Traumatic bone cyst or solitary bone cyst

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DESCRIPTION

An 18-year-old patient came to the Department of Oral Medicine and Radiology, to get a replacement for the missing mandibular front tooth. The patient gave a history of trauma to the anterior region a few years ago. Intraoral examination revealed missing mandibular right lateral incisor and over-retained deciduous maxillary left canine. Mandibular anterior region showed no soft tissue abnormality or bony expansion. The periodontium was noted to be healthy with no evidence of gingivitis or tooth mobility, there were no carious lesions either. The anterior mandibular teeth were vital and responded normally to electric pulp testing. Clinical examination was unremarkable with no evidence of lymphadenopathy and the patient revealed no contributory medical history. A coincidental routine orthopantomographic radiological examination revealed a well-delineated solitary radiolucency with a radiopaque border in mandibular symphysis region. Radiolucency extended between mandibular canines and showed a scalloped appearance extending between the anterior roots. Involved teeth showed neither displacement nor root resorption. The inferior cortex of mandible was intact and showed no thinning or periosteal reaction. No pathological fracture was evident. An over-retained deciduous maxillary left canine and missing corresponding permanent canine was also evident (figure 1).

Aspiration from the cystic cavity yielded no pus or serosanguineous fluid or haemorrhage. It was done to rule out the possibility of the lesion being a vascular tumour. The preceding findings suggested the lesion to be traumatic bone cyst.

Treatment would be surgical exploration of the cystic cavity to induce bleeding into the lesion. The cyst will be then closed, and healing of the blood clot will lead to bone formation. Since the teeth in the involved area are vital, they would not be sacrificed.

Learning points

- Ask for a history of trauma or extraction, which may lead to diagnosis of traumatic bone cyst (TBC), in case of asymptomatic painless radiolucent lesions seen around vital teeth, on accidental radiographs.
- Aspiration should be done to detect the cystic contents and rule out a vascular tumour. Suspect TBC if aspiration of cystic lesion does not yield much more than scanty serosanguineous fluid or some blood clots.
- Surgical exploration and curettage, bone walls should be performed, to initiate bleeding and new bone formation. Healing of lesions expected in 6–12 months.

Competing interests None.

Patient consent Obtained.

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REFERENCES