

Abstract

Background: A calcifying epithelial odontogenic tumor is a benign, odontogenic lesion that affects most commonly in adults among the ages 40–50 years . The radiographic features of a calcifying epithelial odontogenic tumor (CEOT) vary to a great extent. Detection of central cell giant granuloma in the radiography because of the similarity with various other lesions a CEOT is so difficult.

Objective: The purpose of this study was to evaluate radiological features of CEOTs.

Patients and Methods: Twenty-five panoramic radiographs of cases with an established histopathological diagnosis of a CEOT were received from the Department of Oral Pathology DongFang Hospital Beijing, China of Shahid Beheshti dentistry over the period from 2004 to 2010. A computerized questionnaire was completed for each case by two radiologists. The radiographic data were tested using Chi-square or Student's t-test, with $\alpha=0.01$.

Result: Twenty women and 12 men were included with the age range of 35–71 years. Among the 30 lesions, 21% of the lesions were located in the mandible. Radiographically, it was determined 85% of the cases were well defined and 36% of the lesions were multilocular. There was bone expansion and tooth displacement in 17 cases. Root resorption in 15 (64%) cases. Finally, there was no association between distribution of CEOT in the jaws with border definition, locularity and bone expansion.

Conclusion: unilocular lesions that had a well-defined border were most prevalent, and age group under 50 years made up the largest population of patients.

Keyword: giant cell; calcifying; epithelial, tumor, panoramic radiography; jaw