Original Research Article

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Knowledge and attitudes towards tea garden labour with special reference to tuberculosis of Dibrugarh district, Assam, India

Anand Sharma^{1,2}*, Christ Forth Sangma¹

¹Regional Medical Research Centre, ICMR, NE Region, Dibrugarh, Assam-786004, India

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*Correspondence: Mr. Anand Sharma,

E-mail: anandsharmaicmr@gmail.com

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ABSTRACT

Background: Tuberculosis (TB) is preventable and curable though it is a global burden which remains enormous. TB is one of the major public health problems in tea garden labour. Low level of knowledge and attitudes towards TB could affect the health-seeking behavior of patients and sustain the transmission of the disease within the community. Methods: A population based cross-sectional study was carried out to assess the knowledge, attitude of tea garden labour of Dibrugarh district, Assam, India.

Results: 100 TB patients were interviewed in nine tea garden DOTS centre. Male and female distribution was 53% and 57% respectively. More than half of them were illiterate and 60 of them having 5-6 family size live in a congested environment. Chest pain i.e. 79% is the most common symptom experienced by the TB diagnosis which is followed by cough i.e. 76% and 33% were aware that it could spread through sneezing/cough. Tea garden hospital/tertiary centre was mentioned as a source of information about TB. Although most of them were positive about getting family support, 87% mentioned of separate utensils for food or drink and 88% got motivate by them to initiate treatment.

Conclusions: Knowledge regarding mode of transmission, symptoms and etiology were not sound properly among the tea garden labour. They need proper awareness regarding cause, transmission, prevention, etc.

Keywords: Attitude, Knowledge, TB, Tea garden labour

INTRODUCTION

Tuberculosis (TB) has remained a major killer disease, despite efforts to reduce its burden globally. India is the second-most populous country in the world. One fourth of the global incident Tuberculosis (TB) cases occur in India annually. Out of the estimated global annual incidence of 8.6 million TB cases, 2.3 million were estimated to have occurred in India. India's TB Control Programme is on track as far as reduction in disease burden is concerned. There is 42% reduction in TB mortality rate by 2012 as compared to 1990 level. Similarly there is 51% reduction in TB prevalence rate by 2012 as compared to 1990 level. Tuberculosis (TB) is one of the most important causes of mortality and morbidity in developing countries and is responsible for about 25% of all preventable deaths.² TB is the leading cause of death among all infectious diseases and WHO reported that in 2010 there were 1.1 million deaths among HIV negative people and an additional 0.35 million deaths from HIV associated tuberculosis.3 Assessment of knowledge, attitude, and practices in this region is essential to plan, implement, and evaluate advocacy, communication, and social mobilization network. This may improve the case detection rate and loss to follow up. The proportion of people who get tuberculosis each year is stable or falling down worldwide but because of population growth, the absolute number of new cases is

²Tata Institute of Social Sciences, Mumbai, Maharashtra, India

still increasing.^{3,4} In 2007, there were an estimated 13.7 million chronic active cases, 9.3 million new cases, and 1.8 million deaths, mostly in developing countries and among HIV- negative patients with TB.⁴ Tuberculosis (TB) remains a major challenge to global public health in the 21st century.

In Assam, particularly in the tea garden area the tuberculosis is one of the major health problems. Due to lack of adequate knowledge, illiteracy and awareness for TB the rate of prevalence is much higher among them. According to RNTCP Dibrugarh Analysis report, among 714 total numbers for TB patients in the District, out of which 292 are of tea garden community. Total number of successfully treated (cured + treatment completed) is 259 of which 12 numbers of deaths are found. 40% of TB patients are found in District among Tea Garden. Success rate among tea garden TB patients is 88%. Mortality rate among tea garden TB Patient is 4%.

METHODS

This cross-sectional descriptive study conducted during June to November 2015 in 9 different selected tea gardens of Dibrugarh district, Assam. Out of the 144 Tea gardens in the district there are only 82 numbers of tea gardens with DOT centers and for this purpose 9 DOT centers were selected as per our convenience and accessibility. The patient belonging to the age group ranging from 15 to 59 years, attending the selected DOT centers for their treatment was taken for the study by using structured questionnaire with proper informed consent from all respondents.

RESULTS

Total numbers of respondents were 100 constituting 43% male and 57% female respectively, and one-fourth i.e. 26% were within 30-34 years (Figure 1 and 2). Family size was more in 5-6 i.e. 60% among male and female, respectively (Figure 3). More than half of them were illiterate, i.e. 67% (Figure 4). About 44% stated that they get information from medical, followed by Tea garden hospital/DOTS Centre i.e. 41% (Figure 5).

Regarding symptoms of TB, Chest pain (i.e. 79%) is the most common symptom experienced by the TB diagnosis which is followed by cough i.e. 76% (Figure 6). About mode of transmission of disease 59% ignorant, 19% thought due to sneezing/coughing i.e.33% (Figure 7). 77% of them knew that TB can be cured and other 23% did not know whether it can be cured or not (Figure 8). About self-perception of being TB patient 97% got family support, 90% reported of separate rooms for living and 87% expressed as separate use of utensils (Figure 9). 88% of them are motivated to initiate treatment followed by household member i.e. 11% (Figure 10).

