



## AN EPIDEMIOLOGICAL STUDY OF VARIOUS SEXUALLY TRANSMITTED DISEASES IN KOLAR AREA OF BHOPAL MADHYA PRADESH

### Dermatology

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### ABSTRACT

**Background:** Sexually transmitted diseases have been considered as a major health problem, in developing countries. For Indian society STDs are taboo. With up springing of HIV and AIDS, the attention and importance of STDs have again come into limelight. Epidemiological study is needed to understand the pattern of various STDs prevalent in Kolar, MP.

**Methods:** The epidemiological pattern of 900 patients have been studied. Patients were followed up at regular interval.

**Results:** 51.78% were males and 48.22% were females. Out of these major percentage of patients had reported vaginal discharge (27.7%), followed by genital warts (23.6%). Females were reluctant to consult the doctor for their problem. (72%) were married and (27.7%) were unmarried. No contraceptive measures were taken in 50% cases. 20 cases of pregnancy with STDs were studied.

**Conclusions:** A epidemiology study was taken up to understand the nature, type and extend of sexually transmitted diseases in the tribal population. Also to know the understanding amongst the masses about the STDs especially in teenagers and young people.

### KEYWORDS

Epidemiology, Sexually transmitted diseases, central India

### INTRODUCTION

Sexually transmitted infections (STIs), including human immunodeficiency virus (HIV), continue to present major health, social, and economic problems in the developing world, leading to considerable morbidity, mortality, and stigma. The prevalence rates apparently are far higher in developing countries where STI treatment is less accessible.<sup>1</sup> Most of the STIs, both ulcerative and nonulcerative, are prevalent in India and constitute one of the major public health problems. Their profile varies with changes in socioeconomic, cultural, geographic, and environmental factors prevalent in different parts of the country.<sup>2,3</sup> However, due to lack of adequate laboratory infrastructure in the country, information regarding the profile of STIs relies essentially on syndromic diagnosis. Hence there is very limited data of laboratory-proven STIs.<sup>4,5</sup> However, the availability of baseline information on the epidemiology of STIs and other associated risk behaviors remains essential for the designing, implementing, and monitoring successful targeted interventions.<sup>6,7</sup>

The World Health Organization (WHO) has placed emphasis on syndromic approach for case measurement and management, particularly in high-prevalence areas having inadequate laboratory facilities, trained staff, and transport facilities.<sup>8</sup> Though the syndromically diagnosed STI has many limitations, continuous analysis of risk assessment and prevalence-based screening studies are necessary to evaluate and monitor the performance of syndromic management.<sup>9</sup>

The aim of the present study was to document the pattern of common STIs in patients attending the STI clinic of a tertiary care hospital at Bhopal (M.P.).

### METHODS

The study was conducted during the period from August 2015 to December 2015. A total of 1012 patients with STDs, attending the Department of Dermatology and Venerology, Government Medical College, Valsad, were enrolled for this study. Out of which only 900 completed the study, while 112 did not follow up. Patients who voluntarily enrolled for the study were taken into the study. Oral verbal consent was taken. Primary screening for all patients was done. Required blood reporting was done.

All the patients were screened for common STIs by standard microbiological methods such as VDRL/PRP/TPHA, Gram stain, wet mount test and KOH test.

### RESULTS

Total number of patients participated in the study was 900. Of them majority were under the age group of 20-24 years (Table 1). Male

dominance was seen in the study. Majority of the cases were unemployed (33.3%) and the few were highly skilled (3.3%)<sup>2</sup>. Married cases (72.2%) outnumbered the Unmarried ones (27.7%). Physical contraception had pivotal role in preventing STDs. About 50% of cases are not following contraceptive methods. In females 20 were pregnant in the present study.

**Table 1: Age and sex wise distribution of patients**

Age Group	Male	Female	TOTAL
<20	40 (8.58 %)	30 (6.91 %)	70 (8.58 %)
20-24	150 (32.19 %)	250 (57.6 %)	400 (32.19 %)
25-44	188 (40.34 %)	112 (25.81 %)	94 (40.34 %)
>45	87 (18.88 %)	43 (9.68 %)	130 (18.88 %)
<b>TOTAL</b>	<b>465 (51.78 %)</b>	<b>435 (48.22 %)</b>	<b>900 (100 %)</b>

Highest number of cases are having the genital warts (15) followed by candidiasis (3) and AIDS (2). In female highest number of cases were showing cervical/vaginal discharge and in males genital wart cases were highest. No cases were of syphilis (Table 2).

**Table 2: Pattern of STDs among males and females**

Cases	Male	Female	Total	Percentage (%)
Cervical/vaginal discharge	0	250	250	27.7
Genital ulcer-non herpetic	5	0	5	0.5
Genital ulcer-herpetic	20	30	50	5.5
Lower abdominal pain	0	150	150	16.6
Urethral discharge	10	0	10	1.1
Ano-rectal discharge	1	0	1	0.11
Inguinal bubo	2	0	2	0.22
Painful scrotal study	0	0	0	0
Genital wart	103	110	213	23.6
Other STI	63	0	63	7
Asymptomatic STI	80	65	145	16.1
HIV/AIDS	8	3	11	1.2
Syphilis	0	0	0	0

### DISCUSSION

As observed in our study, total cases were 900. The number of males and females is more or less the same.

On basis of our study, even the kind of occupation the cases had, had a

correlation with the STD that prevailed.<sup>10</sup>

Most of the patients were unemployed labourers. Even in the highly qualified personnel, cases of STDs did prevail.

Out of every 10 cases, 6 were addicted. Addiction was in form of smoking, chewing tobacco, alcohol consumption, marijuana consumption. Mostly chewing tobacco, alcohol consumption was prevalent in unemployed and unskilled labourer. While cases of smoking was seen even in highly skilled people.<sup>11</sup>

Both married and unmarried cases were included in the study. Married people outnumbered the unmarried cases.

Around 4% had the premarital exposure. The reason was Sexual urge, peer pressure, for pleasure, love affair, and curiosity. Around 7.6% had an extra marital affair, reason cited was- lack of harmony in home, office pressure, alcohol abuse, lack of sexual interest amongst the spouse, Monetary gains. The results were almost similar to the study conducted in year 2000, where majority of the males (57%) and the females (93.57%) were married.

Condoms were used in only few cases. 50% didn't take any precautionary measures owing to various reasons like- lack of sexual pleasure with condom, hesitation to go and buy condoms, hesitation to visit doctor for proper advice, unintentional sexual activity.<sup>12</sup> Few cases of pregnancy with STD were studied. All ANC cases were also screened for syphilis. Out of 20 cases, 19 have successful outcome.<sup>13</sup> Maximum cases seen during the study were of vaginal/cervical discharge. Often the females were reluctant to share their problem, owing to the social stigma attached. Most of the females complained of, only vaginal discharge, without any complaints of itching /pain/ burning. On examination, only 4% had erythema along with discharge.

Genital warts were second in the list. Almost equally, it was seen in both sexes. History of sexual contact was noted in almost all cases. Only 1 case of extremely painful genital wart was noted. Genital ulcer-herpetic, was seen in around 50 cases. 3 cases had recurrent history of genital ulcer. Around 11 cases of HIV/AIDs were seen.<sup>14</sup> They were under regular evaluation and under treatment.<sup>15</sup> HIV/AIDs patients were counseled about safe sex practices.<sup>16</sup>

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