



Pleomorphic Adenoma of Hard Palate

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ABSTRACT

Pleomorphic adenoma is the most common benign salivary gland tumor which commonly affects the parotid gland. Minor salivary glands of the palate can be involved, which is the most common intraoral site affected. Pleomorphic adenoma contains both epithelial and myoepithelial cells hence they are referred to as benign mixed tumors. Here we report a case of a female who presented with swelling in the hard palate, which was diagnosed as pleomorphic adenoma.

Key Words: Palatal swelling, benign tumor, pleomorphic adenoma, minor salivary gland, hard palate.

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INTRODUCTION:

Around 10-25% of salivary gland tumors arise from the minor salivary glands. Pleomorphic adenoma is a benign tumor that accounts for about 40-70% of tumors [1]. It is more commonly seen among females in the fifth to sixth decades of their life [2]. The parotid gland is the most common major salivary gland involved. The palate is the most common intraoral location affected, followed by the upper lip, cheek, floor of the mouth, larynx, and trachea [3]. It presents as a painless, slow-growing, firm swelling in the palate and can interfere with speech and mastication [4]. The treatment is essentially surgical excision [5].

Case Presentation:

A 54-year-old female presented with a chief complaint of swelling in the hard palate since childhood, which was painless, gradually increasing in size to the present size. The patient had difficulty in chewing and swallowing. The patient had no history of trauma, discharge from swelling, fever, or similar swelling anywhere else in the body. The patient had no relevant past medical or surgical history.

General examination of the patient was normal. There was no cervical lymphadenopathy.

On intra-oral examination, a single swelling of size 4*3 cm was noted in the left side of the hard palate, mucosa over the swelling was normal. On palpation, the swelling was non-tender, firm, non-mobile, non-fluctuant, and margins were regular. The mucosa over the swelling was stretched and non-pinchable (Figure 1).



Figure1: Swelling in left side of hard palate.

Computed tomography showed well well-defined soft tissue density lesion of size 3.3*2.6*2.2 cm noted involving the mucosal aspect of the left half of the palate (Figure 2).

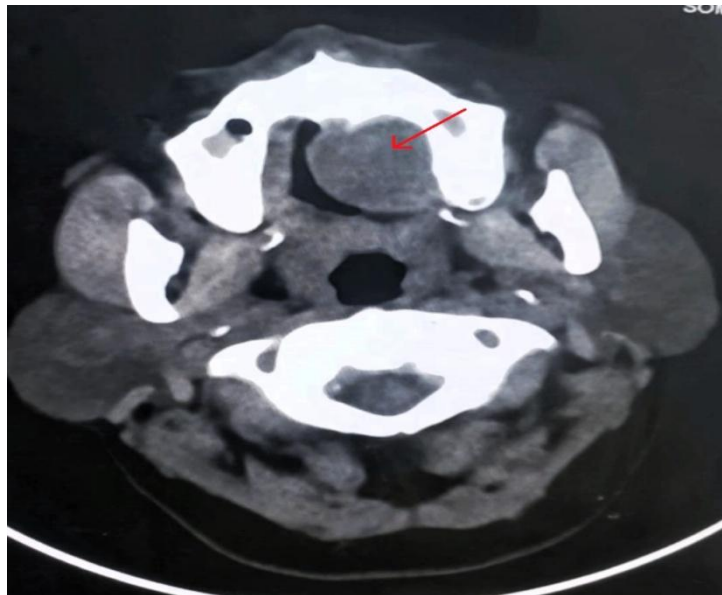


Figure 2: Computed Tomography scan (axial view) showing soft tissue density lesion involving mucosal aspect of left half of the palate (red arrow).

FNAC of swelling revealed epithelial cells of salivary gland origin along with myoepithelial cells, suggestive of benign salivary gland lesion.

Patients' blood investigations were within normal limits.

The patient was posted for excision of the lesion under general anesthesia with nasoendotracheal intubation (Figure 3). Complete excision of the mass was done and sent for histopathological examination. Postoperatively feeding was by nasogastric tube for the first three days. Postoperative care with antibiotics and betadine local care was given.



Figure 3: Intraoperative view

The histopathological examination of the surgical specimen showed tumor consisting of salivary ductile and epithelial components scattered haphazardly in a chondromyxoid background (Figure 4), which was suggestive of Pleomorphic adenoma.

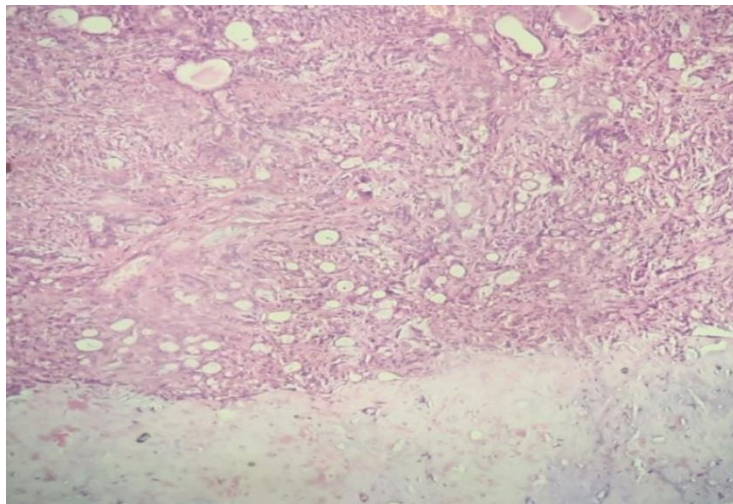


Figure 4: Histological examination of the surgical specimen showing salivary ductile and epithelial components scattered haphazardly in chondromyxoid background.

The patient is followed up monthly (Figure 5), there is no evidence of recurrence till date.



Figure 5: Postoperative picture at the end of three months.

DISCUSSION:

Pleomorphic adenoma shows both mesenchymal and epithelial differentiation. Because of their remarkable histological diversities, they are known as mixed tumors. They show varying degrees of myxoid, hyaline, chondroid, and osseous tissue along with epithelial elements.

It most commonly involves the parotid gland. Women in the fifth to sixth decades of life are more commonly affected than men [2]. The reported case is a female in the fifth decade, which is in accordance with the literature. As the palate has the highest concentration of minor salivary glands, it is the most common site of minor salivary gland tumors. It can also involve the upper lip [6].

In the palate, it presents as a firm, painless, smooth dome-shaped mass with intact overlying mucosa [4]. Due to the inelasticity of palatal mucosa, pleomorphic adenoma of the palate appears fixed to the bone and distended by tumor mass.

Imaging like a CT scan helps to assess the extent of the lesion and also to evaluate the involvement of the bone [7].

Wide excision with negative margins is the optimal strategy for the management of pleomorphic adenomas [8]. To prevent recurrence, adequate removal of tumor with normal tissue is necessary, as these tumors have pseudopods-like extensions into the surrounding tissue. These tumors usually do not recur after adequate surgical excision.

Conclusion:

Minor salivary gland tumors are mostly malignant in nature. Among the benign tumors, pleomorphic adenoma is the commonest. The possibility of pleomorphic adenoma should be considered in a case of palatal swelling. Definitive diagnosis is by histopathological examination. Surgical excision with wide margins can prevent recurrences in the future.

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