

Ankyloglossia: A Case Report

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ABSTRACT

Ankyloglossia is also commonly known as tongue -tie. It may be either partial or complete and may lead to various difficulties and deformities which include abnormal speech, mal-occlusion and inability in deglutination. Thus leads to undesired problems in normal life. Here we present a case report of Ankyloglossia in 11 years old male child.

Key Words: Ankyloglossia, tongue tie, lingual frenum, frenectomy

INTRODUCTION

The term Ankyloglossia is derived from Greek word agkylos-“crooked”, glossia-“tongue”. Partial Ankyloglossia also called as tongue tie is a condition caused by abnormally short frenum of the tongue or the frenum is attached too close to the tip of the tongue (1). It can lead to various functional abnormalities that may include abnormal speech, malocclusion, and inability to swallow the food. Speech problems can be a major concern when there is limited mobility of the tongue due to ankyloglossia. The incidence of tongue tie varies from 0.2%-5%, with a male predilection. It may be partial or complete tongue, although both require surgical correction.

CASE REPORT

An 11 years old male patient reported to the Shri Ganesh dental clinic with chief complaint of difficulty in speaking and difficulty during the intake of food. He also complained of restricted tongue movement. On extraoral examination there is no significant finding noted. On intra oral examination there was restricted tongue movement (Figure 1, 2).



Figure 1: Intraoral view of showing thick band of lingual frenulum.



Figure 2: Restricted movement of tongue.

No family history of tongue tie was found. His speech was normal. After complete blood investigation, surgical excision of lingual frenum was done under local anaesthesia (Figure 3, 4). Sutures were given (Figure 5). Healing was uneventful.



Figure 3: Thick band is held with artery forceps.



Figure 4: Simple excision of thick band with scalpel.

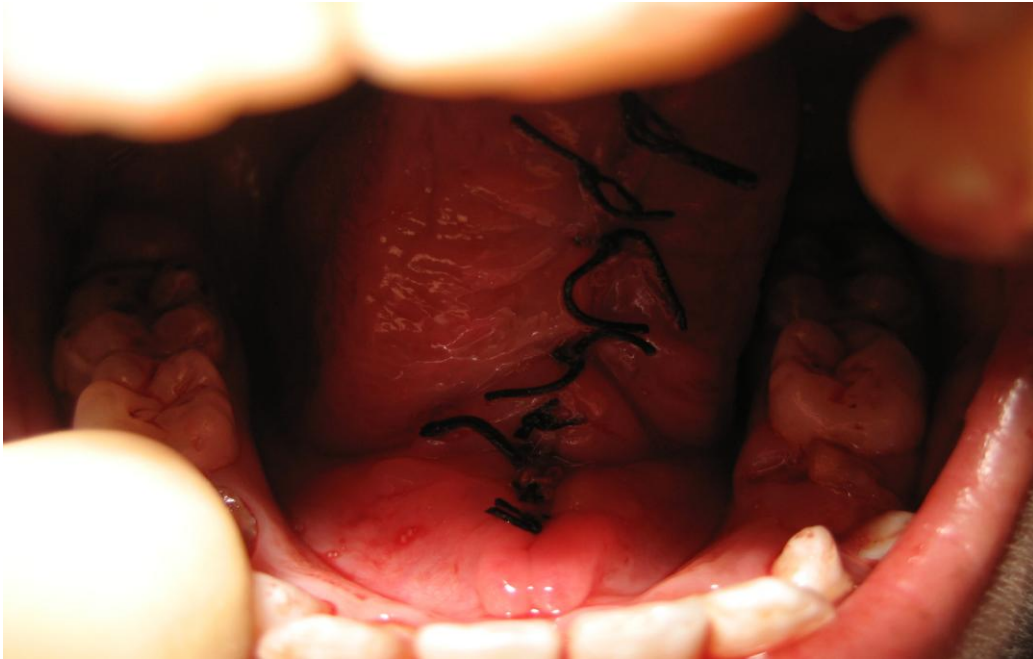


Figure 5: Surgical site closure using interrupted sutures.

DISCUSSION

The tongue is a vital organ of body with important functions including deglutition, mastication and speech. It also exerts a major influence on the occlusion and growth of the jaws. Ankyloglossia occurs due to failure in cellular degeneration leading to longer anchorage between tongue and floor of the mouth (2). It was also found associated in rare syndromes such as Van der Woude syndrome, X-linked cleft palate syndrome, Opitz syndrome and Kindler syndrome (2). The major problem associated with the tongue tie includes speech difficulty especially in pronunciation of consonants like “s,z,t,d,l,j,zh,ch,th,dg” (3). Ankyloglossia can be classified based on kotlow’s assessment (4);

Class I: Mild ankyloglossia: 12 to 16mm

Class II: moderate ankyloglossia: 8 to 11mm

Class III: Severe ankyloglossia: 3 to 7mm

Class IV: Complete ankyloglossia: less than 3mm

Because most cases of ankyloglossia result in few or no clinical problems, treatment is often unnecessary. Infants with specific breast feeding problems, a frenotomy (“clipping” or simple release of the frenulum) can be performed. In children or adults with associated functional or periodontal difficulties, a frenoplasty (release with plastic repair) may allow greater freedom of tongue movement. In young children it is often recommended to postpone the surgery till the age of 4 or 5. Because the tongue is always short at the birth, assessing the degree of tongue limitation caused by ankyloglossia is difficult in the infant’s early life. As the infant grows, the tongue becomes longer and thinner at the tip, often decreasing the severity of the tongue tie. The use of laser in the treatment of ankyloglossia makes it safe and minimally invasive procedure. It has advantage over conventional treatment as it bactericidal, provide bloodless field and don’t require sutures or anaesthesia. Moreover, it is fast and safe without significant post surgical complications (5).

CONCLUSION

Tongue tie or ankyloglossia affects quite a number of infants and children. It causes improper chewing and swallowing of food which in turn increases the gastric distress and bloating, snoring and bed wetting at sleep. Dental caries, periodontal problems and development of anterior open bite can occurs due to long tongue thrust. Therefore, it is important that accurate information and guidance should be given to the parents so that appropriate treatment could be done for infant and children at early as possible.



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