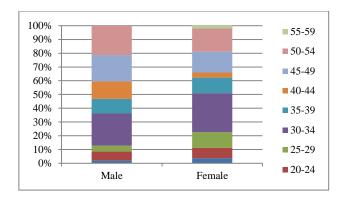


Figure 1: Distribution of sex ratio among the TB patient (N=100).

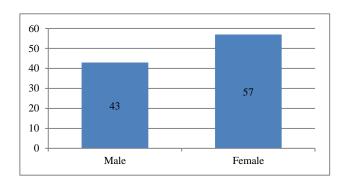


Figure 2: Distribution of sex population among the TB patient.

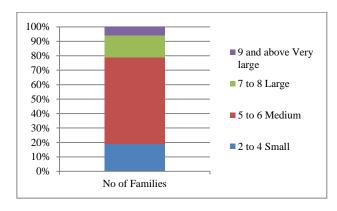


Figure 3: Distribution of family according to size among the TB patient.

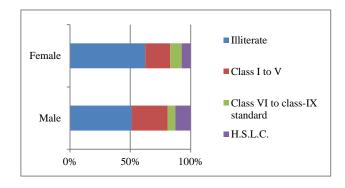


Figure 4: Distribution of education among the TB patient.

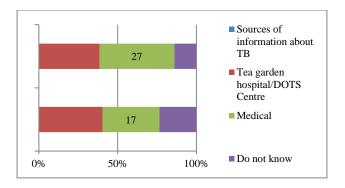


Figure 5: Sources of information about TB.

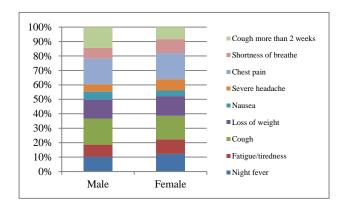


Figure 6: Symptoms experienced during TB diagnosis.

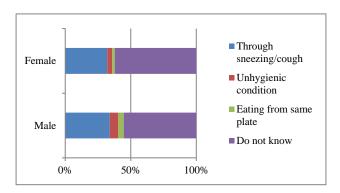


Figure 7: Knowledge on ways of transmission of diseases.

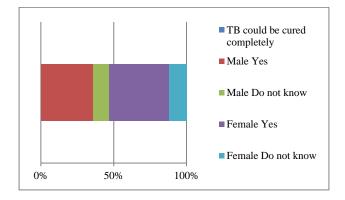


Figure 8: Perception about how TB would be cured.

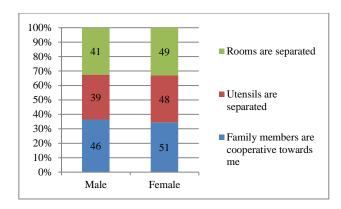


Figure 9: Perception on being a TB patient.

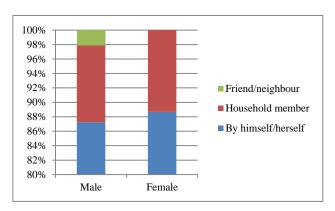


Figure 10: Motivation to initiate treatment.

DISCUSSION

In the present study, chest pain (i.e. 79%) is the most common symptom experienced by the TB diagnosis which is followed cough (76%). Cough and hemoptysis were known only to 66 versus 13 percent or 15 versus 8 percent of individuals in these two studies respectively.^{5,6} Another study indicated similar awareness on symptoms of tuberculosis among people; like cough and sputum (73.7%), weakness and breathlessness (40.4%), fever (34.3%) and hemoptysis (30.0%).⁷ In other study conducted on patient attending the DOTS centre at Safdarjung Hospital, New Delhi, fever (50.6%), cough (59.3%), weight loss (20.6%) etc were reported to be the main symptoms of tuberculosis known to the people.8 In another study conducted in rural population of Delhi, it was found that cough and sputum (73.7%), weakness and breathlessness (40.40%), fever (34.3%) etc were known to be the symptoms of tuberculosis among these people.⁷

In the present study from the tea garden labour of Dibrugarh District, Assam nearly 80-90% of the illiterates were unaware about TB. Only 57% of the participants were aware of the correct duration of treatment others either were not aware of it or mentioned it wrongly and the study from the rural area of Jaipur, Rajasthan, nearly 85-92% of the illiterates were unaware about different aspects of TB and they had several misconceptions towards the disease. 7.9.10

CONCLUSION

From the present study it may concluded that TB is a major problem among the tea garden labour. Knowledge regarding mode of transmission, symptoms and etiology were not sound properly among the tea garden labour. They need proper awareness regarding cause, transmission, prevention, etc.

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Ethical approval: The study was approved by the Institutional Ethics Committee, Research Council, TISS, Mumbai, Maharashtra, India

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