

Squamous Papilloma – A Case Report

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Abstract-

Oral squamous papilloma (OSP) is a benign tumor and it is one of the most common lesions of the oral mucosa usually seen in hard and soft palate of adults. It is mostly asymptomatic with slow progressive changes in size. It often raises suspicion of malignancy in clinicians and patients and can lead to inappropriate management. Squamous papilloma are common lesions of the oral mucosa with a predilection for the mucosa of the hard and soft palate. As an oral lesion, it raises concern because of its clinical appearance, which may mimic exophytic carcinoma, verrucous carcinoma or condyloma acuminatum. It is related to human papilloma virus even though the controversy regarding its pathogenesis still exists. It most often occurs on the tongue and the hard palate. It is important to diagnose it correctly as it may mimic malignant lesions. This article describes a case of squamous papilloma in the oral cavity.

Keywords –Oral squamous papilloma , White keratotic lesion, Ulceroproliferative tissue, Verrucous carcinoma.

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I. Introduction

The worldwide updated cancer prevalence reported an increase in the incidence of oral cancer ¹. Despite that, it was regarded as the sixth most common cancer worldwide ². Oral squamous cell carcinoma accounts for 90% of the histologic type of oral cancer ³. And may or may not be preceded by oral potentially malignant disorders. OSP clinically is a benign lesion which proliferates on being provoked by human papilloma virus. These lesions are slow growing, painless causing discomfort and irritation during oral physiological processes⁴. OSP appears as verrucous growth. They present as exophytic mass in the oral cavity induced by human papilloma virus. They are benign proliferations of the stratified squamous epithelium. The World Health Organization defines papilloma as “a range of localized hyperplastic exophytic and polypoid lesions of hyperplastic epithelium with a verrucous or cauliflower-like morphology.”⁵ The sites of predilection include tongue, soft

SQUAMOUS PAPILOMA – A CASE REPORT

palate, and uvula, but any surfaces of the oral cavity can be affected.⁶ OSP are reported frequently in children but it may affect any age group; 7 to 8% of all oral masses or growths in children comprise OSP.

II. Case Report

A 35 year old male reported to the out patient Department of Oral Medicine and Radiology, IDS, Bareilly, UP with the chief complaint of pain in right upper back teeth region since 1 month. Patient was apparently asymptomatic 1 month back, when he experienced pain in right upper back region of jaw. Pain was sudden in onset, dull in character and intermittent in nature. Pain was associated with mobility of tooth in the same region; thereafter he noticed swelling. Initially swelling was smaller in size and progressed to its present size gradually. The medical and family history were non contributory. Patient had habit of chewing tobacco, arecanut and smoking two to three times a day since 6 years. The patient had a habit of keeping tobacco quid in right labial vestibule of mouth since 6 years.



FIGURE NO.1-Swelling is present on right side of the lower third of face

On Intra oral examination: Multiple white keratotic lesion with small papillary projection from the surface of lesion was seen on the right upper posterior tooth region measuring about 3*4cm in its greatest dimension extending from 14 tooth region to distal aspect of 14 - 18 region and in the mid buccal region on right buccal mucosa. The surface was greyish white with some ulceroproliferative tissue over it. All inspeactory findings were confirmed. On palpation, the lesion was non-tender, it was non-scrapable and leathery in consistency, associated with bleeding while scratching the mucosa and there were no lymphadenopathy associated. On the basis of clinical findings, provisional diagnosis of this case was given as verrucous carcinoma of the right buccal mucosa involving alveolar ridge extending from 14 to 18 tooth region. The differential diagnosis of verrucous carcinoma includes papillary squamous cell carcinoma, squamous carcinoma and verrucous hyperplasia.

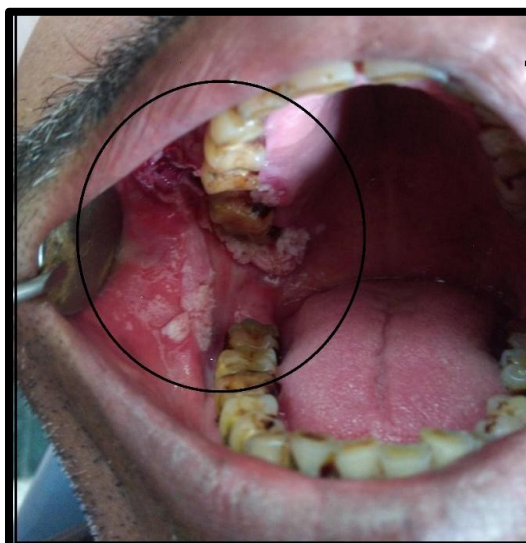


FIGURE NO. 2 – Exophytic growth present on 14 – 18 tooth region on the right buccal mucosa involving alveolar ridge

For further evaluation, patient was advised investigations that were biopsy and orthopantomograph (OPG).

