The incidence of syphilis in a tertiary care hospital in South India

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ABSTRACT

A study was done to know the incidence of syphilis in the teaching hospital of Bhaskar Medical College. 1600 samples were collected from the patients attending the hospital from January to December 2012. Rapid Plasma Reagin (RPR) testing was done. The incidence was found to be low (i.e., 0.12%). Prevalence of syphilis in pregnant women should be screened at the first antenatal visit, as syphilis is a major cause of abortion and poor pregnancy outcomes and congenital syphilis in the newborn.

Keywords: Syphilis, RPR, Incidence

INTRODUCTION

Treponema pallidum, the causative agent of syphilis, was discovered by Schaudinn and Hoffmann (1905) in the chancres and inguinal lymph nodes of syphilitic patients. Venereal syphilis is acquired by sexual contact. The spirochete enters the body through minute abrasions on the mucosa or skin. Infectivity of a patient to the sexual partner is maximum during the first two years of the disease—the primary, secondary and early latent stages. Sexually transmitted diseases (STDs) are a group of infectious or communicable diseases in which the primary mode of transmission is through sexual contact[1] and are among the major causes of illnesses in the world especially in the developing countries [2-3].

After five years, the risk is considered minimal. The infective dose is small, as few as 60 treponemes being capable of infecting 50 per cent of human volunteers. It multiplies at the site of entry. Its generation time is 30-33 hours. Clinical disease sets in after an incubation period of about a month(range 10-90 days). The clinical manifestations fall in to three stages—primary, secondary and tertiary.

In congenital syphilis , where infection is transmitted from mother to fetus transplacentally, the manifestations and course are different. Transplacental transmission can take place at any stage of pregnancy. A woman with early syphilis can infect her fetus much more commonly than one with syphilis of over two years duration.

MATERIALS AND METHODS

A total of 1600 samples were collected from selected patients attending hospital from January to December 2012. RPR testing was done on these samples, which was carried out using standard methods and quantitative methods was performed on positive samples. A positive RPR implies that the sample is positive for syphilis.
RESULTS

Out of 1600 samples collected from selected patients two were positive for syphilis (0.12%).

DISCUSSION

Venereal syphilis is worldwide in distribution. During the five centuries that it has been recorded and studied, the disease has undergone much variation in its natural history and clinical features. As originally described, it was a highly virulent disease with florid cutaneous manifestations. With the discovery of the dramatic therapeutic response to penicillin, it was hoped that it may even be possible to eradicate syphilis, as the disease has no extra human reservoir. STDs are characterized as hidden epidemics of tremendous health and economic consequences that can lead to pains, organs damage, and serious disabilities such as blindness, deafness, infertility, insanity, paralysis and even death [4-5].

According to Okonko IO et al study, 1.5% prevalence of Treponema pallidum (Syphilis) was reported[6]. However, not only has it not been possible to eliminate the disease but an increase has occurred in its incidence, due to changing customs, habits and values in society.

CONCLUSION

The advent of the AIDS pandemic has had an impact on syphilis. In most places, fear of AIDS and safer sex practices led to a fall in the incidence of syphilis and all STDs initially, but this trend did not continue everywhere. Concurrent infection with syphilis and HIV is common and may lead to earlier evolution of neurosyphilis.

REFERENCES

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