Sexual Health and HIV Infection

HIV infection was probably introduced into India in the early 1980s and the epidemic has since been growing stealthily. The dominant mode of spread is through heterosexual intercourse. Commercial sex workers (CSWs) are almost certainly responsible for much of the spread of the infection. The HIV prevalence among CSWs in Mumbai increased from 3% in 1988 to 20% in 1990 and nearly 45% in 1993. Infection rates of up to 35% have been reported among CSWs from Tamil Nadu and similar trends have been observed in smaller cities, such as Pune, Vellore and Tirupati.[1]

Sexually transmitted diseases (STDs) are common in India. The relationship of STDs, particularly ulcerative conditions, to transmission of HIV infection is well known. HIV infection rates amongst patients with STDs tripled from 0.5% to 1.6% between 1991 and 1992.[2] Adolescents and young adults are particularly vulnerable.

The study by Kaur *et al.*, appearing in this issue of the journal,[3] draws attention to the sexual behaviour, evidence of drug use and the prevalence of hepatitis B virus (HBV) infection amongst students in Chandigarh. Of over 1300 participating students, 15% were sexually active. This seems a small percentage by western standards, but over 30% of them admitted to more than one sexual partner; most likely CSWs. Chandigarh, like other university cities, caters to foreign students. In 1989, 10 out of 500 students, primarily from Kenya, were found to be HIV-positive.[4] An even higher percentage was found in another study from Madras.[5] In the same survey only 1.6% students used drugs and only two of them by the intravenous (i.v.) route. This differs from the situation in Manipur which has a much higher incidence of i.v. drug use because of its proximity to the 'Golden Triangle' of Myanmar, Laos and Thailand.[6] Drug users can also transmit their infection sexually.

In the Madras study, 10.4% had evidence of past infection with HBV. Eleven per cent had donated blood at least once and one-third of these had suffered from jaundice in the past. While voluntarily donated blood may be screened for HIV infection in Chandigarh, this is not necessarily the case elsewhere.[6]

The results of the Chandigarh study are a cause for concern. One-tenth of the students surveyed had evidence of past infection with HBV. The authors allude to 'the likelihood of rapid spread of HIV infection when it enters this community'. The epidemiology of infection with HIV and HBV are similar and at least some of the students must have HIV infection as well. In the study, only 24% heterosexuals, 11% bisexuals and 7% homosexuals used condoms. The sexually active young are frequently optimistic in their belief that they will not acquire an STD. It is very difficult to put the 'safer sex' message across in India, where the population is likely to pass the one billion mark by the turn of the century. But undergraduates, at least, are amenable to education and surely it must be time to stop pussy-footing around and embark on a campaign of sexual health education, targeted at those in their late adolescent years and those engaged in higher education, rather than wondering when HIV infection will enter the community. It is clear that it is already there.

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