

## **PRIMARY PLEOMORPHIC ADENOMA OF THE EXTERNAL EAR CANAL. REPORT OF A CASE**

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**Abstract:** Primary neoplasms of the external ear canal are rare, and 5% of these tumors are of glandular origin. Ceruminous glands are modified sweat glands of the skin of the external auditory meatus that may give rise to (a) benign tumors such as ceruminous adenoma, pleomorphic adenoma, and syringocystadenoma papilliferum, and (b) malignant tumors such as ceruminous adenocarcinoma, adenoid cystic carcinoma, and mucoepidermoid carcinoma. An alternative theory holds that pleomorphic adenomas may well arise from ectopic salivary tissue present in the external ear canal. These tumors are very rare and usually have a benign course. In this report, we describe an unusual case of pleomorphic adenoma of the external auditory canal associated with chronic infection of the middle ear.

**Keywords:** tumors, external ear, malignant, adenocarcinoma.

**Introduction.** The pleomorphic adenoma of the external auditory canal (EAC) is a benign tumor of the region and a rare clinical entity. Histologically, it may be described as a neoplasm “consisting of epithelial and myoepithelial cell formations within a myxomatous, pseudochondromatous, or hyalined stroma that contains mucous secretions [1].” This tumor is considered part of a wider group of benign and malignant tumors of the EAC arising from the ceruminous glands. Wetli et al [1], in an attempt to classify these tumors based on their histopathologic findings, suggested the following 4 categories: ceruminous adenoma, pleomorphic adenoma, adenoid cystic carcinoma, and adenocarcinoma. The first 2 are benign, whereas the last 2 are malignant. Benign EAC adenomas are extremely rare and pleomorphic adenomas even more so.

**Case report:** A 60-year-old woman presented with exacerbation of left otalgia over a 6-month period. She had been affected with chronic otitis media and aural polyps for the last 13 years, for which she had received medical treatment only. A canal-filling aural

polyp was noted on clinical examination. Subsequent biopsy and histologic examination revealed pleomorphic adenoma of the external ear canal, possibly with malignant elements. Magnetic resonance imaging showed no intracranial extension or any association with the adjacent parotid gland. The patient underwent modified radical mastoidectomy and complete resection of the tumor and the entire skin of the external auditory canal. Final histology and immunohistochemistry confirmed the absence of malignancy, and no recurrence has been reported 1 year postoperatively.

**Conclusions:** Pleomorphic adenoma is an extremely rare tumor arising from the ceruminous glands of the external ear canal. Nonspecific presentation and difficult histologic diagnosis characterize this benign neoplasm. Wide local excision is the mainstay of treatment.

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