



Research Paper

# KNOWLEDGE, ATTITUDE, AND PERCEPTION OF HIV/AIDS AMONG MARRIED WOMEN RESIDING IN RURAL AREAS OF BELGAUM: A COMMUNITY BASED CROSS-SECTIONAL STUDY

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**Introduction:** In India, several thousand HIV-infected babies are expected to be born every year. The rising prevalence of HIV among pregnant women in rural India is of great concern. Pregnant women are much receptive on health matters. So, it is important to assess their knowledge, attitude and perception regarding HIV/AIDS. Hence the present study was conducted in a rural area of Belgaum District in Karnataka. **Materials and methods:** The present community based cross sectional study was conducted in three subcentres namely: Bhutramanahatti which belongs to Primary Health Centre (PHC) Vantamuri, Agasga which belongs to PHC Handiganur and Macche which belongs to PHC Kinaye which are run by the Department of Community Medicine, J N Medical College Belgaum. A total of 1792 married women, aged between 15-45 years were interviewed. Pretested pre designed questionnaire was administered to them. Data was compiled, tabulated and analyzed using percentages. Chi square test was used to find association between knowledge and demographic variables. **Results:** In the present study among the study population majority (81%) heard about HIV/AIDS. 40.2% gained knowledge about HIV/AIDS through health worker, 30.3% through media, 17.5% through doctors and remaining from other sources. Among the study participants 20.3% told that HIV/AIDS spreads through unprotected sex, 14.1% through blood products, 6.3% through infected syringes and 5.3% through mother to child. Most (53.9%) of the study participants did not know about mother to child Transmission of HIV/AIDS. **Conclusion:** There is a need for more information directly and indirectly through consistent awareness program among married women residing in rural areas.

**Keywords:** Knowledge, Attitude, Perception, HIV/AIDS

## INTRODUCTION

Acquired Immune Deficiency Syndrome (AIDS) epidemic knocks decades of countries' national

development and it can also devastate families and communities worldwide (AVERT Organization, 2007).

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In India, several thousand HIV-infected babies are expected to be born every year (Rahbar *et al.*, 2007). The rising prevalence of HIV among pregnant women in rural India is of great concern (Rogers *et al.*, 2006).

India is now in the grip of so-called type 4 pattern of AIDS epidemic which shifts from high risk group to the bridge population (clients of sex workers, STD patients) and then to general population, as a whole (Govt. of India, 1999).

HIV the disease, whose mode of transmission is known and is largely preventable, but due to lack of knowledge and practices about HIV/AIDS in general population makes it rapid spread in our country. 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).

Pregnant women are much receptive on health matters. So, it is important to assess their knowledge, attitude and perception regarding HIV/AIDS. Hence the present study was conducted in a rural area of Belgaum District in Karnataka.

## OBJECTIVES OF THE STUDY

To know the knowledge regarding HIV/AIDS in married women.

To know the various factors influencing the knowledge regarding HIV/AIDS.

## MATERIALS AND METHODS

The present community based cross sectional study was conducted in three subcentres namely Bhutramanahatti which belongs to Primary Health Centre (PHC) Vantamuri, Agasga which belongs to PHC Handiganur and Macche which belongs to PHC Kinaye which are run by the Department

of Community Medicine, J N Medical College, Belgaum. All the eligible couples in these areas were included in the study. A total of 1792 married women, aged between 15-45 years were interviewed. Permission from institution and the consent taken from the study subjects were taken. Patient privacy was an important consideration for a study of this nature and the adequate steps were taken to ensure the confidentiality. Pretested pre designed questionnaire was administered to them. Data was compiled, tabulated and analyzed using percentages. Chi-square test was used to find association between knowledge and demographic variables.

## RESULTS

In our study among the study participant most (29.4%) were in the age group of 21-25 years. 22.7% belonged to age group of 26-30 years. 14.9% in 31-35 years, 13.9% were in the age group of 36-45 years and remaining 5.2% belonged to 15-20 years. In the present study 32.2% participants were illiterate. Among literate participants majority (46%) were studied up to secondary school. 16.6% completed primary and remaining 5.3% completed their PUC and degree. Majority 617(34.4%) belonged to Class I V, 25.6% belonged to Class V, 14.8% belonged to Class, 13% to class II and 12.2% to class I (Table 1).

