
Should have safe sex	72	46.3	72	51.7	144	48.4
The syringe should not be reused	3	1.9	1	0.7	4	1.3
Blood of infected person should not be used	0	0.0	1	0.7	1	0.3
Infected mother should not have pregnancy	0	0.0	0	0.0	0	0.0
Don't know	51	32.6	45	32.3	96	33.7
Can't say	27	17.3	18	11.9	45	14.7
No answer	3	1.9	2	1.3	5	1.6

**Table-4:** Knowledge about possibility of having AIDS through STDs

Knowledge	Urban (n=480)		Rural (n=480)		Total (n=960)	
	No.	%	No.	%	No.	%
Yes	64	13.3	50	10.4	114	11.8
No	4	0.8	16	3.3	20	2.0
Can't say	298	62.2	332	69.2	630	65.6
No answer	114	23.7	82	17.1	196	20.6

## Discussion

In the present study, about one third (30.7%) of women had knowledge about AIDS of whom 32.5% were from urban area and 29% were from rural area. In a study conducted by Sarkar et al (2007) in Pondicherry, it was observed that 96% of women had heard about HIV/AIDS. According to the findings of the present study the women are little less aware than that (99.6%) obtained by NACO (NACO, 2003). In the study conducted by Singh et al (2012), it was observed that 27.41% women know about HIV/AIDS in the rural areas. According to the baseline survey carried out by Kotech (this is name of author) and Patel (2008) in urban slums of Vadodara city 47% women had heard about HIV and the mass media were the most common source of the information. Keeping in mind all these results and views of various

studies from various parts of the country in different communities, it can be concluded here that there is similarity in status of awareness about HIV/AIDS in both rural areas and urban slums.

In the present study, the majority of the women of urban areas were of the view that transmission of the disease is due to having sex with multiple partners (47.4 %). It was surprising that there were 33.4 % women were unaware about mode of transmission of this disease in the urban areas. There were 16.7 % women who were unable to express their views. Similarly according to the study by Sarkar et al (2007) in Pondicherry, 83% women knew one or more modes of spread of this disease. With the help of the observations in these studies here we can say that there are similarities in status of awareness about modes of transmission of HIV/AIDS in all the three types of

communities namely rural, urban and urban slum in the different regions of the country. Singh et al (2012) observed that some of the women in the urban areas in the present study did not know (19.67%) about HIV/AIDS and among these some of them even did not know (33.73) the exact source of their information.

In the present study, the women who had knowledge about AIDS were asked about preventive measures to be taken in the prevention of AIDS. A majority of the women (48.4 %) had knowledge about safe sex for the prevention of AIDS. There were 33.7 % women who were not aware about the knowledge of prevention of AIDS. These findings are similar to the study by Singh et al (2012).

According to the NACO (2012), the women have poor access to information and education, which is critical in the context of HIV/AIDS since behavior change is the key to controlling the epidemic. This is further accentuated among poverty stricken communities.

### Conclusion

With the observations in the present study, it is clear that the awareness in rural areas among women is low as compared with the urban counterpart in the study areas. Therefore, the knowledge and awareness should be raised by the Government agencies as well as by Non-Government Agencies (NGOs) in both urban and rural areas.

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