

## A Case of Crowned Dens Syndrome with Huge Calcifications

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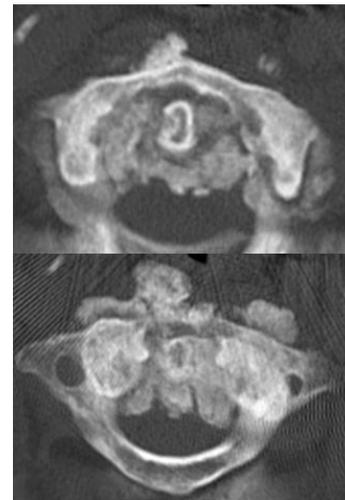
### Case Report

An 81-year-old woman presented to our hospital with a 1-month history of headache and neck pain. She had no neurological symptoms, articulation disorder, or swallowing disorder. The plain radiograph showed calcification deposits around the atlantoaxial joint and anterior vertebral body (Figure 1). The computed tomography scan of her neck showed details of these calcifications (Figures 2-4). Huge crown-shaped deposits of hydroxyapatite or calcium pyrophosphate dihydrate were seen. The C-reactive protein level was slightly increased to 0.78 mg/dL. Oral non-steroidal anti-inflammatory drug (NSAID) therapy resulted in complete improvement of her symptoms.

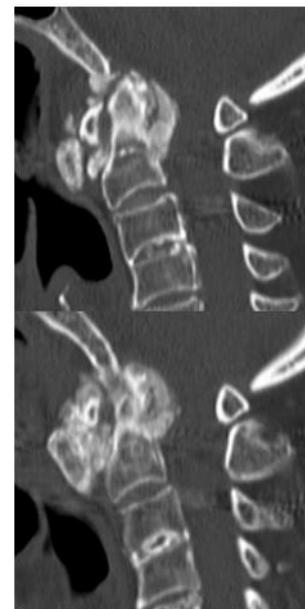


**Figure 1:** Plain radiograph showed calcification deposits around the atlantoaxial joint and anterior vertebral body.

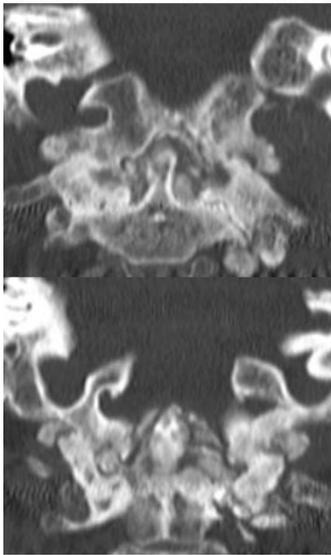
The crowned dens syndrome (CDS) was aptly named because it appears radiologically as crown-shaped or halo-shaped distributions when deposits surround the odontoid process [1,2]. Glucocorticoids and NSAIDs are commonly efficacious for treating CDS. A proper diagnosis is important and physicians should be aware of CDS to prevent unnecessary diagnostic procedures and treatment.



**Figure 2:** Computed tomography scan of her neck showed details of these calcifications.



**Figure 3:** Atlantoaxial joint and anterior vertebral body.



**Figure 4:** Computed tomography scan of her neck showed details of these calcifications.

### Conflict of Interest

The author declares no conflicts of interest concerning this article.

### References

1. Bouvet JP, le Parc JM, Michalski B, Benlahrache C, Auquier L, et al. (1985) Acute neck pain due to calcifications surrounding the odontoid process: the crowned dens syndrome. *Arthritis Rheum* 28:1417-1420.
2. Matsumura M, Hara S (2012) Crowned dens syndrome. *NEJM* 367: 23.