Among the study population majority (81%) heard about HIV/AIDS. 57.38% of study population thinks that it is a dangerous disease. Among the study population 40.2% gained knowledge about HIV/AIDS through health worker, 30.3% through media, 17.5% through doctors and remaining from other sources. Most (63.3%) of study participants are aware that it's not curable (Table 2).

**Table 1: Socio-Demographic Characteristics of Study Participants**

		Number	Percentage (%)
Age Of The Participants	15- 20	94	5.2
	21- 25	526	29.4
	26-30	407	22.7
	31-35	267	14.9
	36-40	249	13.9
	41-45	249	13.9
	<b>Total</b>	<b>1792</b>	<b>100</b>
Literacy Status	ILLITERATE	577	32.2
	PRIMARY	297	16.6
	SECONDARY	824	46.0
	PUC/ DIPLOMA	73	4.1
	DEGREE / PG	21	1.2
	<b>Total</b>	<b>1792</b>	<b>100</b>
Socio economic status (Modified B G Prasad's Classification)	I	264	14.8
	II	234	13.0
	III	218	12.2
	IV	617	34.4
	V	459	25.6
	<b>Total</b>	<b>1792</b>	<b>100</b>

**Table 2: Distribution of Study Participants According to their Knowledge About HIV/AIDS**

		No. of Respondents	Percentage (%)
Heard about HIV/AIDS	Yes	1436	80.1
	No	356	19.9
	<b>Total</b>	<b>1792</b>	<b>100</b>
Knowledge of Type of Disease	Simple	250	17.41
	Dangerous	824	57.38
	Don't Know	362	25.21
	<b>Total</b>	<b>1792</b>	<b>100</b>

Table 2 (Cont.)

		No. of Respondents	Percentage (%)
Source of Knowledge	Media	435	30.3
	Health Worker	578	40.2
	Doctors	252	17.5
	Others	171	12.0
	Total	1792	100
Outcome of Disease	Curable	145	10.1
	Not Curable	909	63.3
	Don't Know	382	26.6
	Total	1792	100

Among the study participants 20.3% told that HIV/AIDS spreads through unprotected sex, 14.1% through blood products, 6.3% through infected syringes, 5.3% through mother to child. 16.6% gave multiple answers and 34.4% told they don't know how it spreads (Table 3).

Most (53.9%) of the study participants did not know about Mother To Child Transmission

(MTCT). 56.5% told that mother to child transmission is preventable. 70.7% of study participants have undergone HIV counseling. 65.9% had the knowledge that HIV testing is free (Table 4).

Majority of study participants (49%) did not know how to prevent the spread of HIV/AIDS spreads. 24.8% said it can be prevented by safe

**Table 3: Distribution of Study Participants According to their Knowledge About Modes of Transmission of HIV/AIDS**

		No. of Respondents	Percentage (%)
Modes Of Transmission	Blood Products	202	14.1
	Unprotected Sex	292	20.3
	Mother To Child	76	5.3
	Infected Syringes	90	6.3
	Shaking Hands	43	3
	Don't Know	494	34.4
	Multiple Answers	239	16.6
	Total	1792	100
Knowledge About HIV/AIDS Symptoms	Known	507	35.3
	Not Known	929	64.7
	Total	1792	100

**Table 4: Distribution of Study Participants According to their Knowledge about Mother To Child Transmission(MTCT)**

		No. of Respondents	Percentage (%)
Knowledge About MTCT	Yes	662	46.1
	No	774	53.9
	Total	1436	100
Knowledge Regarding MTCT Prevention	Preventable	374	56.5
	Not Preventable	288	43.5
	Total	662	100
Undergone HIV Counseling	Yes	421	29.3
	No	1015	70.7
	Total	1436	100
Knowledge Of Free HIV Testing	Yes	490	34.1
	No	946	65.9
	Total	1436	100

sexual practices, 13.8% said by using Disposable Syringes, 6.3% by screening blood before transfusion and 4.6% gave multiple answers. In

our study 47% said it is sad to have HIV, 8.3% said they should be supported mentally (Table 5).

