Calcified White Matter

Morteza Daraei

1- Resident, Department of Internal Medicine, Imam Khomeini Hospital, Tehran University of Medical Sciences, Tehran, Iran

Received: 03 August 2017
Revised: 19 August 2017
Accepted: 02 September 2017


Introduction

A 39-year-old woman with four years history of intermittent perioral paresthesia, muscle twitching, and an episode of laryngospasm and generalized tonic-clonic seizure, presented with carpopedal spasm. The physical exam was prominent for Trousseau’s and Chvostek’s sings. Other neurological exam (including cerebellar exam) was normal and there were no evidence of cognitive or extrapyramidal abnormalities.

Laboratory data showed serum total calcium of 6.5 mg/dl (Normal range: 8.6 to 10.2 mg/dl), albumin of 4.5 g/dl (Normal range: 3.5 to 5.2 g/dl), phosphorus of 7.3 mg/dl (Normal range: 2.5 to 4.5 mg/dl), and parathyroid hormone level of 5.2 pg/ml (Normal range: 9 to 94 pg/ml). Thyroid, renal, and liver function tests were all normal.

According to history of seizure, we performed unenhanced brain computed tomography (CT) which showed widespread brain parenchymal calcification including basal ganglia and cerebellum (Figures 1 and 2). In ophthalmologic exam, there was not any sign of cataract.

Figure 1. Unenhanced brain computed tomography (CT) scan which shows diffuse cerebellar calcinosis.
Intracranial calcinosis could be caused by senile issues, vascular causes (especially atherosclerosis), endocrinopathies especially hormonal disturbance related to parathyroid glands (hypo- or hyper-parathyroidism and pseudohypoparathyroidism), and neoplastic and infectious processes (1).

With the diagnosis of primary hypoparathyroidism, we prescribed her calcium supplements and calcitriol.

Conflict of Interests
Authors have no conflict of interests.

Acknowledgments
None.

References