

Original Research Article

Prevalence of HIV and Impact of Targeted Interventions in High Risk Group: Men who have Sex with Men (MSM) and Transgender (TG)

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Received: 20/07/2016

Revised: 09/08/2016

Accepted: 12/08/2016

ABSTRACT

Unlike heterosexuals who do not have a distinct sexual identity, Men who have Sex with Men (MSM) in India are diverse in their sexual identities. As this population is High Risk core group, the aim of the study was to see the seroprevalence of HIV in MSMs and TG in Yavatmal district (Maharashtra) and impact of targeted intervention among them. The study was conducted from April 2014 to March 2016 in ICTC in the department of Microbiology, Shri Vasantnaik Govt Medical College, Yavatmal with NGO GSMT. A total of 428 MSMs and 11 TGs were screened during April 2014-March 2015. Of that only one (0.23%) MSM was reactive for HIV. While A total of 320 MSMs and 14 TGs were screened during April 2015-March 2016 and none of them was reactive for HIV. MSMs are sexually active so by the effective implementation of targeted intervention programme of NACO seroprevalence of HIV among them can be reduced.

Key words: Men who have Sex with Men, Kothi, Panthi, Double decker, HIV

INTRODUCTION

India has had a sharp increase in the number of HIV infections, from a few thousands in the early 1990s to an estimated 3.8-4.6 million children and adults living with HIV/AIDS in 2002. In 2003, the country had an estimated 4.8 million HIV infected cases. ^[1] According to the HIV Estimations 2012, the estimated number of people living with HIV/AIDS in India was 20.89 lakh in 2011. The adult (15-49 age-groups) HIV prevalence at national level has continued its steady decline from estimated level of 0.41% in 2001 to 0.27% in 2011. But still, India is estimated to have the third highest number of estimated people living with HIV/AIDS, after South Africa and Nigeria ^[2] (*UNAIDS Report on the Global AIDS epidemic 2010*).

Sexual transmission of HIV is the

most dominant route of infection in the country and is concentrated among the high risk group particularly female sex worker, their clients/partners, Men having sex with men (Transgender/Hijras), intravenous drug users. ^[3] Homosexuality is rarely discussed publically as it is considered a taboo by both Indian civil society and the government. ^[4] MSMs (Men having sex with men) are one of the risk group targeted by National AIDS control organization (NACO) to reduce HIV transmission.

Men who have Sex with Men (MSM): This term is used to denote all men who have sex with other men, regardless of their sexual identity or sexual orientation. This is because a man may have sex with other men but can still consider himself to be a heterosexual or may not have any particular sexual identity at all. In general,

the term “MSM” refers to both MSM with self-identities such as gay, bisexual and kothis, as well as MSM who do not self-identify with any of these terms. Kothi-identified MSM generally present with feminine gender expression and are primarily receptive partners in anal sex with panthis. Panthi is usually a label given by kothis to their masculine partners and usually is not an identity. Kothis label those MSM who engage in both insertive and receptive sex as ‘double-deckers’ (some may also self-identify as ‘double-deckers’ (Note: There are regional variations in the terms used). Gay-and bisexual-identified MSM are primarily from the middle and upper socioeconomic class and are relatively better educated when compared with kothi -identified MSM who are primarily from the lower socioeconomic status and less educated. [5]

Transgender (TG) people continue to be included under the umbrella term “MSM”. However, it has increasingly been recognized that TG have unique needs and concerns, and it would be more useful to view them as a separate group. The term transgender person is generally used to describe those who transgress socio gender norms. Transgender people may live full or part-time in the gender role “opposite” to their biological sex by birth. [5]

HIV infection among men who have sex with men (MSM) has been increasing in recent years around the world, particularly in Asia. [6] This global trend is being seen in India, with the current estimated HIV prevalence among MSM ranging between 7 and 16.5 per cent. [7-9]

As per NACO annual report 2012-13, Adult HIV prevalence at national level was 0.27% in 2011, whereas HIV prevalence amongst MSM population in India was 4.43%. [10]

Aims and objectives

MSM and TG in India may play a 'bridging' role in the spread of HIV into general public. So we conducted the study to see the seroprevalence of HIV in MSMs

and TG in Yavatmal district and impact of targeted intervention among them.

MATERIALS AND METHODS

This is a cross sectional study.

This study was carried in Integrated Counseling and Testing Centre (ICTC) department of Microbiology Shri Vasant Naik Government Medical College and Hospital, Yavatmal, Maharashtra, India with NGO Gramin Samasya Mukti Trust (GSMT) from April 2014 to March 2016 over a period of 2 years. ICTC counselor with NGO counselor visited the places where MSMs usually gathers in evening time (4pm to 9pm). NGO counselor interact with MSMs and history of age at first sexual interaction, sexual habits and customs, condom use and awareness about STI and HIV were recorded during intervention and HIV testing were offered after pre-test counseling. Most of the MSMs and TGs were intervened by the counselors at their usual place to meet. After counseling blood samples were collected and processed according to NACO guidelines for HIV testing.

During a period of April 2014-March 2015 (1 year) a total 428 MSMs and 11 TGs were screened while during a period of April 2015-March 2016 (1 year) a total 320 MSMs and 14 TGs were screened.

Those who detected positive were linked to ART for care support and treatment after post test counselling. The data was pooled and analysed accordingly. Every non-reactive MSMs and TGs were tested repeatedly every 6 monthly. Some individual MSM and TG undergone through multiple testing.

