The relationship between rhabdomyolysis and alcohol ingestion in elderly doxylamine intoxicated patients

Young Gwan Ko
Kyung Hee University, South Korea

Abstract

Purpose: Doxylamine is commonly used for relief of insomnia; in addition, it is also a drug that is frequently used for intoxication in Korea. This drug is relatively safe; however, it is known to occasionally induce rhabdomyolysis. We have seen many cases of alcohol ingestion in elderly doxylamine intoxication patients; however, few previous studies have documented the effects of alcohol on rhabdomyolysis in elderly person. Therefore, the purpose of this study is to determine the effect of alcohol on rhabdomyolysis in elderly doxylamine intoxicated patients.

Methods: This study was conducted on 79 elderly patients (65 years and older) admitted to an emergency department after doxylamine intoxication during the period from January 1st, 2001 to March 31st, 2013. Using the protocol developed beforehand, the amount of drug ingestion, past history, laboratory results, and whether or not alcohol was ingested were recorded. Rhabdomyolysis was defined as serum creatine kinase (CK) over 1,000 U/L. The SPSS package with logistic regression, t-test, and Fisher’s test was used for analysis of data.

Results: Alcohol ingestion was detected in 48% of the study patients. The presence of hematuria and alcohol ingestion showed a significant association with development of rhabdomyolysis.

Conclusion: Elderly doxylamine intoxicated patients with alcohol ingestion may have a high rate of incidence of rhabdomyolysis. Therefore, elderly doxylamine intoxicated patients who drink alcohol at the same time should be aware of rhabdomyolysis.