Isolated Tuberculosis of Thyroid Gland


Abstract
Involvement of thyroid gland with tuberculosis is extremely rare. The authors report a case of tuberculous thyroiditis.

Key Words
Tuberculosis, Thyroid gland.

Introduction
The thyroid gland is rarely affected by tuberculosis. It was once considered immune from the disease till Lebert in 1862 reported the involvement of the gland in a patient with disseminated tuberculosis. There have been relatively few cases reported in the literature since that time and almost all have been associated with tuberculosis elsewhere in the body. Isolated tuberculous involvement of the thyroid gland is extremely rare. The prevalence of the disease was first recognized when Coller and Huggins in 1926 discovered 5 cases of tuberculous thyroiditis in 1200 histopathological specimen of operated goiters (1). In India, where tuberculosis is so rampant, Bhadur et al. (2) could find only five authentic cases, three of which were reported already from the same institution (3,4).

Case Report
A 40-year-old female presented to the ENT OPD of Sher-i-Kashmir Institute of Medical Sciences, Medical College, Srinagar, with a painless mass in the right side of the neck, which had been present for 2 months and was gradually increasing in size. The patient gave history of intermittent fever for the last 10 days. There was no history of cough, haemoptysis or weight loss and no past history of tuberculosis. Patient's brother had received treatment for pulmonary tuberculosis one year back. The patient was admitted for investigations in September 2001.

Clinical features: Local examination of the neck revealed a well-defined mass of the right lobe of the thyroid measuring 5 x 4 cms, attached to the pretracheal fascia. Other ENT examination revealed a normal pharynx, larynx and postnasal space. Both the vocal cords were fully mobile. Systemic examination of the patient was normal.

Radiological features: X-ray chest showed only prominent bronchovascular markings with no evidence of pulmonary tuberculosis or tracheal shift. X-ray soft tissue of the neck lateral view was also normal.

Laboratory investigations: revealed Hb-7 gms with moderate hypochromia, ESR-63mm, TLC, DLC, within normal limits and normal thyroid function tests. Fine needle aspiration cytology of the swelling showed granulomata with epithelial and giant cells against a caseous background (Fig. 1).
The diagnosis of thyroid tuberculosis should not be difficult if the possibility of the disease, though rare is kept in mind. Demonstration of mycobacterium tuberculosis within the thyroid gland, a necrotic gland having epitheloid cell granulomas with Langhans giant cells and central caseation necrosis should confirm the diagnosis (7).

Though most reported cases of thyroid tuberculosis are found on the basis of surgical or autopsy specimens, fine needle aspiration cytology is currently used for the diagnosis of thyroid lesions and seems to be quite accurate (12).

In established cases patients respond adequately to anti tubercular therapy as in our case and usually no surgical intervention is required.

References