

Case based learning points

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A 27-years-old Man with Abdominal Pain; Lead Toxicity

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Figure 1: Bluish-gray gingival lead lines

CASE PRESENTATION

A 27-year-old man came to our emergency department with chief complaints of abdominal pain, nausea and vomiting, colicky pain in all area of abdomen without any radiation and generalized myalgia. In his background, he had no previous medical problem. In his social history he had worked in an automobile battery-reclaiming factory for 5 years. During his physical examination, his appearance was pale with perioral

priority, ill and agitated but not toxic with a blood pressure of 127/85 mmHg and a pulse of 80 beats/min, respiratory rate of 14 breaths/min and oral temperature of 37.3 °C, mild generalized abdominal tenderness without rebound. No obvious signs of sensory and motor neuropathy were found. In the head and neck examination, we found lead-lined teeth (Figure 1).

LEARNING POINTS

The most common cause of chronic metal poisoning is lead. Exposure occurs through inhalation or ingestion (1). Both inorganic and organic forms of lead that exist naturally produce clinical toxicity. Gastrointestinal manifestations occur more frequently with acute rather than with chronic poisoning, and concurrent hemolysis may cause the colicky abdominal pains. Patients may have complained of a metallic taste and, with long-term exposure, have bluish-gray gingival lead lines (2, 3). In addition, constitutional symptoms, including arthralgia, generalized weakness, and weight loss raises the possibility of lead toxicity (4).

REFERENCES

1. Choy KD, Lee HS, Tan CH. Blood lead monitoring in a decorative ceramic tiles factory in Singapore. Singapore Med J. 2004;45(4):176-9.
2. Verheij J, Voortman J, van Nieuwkerk CM, Jarbandhan SV, Mulder CJ, Bloemena E. Hepatic morphopathologic findings of lead poisoning in a drug addict: a case report. J Gastrointest Liver Dis. 2009;18(2):225-7.
3. Shiri R, Ansari M, Ranta M, Falah-Hassani K. Lead poisoning and recurrent abdominal pain. Ind Health. 2007;45(3):494-6.
4. Alport AR, Sander HW. Clinical approach to peripheral neuropathy: anatomic localization and diagnostic testing. Continuum (Minneapolis). 2012;18(1):13-38.