The OPG revealed advanced horizontal bone loss in the apical third of the mesial root of 18 tooth region with missing 16, 36 tooth. Floating or hanging teeth appearance was noted in the same region. There was no other significant finding in the radiograph. On the basis of radiographic features, radiographic diagnosis was verrucous carcinoma of the mandibular labial vestibule and right buccal mucosa extending into floor of mouth involving the alveolus. Incisional biopsy of right buccal mucosa was done and the excised lesion sent for histopathological examination. On histopathological examination, a lesional tissue lined by stratified squamous epithelium showing hyperkeratosis and parakeratosis, corneal neutrophilic collection, papillomatosis and irregular acanthosis was seen. Very scant subepithelium was included in the biopsy. There was no evidence of dysplasia in the section examined. Based on clinical, radiographic and histopathological findings a final diagnosis of Squamous papilloma of the right buccal mucosa involving 14 and 18 tooth region and alveolar ridge was given.



FIGURE NO. 3 – OPG

III. Discussion

OSP is a generic term that is used to include papillary and verrucous growths composed of benign epithelium and minor amounts of supporting connective tissue. The squamous papilloma is associated with human papilloma virus (HPV) types 6, and 11⁷. OSP, including the vermilion portion of the lip, is the most common papillary lesion of the oral mucosa and makes up approximately 2.5% of all oral lesions. Whether all intra OSPs are related etiologically to classic cutaneous verruca vulgaris⁸.

OSP are benign, asymptomatic exophytic masses of the oral cavity often raising concerns due to its clinical appearance. It is usually seen as an exophytic lesion with a white surface and are mostly pedunculated, but sometimes may be found to be sessile.⁹ This lesion was first described by Tomes as gingi of val “wart” in 1848.¹⁰ Few authors believe that the term (OSP) is generically used for verrucous growths composed of benign epithelium and small amount of connective tissue⁹. The most common malignant neoplasm of the oral cavity is squamous cell carcinoma. According to recent estimates, both the annual incidence rates of the disease and the mortality rates have not decreased in recent years, still representing a serious public health problem. The disease is in fact characterized by considerable local aggression and an often-poor prognosis, with a five-year survival ranging from 59.4% to 67%.¹¹

The clinical appearance of verruciform xanthoma is similar to squamous papilloma., OSPs may be found on the vermilion portion of the lips and any intraoral mucosal site, with a predilection for the hard and soft palate and the uvula¹². In our case, the lesion is seen on posterior region of hard palate and right buccal mucosa involving 16,17,18 tooth region. The lesions generally measuring about 4*3 cm in range and appear as pink-to-white exophytic granular or cauliflower like surface alterations. The lesions are generally asymptomatic as was in the present case. OSP are traditionally divided into two types: isolated-solitary and multiple-recurring. The former is usually found in an adult's oral cavity, while the latter is mostly found in a child's laryngotracheobronchial complex. The isolated-solitary lesions are exophytic, pedunculated growths that resemble a cauliflower in appearance. They are usually white, but can occasionally be pink. Based on these clinical features, the growth was provisionally diagnosed as verrucous carcinoma..

Carneiro et al¹³. demonstrated some strict histopathologic criteria: (i) finger-like projection of squamous epithelium, (ii) hyperkeratosis and normal maturation process, and (iii) perinuclear cytoplasmic vacuolation. On examination, it revealed a cauliflower-like nontender, asymptomatic growth.¹³ Diagnosis

involves various techniques such as cytology, biopsy, immunohistochemistry and molecular techniques. As it can be challenging because of its clinical similarities to other epithelial lesions, like condyloma acuminatum and verruca vulgaris. In our case, the diagnostic method we used was biopsy. The differential diagnosis of OSP, when solitary, includes verruciform xanthoma, papillary hyperplasia, and condyloma acuminatum. Verruciform xanthoma may resemble squamous papilloma, although this lesion has a distinct predilection for the gingiva and the alveolar ridge.¹⁴

Histological examination revealed squamous epithelium with parakeratosis, hyperkeratosis, corneal neutrophilic collection, papillomatosis and irregular acanthosis. Very scant subepithelium is included in the biopsy. There is no evidence of dysplasia in the sectioned examined. Histological features are suggestive of SQUAMOUS PAPILOMA of right buccal mucosa involving 14 and 18 tooth region and alveolar region.

Various treatment modalities for OSP include laser ablation, cryotherapy, cold-steel excision, electrocautery, intralesional injections of interferon, salicylic acid application and conservative surgical excision.¹¹ The rate of recurrence of solitary lesions is low compared to multiple lesions which show a different behavior clinically. The malignant transformation rate ranges from 4.5%-9%.¹⁵ A decreased prevalence of SP may result in future, against types 6 and 11. Two vaccines have been developed: Cervarix and Gardasil that can prevent infections and precancerous lesion caused by HPV infection.⁹

IV. Conclusion

Squamous papillary lesions are rare in young age group, but must be diagnosed appropriately so that growth of such lesions can be checked at an early stage and it can be well managed. Though Squamous Papillomas are common lesions of the oral cavity, their occurrence on the hard palate is rare, and its histopathological features overlap with a number of other verrucopapillary lesions. Hence, differentiating papillomas from other lesions is important. Recurrence is uncommon, except for lesions in patients infected with human immunodeficiency virus (HIV).

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