

**CORRECTION TO 'DEMISTIFYING LACTATE IN THE EMERGENCY DEPARTMENT'
[ANNALS OF EMERGENCY MEDICINE 75 (2020) 287–298/8310]**



Gabriel Wardi, MD, MPH; Jessica Brice, MD; Matthew Correia, MD; Dennis Liu, MD; Michael Self, MD; Christopher Tainter, MD

From the Department of Emergency Medicine (Wardi, Brice, Correia, Liu, Self, Tainter), Division of Pulmonary, Critical Care, and Sleep Medicine, Department of Internal Medicine (Wardi), and Division of Anesthesiology Critical Care Medicine, Department of Anesthesiology (Tainter), University of California at San Diego, San Diego, CA.

The publisher regrets that an error was made in Figure 1 of the article titled *Demystifying Lactate in the Emergency Department*, published in the February 2020 issue. In the upper right corner of the figure, the arrow should be flipped, pointing from “NAD⁺” to “NADH, H⁺.” This has been corrected online.

The publisher would like to apologize for any inconvenience caused.

IMAGES IN EMERGENCY MEDICINE

(continued from p. 546)

DIAGNOSIS:

Hypertriglyceridemia. The patient's serum triglyceride level was above the upper detectable limit (>5,500 mg/dL; normal <150 mg/dL); total cholesterol level was 1,287 mg/dL (normal 125 to 199 mg/dL). Serum lipase level was 33 units/L (normal 7 to 60 units/L). Given his lack of related symptoms, normal physical examination result, and normal serum lipase level, his hypertriglyceridemia was attributed to intensive asparaginase therapy. Asparaginase is known to cause hypertriglyceridemia because of an increase in endogenous synthesis of low-density lipoproteins, as well as a decrease in lipoprotein lipase, a key enzyme that removes triglycerides from plasma.¹ Severe hypertriglyceridemia (>1,000 mg/dL) is relatively common, occurring in 7% of patients in one study of 257 pediatric patients being treated for acute lymphoblastic leukemia.² Chemotherapy including pegylated asparaginase was continued without complications from hypertriglyceridemia. His hypertriglyceridemia resolved during 3 months.

Although pancreatitis is associated with both asparaginase and corticosteroid therapy, it does not appear to be associated with hypertriglyceridemia or its severity.³ Hypertriglyceridemia may be associated with thrombosis in children with acute lymphoblastic leukemia, however.² Dose modification is approached cautiously, given the relative paucity of complications, because intensive asparaginase therapy has been shown to significantly improve outcomes in pediatric precursor T-cell acute lymphoblastic leukemia.⁴

Author affiliations: From the Department of Pediatrics, Los Angeles County + University of Southern California Medical Center, Keck School of Medicine, Los Angeles, CA.

REFERENCES

1. Hoogerbrugge N, Jansen H, Hoogerbrugge PM. Transient hyperlipidemia during treatment of ALL with L-asparaginase is related to decreased lipoprotein lipase activity. *Leukemia*. 1997;11:1377-1379.
2. Bhojwani D, Darbandi R, Pei D, et al. Severe hypertriglyceridaemia during therapy for childhood acute lymphoblastic leukaemia. *Eur J Cancer*. 2014;50:2685-2694.
3. Raja RA, Schmiegelow K, Sørensen DN, et al. Asparaginase-associated pancreatitis is not predicted by hypertriglyceridemia or pancreatic enzyme levels in children with acute lymphoblastic leukemia. *Pediatr Blood Cancer*. 2017;64:32-38.
4. Salzer WL, Devidas M, Carroll WL, et al. Long-term results of the pediatric oncology group studies for childhood acute lymphoblastic leukemia 1984-2001: a report from the Children's Oncology Group. *Leukemia*. 2010;24:355-370.