

## Vertical Root Fracture Findings from Cone Beam Computerized Tomography: A Serial Case Analysis

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Received: June 10, 2021 • Revised: June 25, 2021 • Accepted: July 13, 2021

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## **Abstract**

The diagnosis of vertical root fracture (VRF) has been discussed as a difficult and complicate issue to make the definitive diagnosis. With the using of a new modality image diagnosis, cone-beam computed tomography (CBCT), it may help to identify the VRF. The purpose of the study was to describe the CBCT findings of the VRF and relevant clinical findings. Nine patients with tentative diagnosis of VRF were included in the report. All patients were sent for CBCT. Most of the CBCT clearly showed peri-radicular lesion. Together with the periapical film and clinical findings, the diagnosis of VRF could be made. All the extracted teeth showed the VRF. CBCT is helpful to confirm the VRF when using with the conventional periapical film and clinical symptoms.

Keywords: cone beam computed tomography, root canal treated tooth, vertical root fracture