RESULTS

A total of 748 MSMs were screened for HIV over a period of 2 years. Of that 379 were Kothi, 221 were Panthi and 148 were Double decker. Most of them from age group 17-35 years. (Table 1)

A total 838 samples were tested from 428 individuals in the year April 2014 to March 2015. Only one (0.23%) MSM

was reactive for HIV that is from Kothi. (Table 2)

While a total 630 samples were tested from 320 individuals in the year April 2015 to March 2016. And none of them was reactive for HIV. (Table 3)

Table 1: Age wise distribution of MSM

Age in years	Kothi	Panthi	Double decker	Total
17-25	184	131	67	382
26-35	128	55	46	229
36-45	49	28	29	106
>45	18	07	06	31
Total	379	221	148	748

Table 2: HIV testing and HIV seropositivity in April 2014- March 2015

MSM	Once	Twice	> twice	Total	Seropositivity (%)
Kothi	208	198	8	414	1 (0.23%)
Panthi	125	107	10	242	0
Double decker	95	80	7	182	0
Total	428	385	25	838	1 (0.23%)

Table 3: HIV testing and HIV seropositivity in April 2015- March 2016

MSM	Once	Twice	> twice	Total	Seropositivity (%)
Kothi	171	168	3	342	0
Panthi	96	91	2	189	0
Double decker	53	45	1	99	0
Total	320	304	6	630	0

Table 4: Year wise distribution and frequency of HIV testing in TGs

Year	Once	Twice	> twice	Seropositivity (%)
April 2014- March 2015	11	9	1	0
April 2015- March 2016	14	10	2	0

Table 5: Age wise distribution of TGs

Age in years	TGs
17-25	11
26-35	09
36-45	04
>45	01
Total	25

A total of 25 TGs were tested for HIV over a period of 2 years and none of them was reactive for HIV. Maximum TGs were from age group 17-25 years followed by 26-35 years. (Table 4 and 5)

The education status of MSMs in our study was 70% were graduate, 10% were secondary and higher educated, 10% were having primary education and 10% were illiterate.

DISCUSSION

According to WHO, regional office South East Asia 2010, the prevalence of HIV was high among MSM in India (7.4% national rate), Thailand (24.7% in Bangkok and 8.3% in Chiang Mai), Myanmar (28.8% national rate) and Indonesia (5.2% national rate). Medium- to-low HIV prevalence was found among MSM in Nepal (3.8%), Bangladesh (less than 1%), Timor-Leste (0.9%) and Sri Lanka (0.48%). HIV infection was not identified among MSM in the Maldives. Where HIV prevalence data were available among TG, it was mostly

higher than that among MSM. [5]

National AIDS control programme in India has been recognized globally as a success story. Decline has been achieved among Men who have sex with Men (7.41% in 2007 to 4.43% in 2011) [11]

Seroprevalence of HIV among MSM in our study was very low (0.23%) in 2014-2015 while none of the MSM was reactive in the year 2015-2016. Similar study conducted by Gedam et al showed seroprevalence of 1.30% in the year 2012-2013 and 0.22% in the year 2013-2014. [12] Setia et al., 2008 have reported a combined estimate of HIV prevalence of 16.5% among MSM in India from 5 different studies. [13] While Soloman et al., 2010 showed 9% HIV prevalence. [14] Gerg et al and Ghosh et al in the year 2012 reported seroprevalence of 4% and 5.6% respectively. [4,15]

In Jakarta, Indonesia, HIV prevalence among TG was 34%, while a study in five sites of Tamil Nadu, India found HIV prevalence among TG of 12%. [5] In present study out of 25 TGs none of them was reactive for HIV. Gedam et al reported, out of 63 individuals, 1(1.59%) was positive for HIV. [16] In contrast to this Wanjare et al showed high prevalence of

HIV (7%).^[17] Similar to the study by Gedam et al in our study also none of the TG was commercial sex worker.^[16] Main source of their income were participating in marriage and badhai ceremony.

Nair et al noticed that there are regional variations in HIV prevalence among MSM and transgender and injecting drug users.^[18]

Expansion of surveillance sites among MSM was a priority during NACP III and surveillance sites increased from 40 in 2007 to 96 sites across 23 states in 2010-11. Almost one third (30) of HSS sites among MSM in 2010-11 showed high prevalence including those in states of Chhattisgarh, Delhi, Gujarat, Madhya Pradesh, Odisha and West Bengal. Among MSM, highest HIV prevalence is recorded in the state of Chhattisgarh (15%) followed by Nagaland (13.6%), Manipur (10.5%), Andhra Pradesh (10.1%) and Maharashtra (9.9%).^[19]

National AIDs control organization started targeted intervention programme for high risk group in 2008 because HIV epidemic in India is concentrated in high risk group

Most of the countries under review have some form of interventions for MSM, and sometimes MSWs and TG populations as well. The interventions outlined in national plans overall include: peer outreach education; promotion and distribution of condoms and water-based lubricants; and referrals to HIV and STI screening and treatment. Despite these interventions, available data showed that overall coverage was well short of that estimated by the Asian epidemiological model to reverse the HIV epidemic (i.e. 80%): in most countries, coverage was less than 25%.^[5]

In our study counselor interact with MSMs and TGs every month through GSMT and distributed condom and educated them about the safe sexual practices and awareness about HIV/AIDS and various STIs.

CONCLUSION

If HIV/AIDS control programmes among MSMs and TGs are going to be effective, the focus has to shift from targeting them as vectors of HIV transmission to understanding how societal intolerance enhances risk, requiring combination prevention interventions that use new biomedical interventions aligned with culturally tailored behavioural approaches, and that consider mental health and psychosocial concerns. Interventions should incorporate a holistic framework to address the sexual health and overall well being of MSM.

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How to cite this article: Bulle PA, Gedam D. Prevalence of HIV and impact of targeted interventions in high risk group: men who have sex with men (MSM) and transgender (TG). *Int J Health Sci Res.* 2016; 6(9):131-135.
