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# A STUDY ON CLINICO EPIDEMIOLOGICAL PROFILE OF SEXUALLY TRANSMITTED INFECTIONS AMONG BISEXUAL MALES

Medical Science

**Dr. Bhavith D. U. D. Dvl** Junior Resident, Institute of Dermatology, Venereology, Leprosy Madras Medical College/ RGGGH, Chennai

**Dr. S. Kalaivani M. D. D. V*** Director And Professor of DVL, Institute of Dermatology, Venereology, Leprosy Madras Medical College/RGGGH, Chennai. *Corresponding Author

**Dr. V. Mohankumar M. D. Dv** Associate Professor, Department Of Dermatology Venereology Leprosy, Government Erode Medical College Hospital, Perundurai 638053, Erode, Tamilnadu

## ABSTRACT

"Bisexuality" is known to be very much a western social construct, has risky sexual behavior predisposing to a higher risk of sexually transmitted infections (STIs).

Aim of our study was to determine the prevalence of STIs and socio-demographic variables associated with STIs among bisexual males attending sexually transmitted disease (STD) O.P in a tertiary care center.

A Retrospective Observational Study of 45 bisexual males from January 2019 to June 2019 was done. Detailed history, physical examination, ELISA for HIV, VDRL, TPHA and other appropriate investigations results were noted.

Among 4841 males who attended STD O.P, 45(0.93%) were bisexual males, most common age group being 21-30 years (44.4%). 40% of the bisexual males were diagnosed with STI. Syphilis (61%) was the commonest STI followed by mixed infections with HIV (17%). Penovaginal(69%) and Anoinsertive(60%) being the common mode of sexual intercourse. 77.8% had unprotected sex and 51.4% of them were diagnosed with STI.

High risk sexual behavior was evident among bisexual males leading to STIs, however regular condom usage mostly by the educated group seemed to have prevented them from acquiring STIs .

## KEYWORDS

Bisexual males, syphilis, sexual behavior

### INTRODUCTION:

Bisexual male is a male having sex with both males and females [1].Bisexuality is known to be very much a western social construct[2]has risky sexual behaviour predisposing to a higher risk of Sexually Transmitted Infections(STIs)

### AIMS AND OBJECTIVES:

To determine the prevalence of STIs and Socio demographic variables associated with STIs among bisexual males attending Sexually Transmitted Disease Outpatient Department (STD O.P.) in Institute of Dermatology Venereology Leprosy, Madras Medical College, Chennai.

### MATERIALS AND METHODS:

Retrospective observational study of 45 Bisexual males who attended STD O.P from January 2019 to June 2019 was done. Data collected like Age, education, marital status, residence, referral status, addictive habits, history of sexual contacts, condom usage, general and local examination findings were analyzed.

Blood tests like ELISA for HIV (after pretest counseling), VDRL & TPHA for syphilis, HBsAg, anti HCV, ELISA for HSV- IgM for genital herpes and other relevant investigations reports were analyzed.

### RESULTS :

Syphilis (61%) was the commonest STI, followed by mixed infections with HIV (17%). 77% of Syphilis patients were in the latent stage.17% had mixed infection. 39% were symptomatic, 61% were asymptomatic.

83% of Bisexual males were in 21-40 years age group [3]. 78% of patients with STIs belong to 21-40 years age group. 67% had come as self screening and half of them had STIs. 44% were migrated urban residents. 45% of migrated urban residents were unemployed. 58% were unmarried 51% had studied above 12$^{th}$std. 35% were chronic alcoholics.78% had unprotected sex. Protection was used mainly by educated group. Patients with STIs did not give history of ever using condom. Among the unaffected, 37% had regular usage of condom.

Almost 50% had more than one male/female partner. Among male partners, 67% were known males. 60% of bisexual males had sex with Commercial sex worker (CSW). 83% of patients with STIs had contact with CSW. Penovaginal (69%), Anoinsertive (60%) followed by oro insertive (51%) being the common mode of sexual intercourse.

15 bisexual males were married. Among the wife of married bisexual males, three were Antenatal mothers with one diagnosed as Early latent syphilis & other had genital wart. Wife of 80% bisexual males were screened & 42% of them had STIs with syphilis being the commonest STI. All the screened partners were treated appropriately.

