External Auditory Canal Lesions - Diagnoses and Treatment

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ABSTRACT

Patients commonly present with what appears to be simple recurrent otitis externa, but histology often shows chronic inflammation and conductive hearing loss are not specific to this diagnosis. On examination, we commonly find that there is a more interesting reason than simple recurrent infection. We wanted to explore the range of pathology that affects the external ear canal (EAC) and the wide range of clinical entities presenting with changes involving the external ear canal.

INTRODUCTION

Objectives: To review the clinical, otological and radiological changes of a wide range of clinical entities presenting with changes involving the external ear canal.

Methods: Retrospective case note, radiology, and pathology database review of patients with lesions noted in the external ear seen at a tertiary centre.

RESULTS

Of 396 patients that had imaging in our department that included the external ear, 109 had diagnoses related to the ear on imaging. Personal case series and radiology databases were examined to identify cases of external ear pathologies between June 2003 and February 2009. The type of imaging and range of diagnoses were noted.

CONCLUSIONS

There are many diagnoses to be considered when presented with changes involving the external ear canal. CT imaging can be helpful in planning surgery but often the final diagnosis is only made when the pathologists have examined the specimen. There are other diagnoses described in published case reports which were not seen in our case series. Treatment usually consists of surgical excision +/- canaloplasty. Medical therapy (e.g. antibiotic therapy) is also sometimes needed.

DISCUSSION

As can be seen from the chart below, there is an extensive differential diagnosis for pathology that affects the external ear. Many are rare conditions that may or may not be recognised purely by clinical examination, even by those doctors with long osteological experience. We have described a range of conditions in our patients, including cholesteatoma extending from the middle ear and any associated inflammatory polyps and tissue changes.

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References


There are also case reports of diagnoses not mentioned here, including; papilloma, haemangioma, Kaposi’s sarcoma, adenoid cystic carcinoma, and mucoepidermoid carcinoma (see references). We must be aware of this wide range of differential diagnoses, so appropriate investigations can be performed and surgical removal arranged in a timely manner. Excision of the affected part of bone, meatoplasty and canaloplasty using split skin grafts can reduce post operative recurrence and stenosis.