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# EAGLE'S SYNDROME: A CASE REPORT OF UNILATERAL ELONGATED STYLOID PROCESS

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### ABSTRACT

Eagle syndrome is a condition, when styloid process is elongated or presence of calcified styloid ligament which leads to pain in head and neck region. In this report we discuss about the case of 26year old male patient with unilaterally elongated styloid process.

**KEYWORDS:** In this report we discuss about the case of 26year old male patient with unilaterally elongated styloid process.

### INTRODUCTION

The styloid process Is a pointed, Lean, bony projection situated at the front of stylomastoid foramen and arises from the temporal bone. Eagle's syndrome also known as stylalgia is caused due to elongated ossified styloid process. In 1652 the first one to describe the ossifying process of styloid ligament is Piertro Marchetti. Eagle is a otorhinolaryngologist in 1937 described a syndrome characterised by the elongation of styloid process and pain in the cervicofacial region. The average length of the styloid process is 20-30mm long. If the length of styloid process is 30mm, it is considered as Eagle's syndrome. The prevalence is about 4% of population is asymptomatic and between 4% and 10% patients experience symptoms. Comparing to man, women are most commonly affected within average age of 40years. Eagle primarily described 2 syndromes: classic styloid syndrome after tonsillectomy and styloidcarotid syndrome not related to tonsillectomy. The most common symptoms include dull aching pain in throat, dysphasia, foreign body sensation in the throat, facial pain, recurrent headaches and vertigo. These symptoms mimic maxillofacial and oropharyngeal disorders like neuralgia, hence proper clinical history, examination and radiological assessment is necessary for correct diagnosis.

## CASE REPORT

A 26 year old male patient reported to the department of oral medicine and radiology of Tagore dental college and hospital with the chief complaint of pain in the left side of the jaw and neck region for the past 6 months. On questioning the patient, he gives a history of pain which is gradual, stabbing in nature and radiating towards the neck and ear. The pain aggravates on wide open in of mouth and relieves at rest. Patient also gives history of difficulty in swallowing.

On general examination all the vitals are in normal range and no specific systemic abnormalities were detected. On extraoral examination there is no gross facial asymmetry detected and absence of palpable lymph nodes in the head and neck region. On intraoral examination patient had FPD in relation to 11.12.21.22, missing of 36, 46, impacted 28, partially impacted 28, grossly decay in 27, 17, dental caries in 46,16,47 and dental caries with apical periodontitis 27. in Patient is advised for Orthopantamogram. OPG reveals elongated styloid process on the left side approximately measures 46.38mm which is suggestive of eagles syndrome. Patient is advised for surgical excision of elongated styloid process. a patient did not report back.



### DISCUSSION

Elongation of the styloid process or calcified styloid ligament is called eagle syndrome. Eagle reported about around 200 cases over a period of 20 years and defined that the normal length of the styloid process is around 2.5cm to 3cm, even mild deviation of styloid process towards medial aspect can lead to symptom of severe atypical facial pain. eagle's classified this syndrome into two types. The classic type and carotid type. In classic type pain occurs after tonsillectomy, the scar under the tonsillar fossa compresses V,VII,IX,X cranial nerves causing dysphasia, the feeling of having foreign object in the throat. In carotid type, the symptoms are headache and nerve problems due to inflammation of sympathetic nerve plexus. In this case, the patient had the symptoms of carotid type. The etiology and pathogenesis of this disease is still controversial. It is hypothesized that the pain is due to compression of the glossopharyngeal nerve. The mean duration of symptoms is 14 months. The mean age is 30-40 years. Most common in females compared to males. Occurrence in young patients is rare. The differential diagnosis are migraine, trigeminal neuralgia, temporal arthritis, myofascial pain syndrome, cervical arthritis. As for the diagnosis, complete history, clinical examination of head and neck region is more important. On palpitation the tip of the styloid process can be palpated at the level of tonsillar fossa. It is a hard bony spicules which cause tenderness and associated symptoms. Investigations include OPG, lateral cephalogram, CT, CBCT, Townes projection, lateral oblique view of mandible. In this case we have only OPG. As for the treatment of eagles syndrome, conservatives treatment include non steroidal antiinflammatory drugs, corticosteroid injection, local anesthesia into the tonsillar fossa. the surgical approach is quite conclusive. Surgical styloidectomy has cure rate of 80%. In this case patient is advised for surgical excision of styloid process, but the patient did not reported back yet.

#### CONCLUSION

The occurrence of unilateral elongation of styloid process in young patients are usually rare. The diagnosis is much important and all the dentist must be aware of the treatment of orofacial pain to include it in the differential diagnosis of eagles syndrome.

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