Received: 25.11.2011 Accepted: 13.1.2012

Letter to Editor

Epidemiological investigation of a fever outbreak in girls' hostel, Governmental Medical College

J Res Med Sci 2012; 17(1): 114-115

attendance.¹ Fever outbreaks are mostly due to malaria; some reveal different origin.² Dengue is endemic in India.³ Fever cases were reported daily from girls' hostel from 2nd September. Relevant history and investigation of Outdoor Patient Department cases was done for common causes of fever like malaria, typhoid, leptospirosis and dengue. Active surveillance was continued for twice maximum incubation period of dengue. Preventive measures like health education, elimination of mosquito breeding spots; hospitalisations and isolation of dengue cases were done.

Twenty one (15%) out of 140 students reported fever (Figure 1). Age of cases ranged from 17 to 21 years. Mean illness duration was 4 ± 1.7 days. Nine (43%) subjects gave history of travel to dengue endemic areas within 30 days. Tests for dengue by antibody detection technique were positive in 2 (9.5%) participants. Both cases were hospitalised with low

platelet count. Tests for other diseases were negative.

The clinical features were fever in all, body ache in 71%, headache in 52%, common cold or cough in 43%, sore throat in 34%, conjunctivitis in 5% and splenomegaly in 5%. Mosquito breeding was detected in 3 sites. The epidemic curve was indicative of propagated outbreak. Dengue fever is defined as 5 or more nonmalaria cases of fever per 1000 populations at a time. Tests for other diseases were negative. The population in college premises was more than 1000. Hence this outbreak can be called dengue outbreak.

Seroprevalence in other studies was 39.4%,⁴ 20%⁵ and 21%.¹ Less seroprevalence in present study was due to immediate preventive measures. Occurrence in monsoons was similar to other studies.^{3, 4}

The present outbreak was controlled by source reduction, fogging and health education

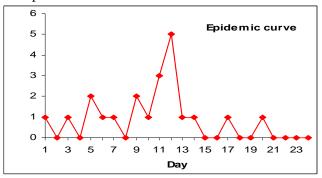


Figure 1. Epidemic curve of fever cases

<u>Ukey Ujwala,</u>¹Jaishree Naik,²Shekhar Rajderkar,³Sanjivani Langare⁴

Corresponding contributor: Dr.Ukey Ujwala E-mail: ujwalaukey@yahoo.co.in

¹⁻ Assistant Professor, Department of Preventive and Social Medicine, Governmental Medical College, Miraj, India.

²⁻ Associate Professor, Department of Preventive and Social Medicine, Governmental Medical College, Miraj, India.

³⁻ Professor, Department of Preventive and Social Medicine, Governmental Medical College, Miraj, India.

⁴⁻ Department of Preventive and Social Medicine, Governmental Medical College, Miraj, India

Letter to editor Ujwala et al

Conflict of Interests

Authors have no conflict of interests.

References

- 1. Doke P, Pawar S. Profile of Dengue fever outbreaks in Maharashtra. Indian J Community Med 2000; 25(4): 170-6.
- 2. Doke P, Thakur AP, Dama BM, Salunke GS, Tekade PB. Investigation report of an epidemic of Dengue fever. Indian J Community Me 1991; 16(3): 119-23.
- **3.** Park K. Arthropod borne infections. In: Park K, editor. Park's Textbook of Preventive and Social Medicine. 21st ed. Jabalpur: M/S Banarsidas Bhanot Publishers; 2011. p. 224-9.
- **4.** Lal M, Aggarwal A, Oberoi A. Dengue fever--an emerging viral fever in Ludhiana, North India. Indian J Public Health 2007; 51(3): 198-9.
- **5.** Paramasivan R, Thenmozhi V, Hiriyan J, Dhananjeyan K, Tyagi B, Dash AP. Serological and entomological investigations of an outbreak of dengue fever in certain rural areas of Kanyakumari district, Tamil Nadu. Indian J Med Res 2006; 123(5): 697-701.