Clinical Records

Transitional papilloma of the middle ear

H. S. KADDOUR, F.R.C.S., C. J WOODHEAD, F.R.C.S. (Leeds)

Abstract

We present a rare case of a transitional papilloma of the middle ear, occurring several years after excision of a similar lesion from the nose. There was no continuity between the two lesions suggesting that these tumours can be multicentric in origin.

Introduction

Transitional papilloma of the nasal cavity are unusual benign tumours, with a strong tendency for local recurrence. Much confusion exists regarding their terminology, and their aetiology is unknown.

They almost always arise in the lateral nasal wall, but there have been reports of histologically similar tumours occurring in the nasopharynx (O'Reilly and Zuk, 1989), lacrimal sac (Frechner and Sessions, 1977) and middle ear (Stone et al., 1987). We report here a case of transitional papilloma of the middle ear occurring as a separate tumour after previous excision of a nasal transitional papilloma.

Case report

A 77-year-old lady presented in 1980, with a bleeding polypoid lesion at the muco-cutaneous junction anterior to the right inferior turbinate. It was removed and the histology showed a benign nasal papilloma. This recurred at the inferior turbinate in 1983, and was excised by turbinectomy, and there has been no clinical evidence of recurrence in the nose since. Histologically this was a transitional cell papilloma (Fig. 1). In 1989, she presented with right-sided otalgia and otorrhoea, and was found to have a pale granular lesion protruding through an anterior perforation of the right tympanic membrane. Again this was removed and the histology showed a transitional cell papilloma (Fig. 2).

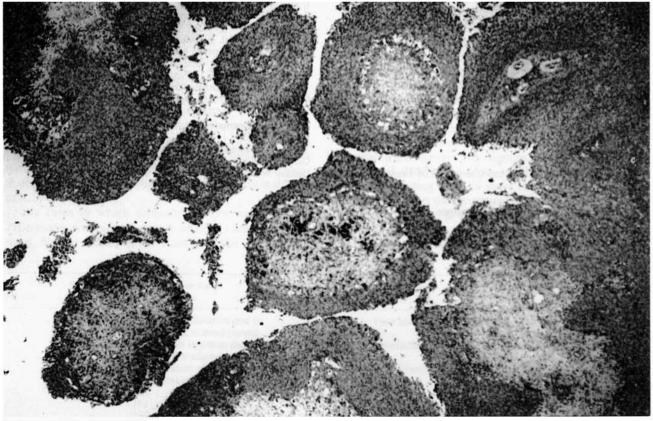


Fig. 1

Low power photomicrograph showing the inverted papilloma of the nose.

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Transitional cell papilloma of the middle ear (H&E ×15).

Nasal and nasopharyngeal examination was unremarkable, and a CT scan showed no evidence of recurrence of the original nasal tumour and a normal Eustachian tube.

Radical surgery was thought unsuitable due to her poor cardiorespiratory condition, and she has benefitted from occasional debulking of the lesion in the ear, to control her symptoms. The histology on each occasion has confirmed the presence of a transitional cell papilloma.

Discussion

There are a variety of confusing terms for papillomas of the nasal cavity including inverted papilloma, transitional papilloma, Ringertz tumour and Schneiderian papilloma. These terms probably all refer to the same entity, which can have varying histological features. The main characteristics are the inversion of the proliferating epithelium into the stroma of the tumour, and the transitional appearance of the epithelium (Michaels, 1987). The term transitional is confusing but used to imply an epithelium in transition between columnar and squamous types. Certainly, squamous metaplasia is often seen in association with the tumour (Woodson et al., 1985).

Their occurrence, almost entirely in the nose and paranasal sinuses as opposed to the lower respiratory tract, is probably due to the origination of the nasal epithelium from the Scheinderian membrane. The occasional occurrence of tumours in the nasopharynx, lacrimal sac, and middle ear, perhaps relate to more extensive embryological migration of this epithelium. Simple excision of the lesion is followed by a recurrence rate approaching 50 per cent (Hyams, 1971). The reasons for this fall into different categories, including inadequate surgical excision, adjacent metaplasia, and multicentricity of tumours. Our case is unusual because of the occurrence of two distinct but histologically similar tumours in the nasal cavity and middle ear. The case

reported by Stone *et al.* (1987) suggested spread of the tumour from the nasal cavity to the middle ear via the Eustachian tube, but in our case there is clinical and radiological evidence to suggest that the tumours have arisen multicentrically.

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Address for correspondence: Mr H. S. Kaddour, F.R.C.S., ENT Department, St. James's University Hospital, Beckett Street, Leeds LS9 7TF.

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