

Oral Presentation - 20

Trend of Methadone Intoxication in Children

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Abstract

Objective: Acute methadone overdose is a common poisoning in Iranian adults. Availability of methadone may affect accidental poisoning in children as well. The aim of the current study is to evaluate epidemiological trend and characteristics of methadone overdose in children.

Methods: Demographic data of all hospitalized methadone intoxication in children < 12 years old were gathered through chart review of hospital records.

Results: In the period of 3 years (2010-2012), 250 cases of methadone intoxication were reported in the Loghman-Hakim Hospital (Tehran-Iran). The cases increased from two in 2010 to 142 cases in 2012. Of these, 149 (59.6%) were males. The mean age was (4.2 ± 2.5) with minimum of 1 year and maximum of 12 year. One hundred and ninety-three (76.6%) children had ingested syrup and 43 (17.1%) consumed tablet and 10 (4%) were not indicated. Most patients (75%) were drowsy on admission and four (1.6%) needed intubation. Methadone ingested dose was 29 ± 23 mg (Min 5, Max 125 mg). Among 220 documented pupil size cases, 80.9% were miotic. Nearly all children were intoxicated at home, mostly due to mislabeled medicines or unlabeled specimens. Cyanosis and bradypnea were the most common clinical findings. Most children (70.5%) were treated with naloxone and supportive cares were used for the rest. Except for a single case with a history of opium consumption, there was no other past drug history. Methadone was used in two cases to reduce withdrawal syndrome. Two children died (0.9%): both from using syrup formulation.

Conclusion: It appears methadone intoxication is increasing in our community and innocent children are involved through accidental poisoning. In order to reduce such incidents, we recommend the use of child-resistant containers for dispensing syrup, reduction in methadone concentration, adding a coloring agent, special flavor, and education on the safe storage of methadone in homes to reduce the occurrence of accidental poisonings.