

Laryngeal tuberculosis and its outcome

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Abstract

Introduction: Tuberculosis is still one of the most common granulomatous diseases of the larynx. In the past, it commonly followed pulmonary tuberculosis. Among the risk factors identified are the consumption of tobacco, alcohol, malnutrition, immunodeficiency and being homeless. **Aims and Objectives:** To study Laryngeal Tuberculosis and its Outcome. **Methodology:** This was a hospital based cross-sectional study carried out at tertiary health care Centre with the patients diagnosed as Laryngeal tuberculosis by Otolaryngology department were admitted to ward and managed accordingly medical and necessary surgical management like tracheal dilation and Tracheostomy procedure were performed as per the protocols during the year June 2014 to June 2015 there were 45 patients studied during this time. Tabulations and Percentages used for the Presenting the Data. **Result:** We have found that the majority of the Patients were from >50- 35.55% followed by 40-50-20.00%, 30-40-15.55%, 20-30-13.33%, 10-20-8.88%, 1-10- 6.66%. Majority of the patients were Male 75.55% and Female 24.45%. The majority of the Patients presented with Stridor-35.55% followed by Dysphonia -17.77%. Dysphagia and odynophagia -15.55%, Throat pain -13.33%, Otalgia-8.88%, Fever-8.88%. The Majority of the Patients improved i.e. of 77.78% and 17.77% referred to Higher Centre for the further surgical management and prosthetic surgeries and Death occurred in 2 patient i.e. 4.44% mortality the reasons for the death was severe stridor. **Conclusion:** The majority of the Patients presented with complaining of Stridor followed by Dysphonia, Dysphagia and odynophagia, Throat pain, Otalgia, Fever. The Majority of the Patients improved i.e. of 77.78% and 4.44% mortality found in our study the reasons for mortality was severe stridor.

Keywords: Laryngeal Tuberculosis, Dysphonia, Odynophagia, Otalgia, Throat pain, Dysphagia.

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INTRODUCTION

Tuberculosis is still one of the most common granulomatous diseases of the larynx. In the past, it commonly followed pulmonary tuberculosis. Among the risk factors identified are the consumption of tobacco, alcohol, malnutrition, immunodeficiency and being homeless. The most common presenting symptom is hoarseness of voice, dysphagia or odynophagia, cough, weight loss, fever and night sweating. Laryngeal involvement affects the posterior portion of the true vocal cords, the arytenoid cartilages, and the intraarytenoid

space. However, in the past 20 years, this pattern of involvement has changed, and most patients with laryngeal tuberculosis nowadays present without history of pulmonary tuberculosis¹⁻⁴. A nodular, exophytic lesion or an area of mucosal ulceration, which can both be mistaken for carcinoma, perichondritis, nonspecific laryngitis, oedema, pseudoepitheliomatous hyperplasia or shrinking of epiglottis is often seen. Prompt diagnosis depends on clinical suspicion, careful medical history and history of predisposing factors, together with laryngeal and chest examination. The characteristic findings on chest radiography are apical cavitations and infiltrations. Recently, it has been reported that laryngeal involvement is more commonly caused by hematogenous or lymphatic spread of the organism⁵. The clinical patterns seen in the presented cases agree with the recent findings where laryngeal TB presented chiefly with laryngeal symptoms such as hoarseness, odynophagia, and dysphagia⁶⁻¹⁰.

MATERIAL AND METHODS

This was a hospital based cross-sectional study carried out at tertiary health care Centre with the patients

diagnosed as Laryngeal tuberculosis by Otolaryngology department were admitted to ward and managed accordingly medical and necessary surgical management like tracheal dilation and Tracheostomy procedure were performed as per the protocols during the year June 2014 to June 2015 there were 45 patients studied during this time. Tabulations and Percentages used for the Presenting the Data.

RESULT

Table 1: Distribution of the Patients as per the Presenting Clinical features

Clinical Feature	No.	Percentage
Stridor	16	35.55%
Dysphagia and odynophagia	7	15.55%
Dysphonia	8	17.77%
Throat pain	6	13.33%
Otalgia	4	8.88%
Fever	4	8.88%
Total	45	100%

The majority of the Patients presented with Stridor-35.55% followed by Dysphonia -17.77%. Dysphagia and odynophagia -15.55%, Throat pain -13.33%, Otalgia-8.88%, Fever-8.88%.

Table 2: Distribution of the Patients as per the Outcome

Outcome	No.	Percentage
Improved	35	77.78%
Death	2	4.44%
Referred to Higher Centre	8	17.77%
Total	45	100%

The Majority of the Patients improved i.e. of 77.78% and 17.77% referred to Higher Centre for the further surgical management and prosthetic surgeries and Death occurred in 2 patient i.e. 4.44% mortality the reasons for the death severe stridor.

DISCUSSION

Alcohol abuse, smoking, and poor living conditions were confirmed as principal predisposing factors. Indirect laryngoscopy in each of the presented cases revealed involvement of the whole larynx, contrary to predominantly the posterior larynx involvement reported in the past¹². Recent literature also reveals an increased involvement of the anterior larynx^{11, 13}. The varied nature of laryngeal TB can be demonstrated on the appearance on indirect laryngoscopy like Multiple nonspecific inflammatory lesions multiple ulcerative and granulomatous lesions. Due to the known risks associated with direct laryngoscopy to the patient and operating personnel¹⁴, the use of direct laryngoscopy in diagnosing laryngeal TB remains a contentious issue. Some authors believe that direct laryngoscopy should be limited to the cases in which a patient fails to promptly respond to

antituberculous therapy¹⁵. In our study we have found that the majority of the Patients were from >50- 35.55% followed by 40-50-20.00%, 30-40-15.55%, 20-30-13.33%, 10-20-8.88%, 1-10- 6.66%. Majority of the patients were Male 75.55% and Female 24.45%. The majority of the Patients presented with Stridor-35.55% followed by Dysphonia -17.77%. Dysphagia and odynophagia -15.55%, Throat pain -13.33%, Otalgia-8.88%, Fever-8.88%. The Majority of the Patients improved i.e. of 77.78% and 17.77% referred to Higher Centre for the further surgical management and prosthetic surgeries and Death occurred in 2 patient i.e. 4.44% mortality the reasons for the death severe stridor. The patients of stridor require emergency tracheostomy and absence or delay in the procedure may be cause serious complications and death also whenever necessary the tracheostomy procedure should be performed.

CONCLUSION

The majority of the Patients presented with complaining of Stridor followed by Dysphonia, Dysphagia and odynophagia, Throat pain, Otalgia, Fever. The Majority of the Patients improved i.e. of 77.78% and 4.44% mortality found in our study the reasons for mortality was severe stridor.

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