### DISCUSSION:

In our study population, prevalence rate of STIs were 40% in Bisexual males & 7.5% in general male population. Bisexual males were five times more prone to have STIs. Majority of bisexual males were in 21-40 years age (83%),came as Self referral (67%) followed by NGO referral(20%) .48% were urban migrants, unemployed & unmarried were 58%. Graduates constituted 51% & bisexual males with addictive habits were 45%. Bisexual males who had sexual Contact with Commercial sex worker were 60%. 78% never used condom during sex.

51% had studied above 12$^{th}$ standard and 49% below 12$^{th}$ standard [4]. Condom protection was used mainly by educated group **[Fig :1]** Patients with STIs did not give history of ever using condom. Among the unaffected 37% had regular use of condom.

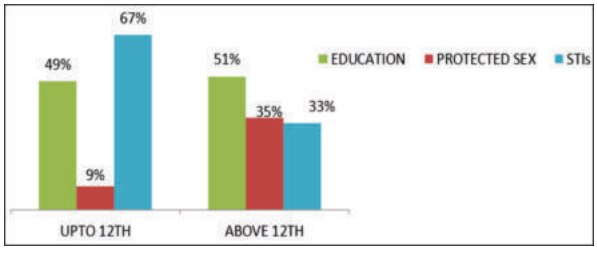


**Fig: 1 – Educational Status**

In our study, common mode of sexual act was Penovaginal (69%), Anoinsertive (60%) followed by oroinsertive (51%) **[Fig:2]**

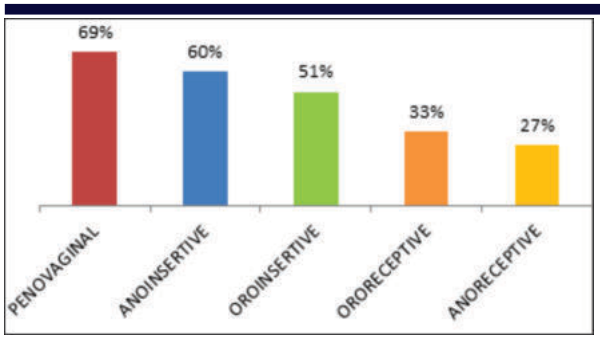


**Fig: 2 - Mode Of Sexual Act**

In our study population, Syphilis (61%) was the commonest STI followed by mixed infections with HIV (17%). Men having Sex with Men & Women's increased likelihood of unprotected peno insertive sex, as well as commonly occurring oral sex with men and women likely increase MSMW's vulnerability to STIs readily acquired via peno-insertive and oral sex (e.g., syphilis) [**Fig :3**] All the Bisexual males with STIs had unprotected sex.

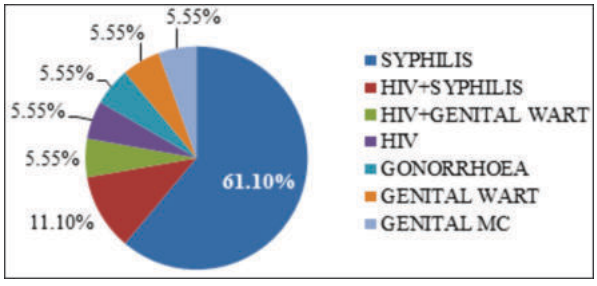


**Fig: 3 - Prevalence Of Stis**

Studies have found that Men having Sex with Men & Women (MSMW) are more likely to have undiagnosed HIV infection than Men having sex with Men (MSM) which can increase their likelihood of transmitting HIV to their sexual partners[5][6].

A study has shown Men who have Sex with both Men and Women (MSMW) are more likely to have high risk sexual behavior and HIV transmission rates compared to MSW/MSM[7]. Bisexual men tend to have a greater number of lifetime sexual partners on an average.[8]

## CONCLUSION:

High risk sexual behaviour is evident among Bisexual males, significantly increasing the chance to acquire STIs. However safe sexual practice with regular condom usage mostly by the educated group seemed to have prevented them from STIs. Sex education, condom promotion, early & regular STIs screening by Self and NGOs in Bisexual males will prevent them from acquiring STIs. Understanding the pattern of STIs among Bisexual males (who mainly belong to Bridge population)[4] especially at a specific regional level will provide useful insights to prevent the spread of STIs.

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