CASE REPORT

A RARE CASE OF VASCULAR HAMARTOMA OF NASAL CAVITY

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ABSTRACT: Sinonasal tract is complex anatomical site with a large list of possible diagnoses. Most common ones being sinonasal polyposis and papillomas. Occasionally there may be mass lesions that are difficult to conclude. This case report describes one such case where it was difficult to conclude.

INTRODUCTION: The sinonasal tract is home to a dizzying array of reactive, benign neoplastic and malignant entities and differentiating these can be difficult owing to the limited nature of biopsies from this site that are encountered in E.N.T practice. Most of these consist of inflammatory polyps, papillomas and squamous cell carcinomas. Other diagnoses such as salivary type tumors, olfactory neuroblastomas and poorly differentiated carcinomas may occasionally be seen but are familiar to most E.N.T surgeons. The diagnosis becomes more complicated when a biopsy or polypectomy yields a low grade glandular proliferation. In such circumstances the diagnosis should include hamartomas¹.

CASE REPORT: A 29 year old female patient presented with long standing nasal obstruction. Anterior rhinoscopy showed a pinkish grape like mass which was insensitive to touch and did not bleed on touch. Diagnostic nasal endoscopy showed a pinkish mass in the left middle meatus which was arising from the maxillary sinus and was extending towards choana. It was suggestive of sinonasal polyposis.

Patient underwent endoscopic polypectomy with middle meatal antrostomy and the tissue sent for histopathological examination was suggestive of sinonasal polyposis, but after one year patient presented with sudden onset of bleeding from left nasal cavity and nasal obstruction on the same side. On diagnostic nasal endoscopy a pink polypoidal mass, friable, bleeds on touch, covered with yellowish cheesy debris seen completely occupying the left nasal cavity. Computed tomography showed heterogenous opacity with calcified spicules occupying the left maxillary sinus and the osteomeatal complex extending to left nasal cavity. A provisional diagnosis of fungal rhinosinusitis was made.

Patient underwent endoscopic debridement. Profuse haemorrhage was encountered during debridement. The lesion showed friable mass with yellowish, cheesy and foul smelling debris. Complete clearance of the mass from nasal cavity and maxillary sinus achieved.

Histopathological examination showed well defined fibro-collagenous tissue capsule with areas of haemorrhage and large number of vascular spaces of varying size lined by endothelial cells. The lumen showed haemorrhage with fibrinoid necrosis at places. Features were suggestive of Vascular Hamartoma.

CASE REPORT

DISCUSSION: Vascular hamartomas are defined as disorganized and excessive proliferations of vascular tissue which, due to their limited growth, are considered developmental malformations rather than true neoplasms. Usually, the use of the term “hamartoma” implies the presence of the lesion at birth, with subsequent growth paralleling that of the animal but ceasing with maturity. Vascular hamartomas are classified as capillary telangiectasis, cavernous angiomas, and arteriovenous or venous malformations. The clinical significance of hamartomas is generally attributed to their potential to spontaneously bleed. Histochemistry and immunohistochemistry were used as additional tools to further define vessel structure and the relationship between the vessels of each hamartoma with the surrounding structures². Hamartomas are usually congenital and simultaneously grow along the rest of the body. Once they reach their adult size they do not extend to involve more tissue unless there is trauma, infections, oedema, inflammation and filling of new vascular channels³. They are common in lung, liver, kidney, spleen and intestine but are extremely rare in the upper aerodigestive tract. Dicarlo et al reported a respiratory epithelial adenomatoid hamartoma in the maxillary sinus⁴. Fleming et al reported a case of sinonasal sero mucinous hamartoma⁵. Head and Neck surgeons should be aware of this pathological entity as a differential diagnosis for inverted papilloma and adenocarcinoma, in order to avoid unnecessary aggressive surgery. On the other hand misinterpretation as sinonasal polyposis may result in inadequate treatment⁴ therefore complete removal and compulsory histopathological examination of all the masses of nasal cavity should be followed as a strict protocol.

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Fig-1: Gross specimen

[illegible]

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