



Knowledge and Attitude toward Tuberculosis among Tuberculosis Patients Seeking Help in Diagnostic and Treatment Centers, Kabul Province in Afghanistan

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Dear Editor-in-Chief

Afghanistan is one of the 22 high TB burden countries and TB is a major public health problem. Current estimates show that the incidence of active TB cases is 278/100,000, mortality mounts to 15,000 cases/year (1). Correct knowledge and positive perception of the patients towards TB, and its management is pillars of success in TB control programme in any TB burden countries. Several factors influence TB outcome that the treatment well management is the one of most important. Knowledge about general management of tuberculosis has well been recognized as an important factor influencing compliance with tuberculosis treatment. A low knowledge on tuberculosis is a likely cause of the delay in seeking treatment.

Studies of the knowledge and attitude of tuberculosis patients about various aspects of TB in Afghanistan are lacking though TB is a major public health problem there. Our findings should enable the TB authorities to design and implement an intervention to the perception of TB in the community.

This cross sectional study was conducted in DOTS implementer health facilities. The study was conducted among all the 285 patients aged

+15 years currently under treatment for Pulmonary Tuberculosis, Kabul Province, Afghanistan. Patients were interviewed at the centers. Each interview was conducted at a time when patient came to receive anti tuberculosis treatment from the center. A questionnaire containing socio-demographic variables, knowledge and attitude of patients about the different event of tuberculosis was developed. Each interview lasted for about 30 minutes. The collected data was entered in SPSS₂₀ statistical package. Pearson Chi-square test was applied for testing associations between variables that, the distribution of knowledge and attitude was compared between categories of each socio-demographic variables, and general frequency of different variables, and descriptive analysis was done.

The research has been approved by Ethical Committee of Tehran University of Medical Sciences.

A total of 285 patients (+15) years suffering from pulmonary tuberculosis were interviewed. The minimum, maximum and mean score of knowledge was 1, 13, 9.47 ± 0.175 , satisfaction was, 38, 63, 52.65 ± 0.305 and attitude was, 2, 8, 4.96 ± 0.066 .

The association between knowledge with different age groups, gender, marital status, educational occupation and residency was significant; youngest age, male, single, literate employer and students and urban setting knowledge was higher than other relative groups. All variables such as education, genders, marital status, employee and residency with knowledge were significant relationship ($P<0.001$).

The association between attitude with gender, Education and Occupation were significant ($P<0.001$); the female, illiterate and housekeeper attitude was higher than other groups. The observation in this study that chronic cough 272 (95.4%) was considered as the main symptom of TB is a common knowledge in other TB burden countries such as Kenya, Tanzania, India, Kampala- Uganda (2-5). Majority of the patients 233 (81.8%) were aware regarding general view from tuberculosis. The tuberculosis patients have comprehensive knowledge on routes of transmission the situation was the same of other TB burden countries (2, 3, 6). They would seek treatment from Private practitioner if they became TB patients such as Manila, Philippines (7).

Majority of the participant 171 (60%) were under 34 years the same the study of Sudan (8). In first two groups the female patients were more than male but after 35 years the male patients were more than female the same to Split, Croatia (9-10). Other studies indicated that educational background, (8, 10) and residency (10) of respondent was important determinants of TB knowledge. This study also found that a low level of knowledge score was significantly associated with illiterate patients and rural area setting ($P<0.001$). Studies show that a greater knowledge level was observed among males and older age groups than female and younger age groups (8, 10). The female pregnant status was not observed in this study. Those patients which they were not marriage their knowledge was high (78.8%), ($P<0.001$). Majority of the tuberculosis patients have children in the house. Those patients who they were housekeeper and unemployment their knowledge was low and those patients who they were students or employment their knowledge were high. In the cases

of knowledge of tuberculosis, tribe and number of windows were not important in the knowledge of tuberculosis. Majority of the female, housewives, self-employment and illiterate have positive attitude to tuberculosis, ($P<0.001$). Majority of the Self-employment and house keeper have good conception about tuberculosis and those one which they were student or public employment they have misconception about tuberculosis, ($P<0.001$). It would be better to establish an appropriate control measure such as establishing proper information, education, and a communication pathway that indicate the level of severity of the disease.

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References

1. Khan IM, Laaser U (2002). Burden of tuberculosis in Afghanistan: update on a war-stricken country. *Croat Med J*, 43:245-7.
2. Mata JI (1985). Integrating the client's perspective in planning a tuberculosis education and treatment program in Honduras. *Med Anthropol*, 9:57-64.
3. Liefoghe R, Baliddawa JB, Kipruto EM, Vermeire C, De Munynck AO (1997). From their own perspective. A Kenyan community's perception of tuberculosis. *Trop Med Int Health*, 2:809-21.
4. Sekandi JN, Neuhauser D, Smyth K, Whalen CC (2009). Active case finding of undetected tuberculosis among chronic coughers in a slum setting in Kampala, Uganda. *Int J Tuberc Lung Dis*, 13:508-13.
5. Khan JA, Irfan M, Zaki A, Beg M, Hussain SF, Rizvi N (2006). Knowledge, attitude and misconceptions regarding tuberculosis in Pakistani patients. *J Pak Med Assoc*, 56:211-4.

6. Tasnim S, Rahman A, Hoque FM (2012). Patient's Knowledge and Attitude towards Tuberculosis in an Urban Setting. *Pulm Med*, 2012:352850.
7. Auer C, Sarol J, Jr., Tanner M, Weiss M (2000). Health seeking and perceived causes of tuberculosis among patients in Manila, Philippines. *Trop Med Int Health*, 5:648-56.
8. Mohamed A, Yousif M, Ottoa P, Bayoumi A (2007). Knowledge of tuberculosis: a survey among tuberculosis patients in Omdurman, Sudan. *Sudanese Journal of Public Health*, 2:21.
9. Jurcev Savicevic A, Popovic-Grle S, Milovac S, Ivcevic I, Vukasovic M, Viali V, Zivkovic K (2008). Tuberculosis knowledge among patients in out-patient settings in Split, Croatia. *Int J Tuberc Lung Dis*, 12:780-5.
10. Holmes CB, Hausler H, Nunn P (1998). A review of sex differences in the epidemiology of tuberculosis. *Int J Tuberc Lung Dis*, 2:96-104.