G119 Fatalities Occurring With Ingestion of Ibogaine

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After attending this presentation, attendees will understand ibogaine, its uses, and issues that may arise with the investigation of these deaths.

This presentation will impact the forensic pathology and toxicology communities by increasing knowledge of ibogaine's use, detection, and risk of death.

The psychoactive indole alkaloid ibogaine is the focus of an alternative medical subculture in which it is used most often for opioid detoxification, as well for individuals seeking psychotherapeutic insight or religious experience. Eighteen fatalities were reviewed that are reported to have occurred since 1990 in individuals within seventy six hours of taking ibogaine. These deaths occurred in numerous countries and we reviewed all available autopsy, toxicologic, and investigative reports.

There were fourteen males and four females with a mean age of 39 years (range 24-54) years. Fourteen individuals took ibogaine for the indication of acute opioid withdrawal and 3 individuals were non-addicts who used it for spiritual/psychological reasons. The circumstances were unknown in one decedent. Ibogaine was given as the HCl form in nine instances at doses ranging from 4.5 to 29 mg/kg, and as an alkaloid extract in four. The concentrations determined in ten decedents ranged from 0.24 to 6.6 mg/L. The time interval from the most recent ingestion of ibogaine until death ranged from 1.5 to 76 hours. In addition, commonly abused drugs (including benzodiazepines, cocaine, opiates, and methadone) were detected in eight of eleven decedents. Seven of the decedents had co-morbidities including: cirrhosis, hypertensive and atherosclerotic cardiovascular disease, and obesity. Among the two decedents in which no other drugs of abuse were detected in postmortem toxicology analysis, one had advanced heart disease and another had cirrhosis of the liver. Full toxicology and autopsy results were not available in seven and three decedents, respectively. Among these 18 decedents, the involved countries included the United States (5), Mexico (4), France (4), the Netherlands (2), Germany (1), the United Kingdom (1), and South Africa (1).

The uncontrolled settings in which ibogaine is given make the causes of these deaths difficult to evaluate, and little is known regarding toxic concentrations of ibogaine in humans. Contributing causes of some of these deaths appear to have involved drug use during treatment and preexisting cardiovascular disease. There appeared to be no clinical or postmortem evidence suggestive of a characteristic syndrome of neurotoxicity. Cardiac monitoring may be a more important safety issue in view of published observations of bradycardia in animals and a recent case report of QT prolongation in an alcohol dependent woman following the ingestion of alkaloid extract, as well the common use of pretreatment EKGs and cardiac exclusion criteria, and in some medical settings, implementation of cardiac monitoring during ibogaine treatment.

Ibogaine, Intoxication, Substance Abuse

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