Original Research Paper



Ophthalmology

EXTRA ORBITAL SCHWANNOMA : A RARE PRESENTATION

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ABSTRACT Schwannoma, also referred to as neurilemmoma, is a benign tumor of peripheral nerve arising from Schwann cells that form the neural sheath. They occur most often as solitary tumor but on occasion as multiple lesions. Schwannoma of ophthalmic interest is rare although it has been reported in relation with the orbit, and less frequently with the uveal tract and conjunctiva. Isolated eyelid, eyebrow schwannoma is extremely uncommon. We report a case of a 21-year-old male who developed eyebrow Schwannoma. The mass was surgically removed by excisional biopsy. The histopathologic examination showed Schwannoma.

KEYWORDS: Schwannoma, eyebrow, extra orbital, supra orbital nerve

INTRODUCION

Schwannoma is a benign tumor arising from Schwann cells of peripheral nerves. The tumor is usually solitary, smooth surfaced, slow-growing and generally asymptomatic. It may develop at any age and there is no gender predilection. Head and neck are one of the most frequent locations. [1] Ocular tissues are rarely affected, occasionally schwannoma arises in the orbit^[2], and infrequently in the uveal tract^[3], conjunctiva^[1] or sclera. [3]

We report a case of 21 yrs old male who presented to us with a 6-month history of slowly enlarging, painless mass over central part of his right eyebrow. Local examination was suggestive of a firm, nontender nodule($1\times 1\times 1$ cm) in size on the right eyebrow. Rest ocular examination was within normal limit. The mass was non adherent to the skin and was mobile on palpation. The patient was operated under local infiltration anesthesia. The mass was exposed by taking incision over it. The mass was isolated from the surrounding tissue by blunt dissection. The capsule was present over the mass. Dissection was easily carried out in the extra capsular plane. The mass was excised completely along with its capsule. Continuous subcutaneous suture of 6.0 ethilon was placed to close the incision for better cosmetic appearance. Dermatological examination shows no evidence of neurofibromatosis.





[Fig1] PRE OPERATIVE

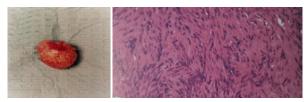
[Fig2] POST OPERATIVE

Gross Examination

The tumor was an encapsulated nodular lesion 1x 1x 1cm in size[fig 3]. The consistency was firm with yellowish appearance at cross section.

Microscopic Examination

H & E stained sections showed alternating areas of highly cellular (Antoni A) and hypocellular (Antoni B). The spindle cells of the Antoni A cells, which contain elongated nuclei arranged in fascicles, nuclei tend to palisade .Antoni B area homogenous acellular material, in which the cells were more oval, and had rounded nuclei,clear cytoplasm, and less basement membrane.[fig4]



[Fig 3] GROSS EXAMINATION [fig 4] MICROSCOPY

DISCUSSION

Schwannoma (or neurilemmoma) is made up of proliferating Schwann cells of peripheral nerve sheaths. It is a neoplasm which occurs wherever schwann cells are present, that is in any myelinated peripheral nerve. In most cases, while schwannoma is sporadically manifested as a single benign neoplasm, the presence of multiple schwannomas in one patient is usually indicative of neurofibromatosis 2 (NF-2). However, the term schwannomatosis or neurilemmomatosis has been used to describe patients with multiple non-vestibular schwannomas with no other stigmatas of NF-2 or NF-1. Our patient had isolated eyelid Schwannoma with no family history or clinical findings of neurofibromatosis-1 or -2. patient was advised regular followup to observe for recurrence of schwannoma.

CONCLUSION

Schwannomas are uncommon tumors. Preoperative diagnosis can be challenging because of the variability of locations and the absence of pathognomonic characteristics. It is important to perform early diagnosis and intervention in suspected lesions by necessary investigations in order to prevent complications.

CONFLICT OF INTEREST

The authors declare no potential conflict of interest with respect to the research, authorship, and/or publication of this article.

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