Çukurova Üniversitesi Tıp Fakültesi Dergisi
Cukurova Medical Journal

Editöre Mektup / Letter to the Editor

Ameloblastoma: A Case with Radiographic Diagnosis

Amelobastoma: Radyografik Tanı Konan Bir Olgu

Ramachandran Sudarshan

Department of Oral Medicine and Radiology, Sibar Institute of Dental Sciences Guntur, India

Çukurova Üniversitesi Tıp Fakültesi Dergisi (Cukurova Medical Journal) 2013; 38(1):153-155.

The ameloblastoma is a relatively rare dental tumor, described for the first time by Broca in 1868, and so denominated by Churchill in 1934. According to Larsonn and Almeren, its incidence is 0.6 cases per million, while Shear and Singh found an incidence of 0.31 cases per million in a white population of Witwatersrand in South Africa. Between 1975 and the beginning of the '80, the concept that the ameloblastoma exists in three different clinical/histopatological forms was accepted: solid-multicystical, unicystical and peripheral[1].

Ameloblastoma is the commonest benign tumour of odontogenic origin which developed from epithelial cellular elements and dental tissues in their various phases of development. It is generally a slow growing but locally invasive tumour. Its peak incidence is in the 3rd to 4th decades of life and the male to female ratio is 1:1. It is often associated with an unerupted third molar. It may present as a result of routine radiographic examination finding. Eighty percent of ameloblastomas occur in the mandible and majority is found in the angle and ramus region[2].

A female patient 35 years of age with a complaint of pain in the left lower back jaw region past 5 days. On examination swelling was extending from corner of mouth to posterior border ramus and from lower eyelid to the lower border of mandible. The surface was shiny erythematous and intraorally there was pus discharge from 3rd molar region. So a diagnosis of pericoronal abscess of mandibular left mandibular 3rd molar was given.

On radiographic investigation (figure 1,2,3,4) revealed a radiolucent lesion, extending anteriorly from distal to maxillary and mandibular 3rd molar; extending to the neck of the condyle superiorly, posteriorly to the angle of the mandible and, inferioposteriorly which had a scalloping borders completely radiolucent. It had caused the resorption of neck of the condyle, coronoid process, sigmoid notch, inferior cortex of the mandible and the ramus of the mandible. So a provisional diagnosis was given as ameloblastoma. Histopathological examination confirmed the diagnosis.

Worth gave his four classic descriptions for ameloblastoma radiologically. According to that the first category resembles our case that is it resembles a dentigerous cyst without septa within the lesions which is seen frequently in the ramus region with patient older than 30 years. Another sign is extension of a lesion in the body of the mandible into the ramus. The presence of septa even they are slight, also increases possibility of

ameloblastoma. If the portion of ramus wall is lost, especially anterior wall or less frequently superior wall it is very possible that the lesion is ameloblastoma. According to Worth (1963), there is a cyst like cavity with some deficiency of the wall, and faint septa are observed within the lesion, then the diagnosis almost certainly an ameloblastoma[3].

The decision to use a radical or conservative approach depends on various factors: 1) the dimensions and the location of the lesion, 2) the growth rate and the relationship with the nearby structures, 3) the histological type, 4) the clinical characteristics, in the recurrences, 5) the general conditions of health and the age of the patient[1].

Mandibular ameloblastoma are very common benign tumor as seen in our case. Early diagnosis is very important in such cases as these ameloblastoma may cause extensive swelling and pathological fracture of jaw. Radiograph was very beneficial in our case for an early diagnosis and further treatment plan.

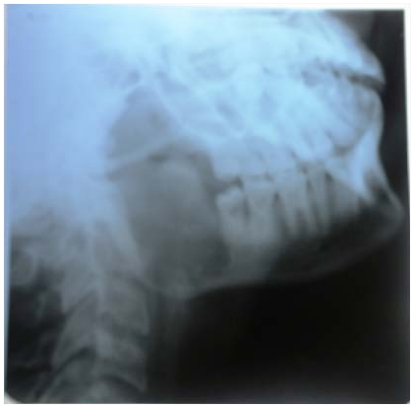

Figure 1.

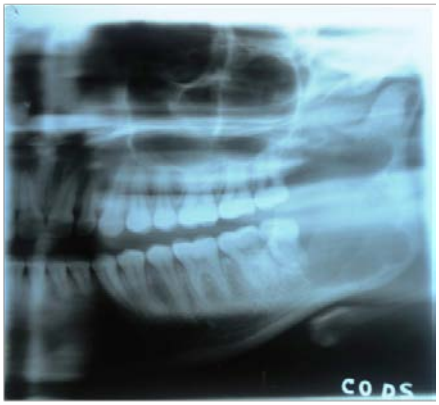

Figure 2.

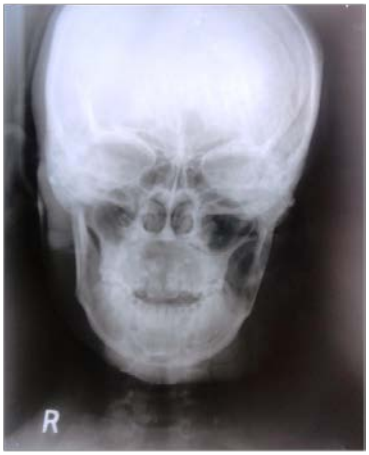

Figure 3

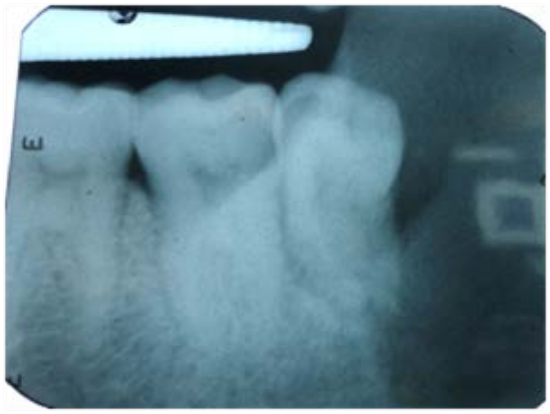

Figure 4.

REFERENCES:

1. Di Cosola M, Turco M, Bizzoca G, Tavoulari K, Capodiferro S, Escudero-Castaño N, Lo Muzio L. Ameloblastoma of the jaw and maxillary bone: clinical study and report of our experience. Av. Odontoestomatol. 2007; 23: 367-73.
2. Kahairi A, Ahmad RL, Islah LW, Norra H. Management of large mandibular ameloblastoma – a case report and literature reviews. Arch Orofacial Sci. 2008; 3: 52-5.
3. Langlias RP, Langland OE, Nortje CJ. Diagnostic imaging of jaws. Williams and ilkins, USA. 1995.

Yazışma Adresi / Address for Correspondence:
Dr. Ramachandran Sudarshan
Senior Lecturer
Department of Oral Medicine and Radiology
Sibar Institute of Dental Sciences
GUNTUR, INDIA
e-mail: Sudharshanram@yahoo.co.in

geliş tarihi/received :19.06.2012
kabul tarihi/accepted:03.07.2012