

Introduction

The palatine tonsils represent the largest accumulations of lymphoid tissue in the Waldeyer's ring in contrast to lingual and pharyngeal tonsils, constitutes a compact body with a definite thin capsule on its deep surface. (*Hollinsheed WH; 1982*)

Tonsillar disease is one of the most common disorders in the field of Otolaryngology. (*Jin Hyeok Jeong et al; 2007*)

Chronic tonsillitis is the most common disease in throat that occurs predominantly in the younger age group.(*Wiatrak and Woolley ; 1998*)

The disease is diagnosed mainly by history and clinical examination. Meanwhile, superficial tonsillar swabs are often used as a guide in the selection of therapy in acute and recurrent tonsillitis. However, their use may lead to incorrect conclusions, since several studies indicate a marked discrepancy in the external and the core tonsillar pathogenic flora. (*Kurien et al; 2000 and Timon et al ; 1991*)

To confirm the exact causative bacteria for these disorders, bacterial cultures from tonsillar core extracts after tonsillectomy

are more important than bacterial cultures from the tonsillar surface with a cotton swab.(*Mitchelmore IJ ; et al 1994*)

Determination of the core bacteriology is important for several reasons. Failure to eradicate pathogens in the core, whether it is from inappropriate antibiotic choice or from insufficient penetration into the core, will allow persistence of core infection or reinoculation of initially surface.

Failure to achieve bacterial level of the antibiotic inside the tonsil results in bacterial survival .(*Kurien et al ; 2000*)

The organisms recovered from the tonsillar core differ from those recovered from the tonsillar surface and may represent true pathogens.(*Itzhak Brook ; et al 1995*)

Hypertrophied and chronically infected tonsils and adenoids have increased loads of pathogenic bacteria especially beta lactamase producers, as compared with non diseased tonsils and adenoids. (*Brodsky L ; et al 2007*)

Not all cases of chronic tonsillitis and recurrent tonsillitis have tonsillar hypertrophy so bacteriology of the core is beneficial. (*Jin HJ; et al 2007*)

Much controversy remains over either bacterial differences exist between the tonsils of recurrent tonsillitis and tonsillar hypertrophy groups.(*Kielovitch IH; et al 1989*)

Many strains of bacteria which harbor within the core may produce beta-lactamase and therefore capable of enzymatically inactivating penicillin. (*Surrow et al; 1989 and Timon et al ; 19991*)

More than true different beta-lactamase producing bacteria strains were cultured in the tonsils of recurrent tonsillitis patients.(*Brook I, Yokum P ; et al 1983*)

H.influenza was common in tonsillar hypertrophy. (*Van Staaij; et al 2003*)

Tonsillectomy is indicated in recurrent acute tonsillitis for at least two years with five or more acute attacks per year, the procedure may be associated with transient bacteremia in some cases which is not associated with any enhanced post-operative morbidity. (*Ilhami et al; 2003*).