**Table 5: Distribution of Study Participants According to Knowledge About Preventive Methods, Attitude Towards HIV Infected Person**

		No. of Respondents	Percentage (%)
Preventive Methods For HIV/AIDS	Safe Sexual Practices	356	24.8
	Using Disposable Syringes	196	13.6
	Screened Blood For Transfusion	91	6.3
	Any Other	25	1.7
	Don't Know	704	49.0
	Multiple Answers	64	4.6
	Total	1436	100
Attitude Towards HIV Infected Person	Sad	675	47.0
	Should Be Out casted	37	2.6
	Mentally Supported	119	8.3
	Don't Know	605	42.1
	Total	1436	100

Statistically significant association was found between the age of married women and knowledge about HIV/AIDS. As the age of married women increases the level of knowledge about HIV/AIDS also increase (Table 6). There was statistically significant association between the Literacy status

and knowledge about HIV/AIDS. There was correct knowledge about HIV/AIDS with higher Literacy (Table 7). There was statistically significant association between the parity and knowledge and outcome of the disease. Multiparous women had better knowledge of the disease (Table 8).

**Table 6: Association of Age with Those who have Heard about HIV/AIDS**

Age (in years)	Heard About HIV/AIDS	Percentage (%)	Not Heard About HIV/AIDS	Percentage (%)	Total
15-20	83	88.3	11	11.7	94
21-25	396	75.3	130	24.7	526
26-30	334	82.1	82.1	17.9	407
31-35	222	83.1	83.1	16.9	267
36-40	202	81.1	81.1	18.9	249
41-45	199	79.9	79.9	20.1	249
Total	1436		356		1792

Note: Association:  $-x^2 = 14.334$ , DF = 5, P=0.013.

**Table 7: Association of Parity With Knowledge Of The Disease**

Parity	Yes	Percentage (%)	No	Percentage (%)	Total
0	208	83.5	41	16.5	249
1	747	79.9	188	20.1	935
2	306	74.6	104	25.4	410
3	87	81.3	20	18.7	107
4+	88	96.7	3	3.3	91
Total	1436		356		1792

Note: Association:  $-x^2 = 25.418$ , DF = 4 P = 0.00001, P < 0.001.

**Table 8: Association of Literacy Status of Study Population and Knowledge About HIV/AIDS**

Literacy Status	Heard About HIV/AIDS	Percentage (%)	Not Heard About HIV/AIDS	Percentage (%)	Total
Illiterate	475	82.3	102	17.1	577
Primary	163	54.9	134	45.1	297
Secondary	705	85.6	119	14.4	824
PUC/DIPLOMA	73	100	0	0	73
UG/PG/Graduate	20	95.2	1	4.8	21
Total	1436		356		1792

Note: Association:  $-x^2 = 157.035$ , DF = 4, P = 0.000, P < 0.01.

## DISCUSSION

The prevention and the impact of HIV/AIDS epidemic depend upon the knowledge among people about the disease transmission and on how it can be prevented (<http://gateway.nlm.nih.gov/meeting/abstract/ma?f=102254030.html>).

In our study among the study population majority (81%) heard about HIV/AIDS. Study conducted by Singh *et al.* (2002) showed that about 40% of pregnant women had heard of AIDS. Kumar *et al.* (1997) observed that 33.4% of general population who had heard about AIDS belonged to 15-60 years of age.

Regarding the source of information on HIV/AIDS, around 40% of study population gained information by health worker followed by television media (30.3%) in our study. A study conducted by Negi *et al.* showed television as most common source of information (Negi *et al.*, 2006).

Antenatal women in Blantyre, Malawi obtain health information on HIV/AIDS from the radio (96.3%), health workers (82.2%), religious gatherings (66.7%), friends (54.8%) and newspapers (39.3%). The majority intend to be accompanied by own mother and sister for delivery (52.4% and 15.4%, respectively) (Tadesse *et al.*, 2004).

In this study higher socioeconomic statuses, literacy and parity of pregnant women were significantly associated with the increase in awareness towards HIV/AIDS. Similar findings were seen in study done by Narayani *et al.* (2013).

Study conducted by Falnes *et al.* (2010) at Tanzania showed 92.5% of the respondents had heard about PMTCT whereas in our study only 46% are aware of the program, around 56% of study participants told that mother to child transmission is preventable.

## CONCLUSION

There is a need for more information directly and indirectly through consistent awareness program among married women residing in rural areas. Since awareness is the only key to the prevention of HIV/AIDS, there is an urgent need to increase the awareness about HIV/AIDS, especially among the low socioeconomic, illiterate people of the community using all methods of mass media and intensive Information, Education and Communication (IEC) activities by use of local folk media (Abiodun *et al.*, 2007).

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Nil

## CONFLICT OF INTEREST

Nil

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