

### Bupropion overdose

OS

#### Seizures and other toxicities in a child: case report

A 7-year-old boy experienced seizures and other CNS disorders, rash, tachycardia and vomiting after ingesting an overdose of bupropion [amfebutamone; Wellbutrin XL].

The boy ingested seven extended-release tablets of bupropion 150mg after being put to bed. He vomited 1–2 hours later, and then experienced restlessness and sleeplessness. He vomited again 5–6.5 hours postingestion. A tablet was noticed in the emesis, and an empty 7-tablet box belonging to one of his parents was found in his bed. He was presented at an emergency department approximately one hour later with mydriasis, ataxia, anxiety and visual and tactile hallucinations. His HR was 152 beats/min and his BP was 102/40mm Hg. He vomited again, revealing two more tablets, and activated charcoal was administered. Approximately one hour after presentation, he experienced a 30-second tonic-clonic seizure with ocular deviation, and he had developed a rash involving his face, arms and trunk.

The boy was treated with IV diphenhydramine and lorazepam, followed by IV fosphenytoin 30 minutes later. A urine drug screen was positive for bupropion. He remained agitated, disoriented and tachycardic over the next 4 hours, with continuing hallucinations and nonsensical mumbling. He also experienced three further episodes of seizures treated with lorazepam and then IV phenobarbital, after which he slept for 9 hours with normalisation of his HR and no further seizures. The remainder of his hospital stay was unremarkable, and he was discharged 48 hours after presentation.

**Author comment:** *The sympathomimetic amine structure of bupropion may stimulate catecholamine release from the hypothalamus into the CNS, which "might be partially responsible for the seizures seen in our patient".*

Spiller HA, et al. Multiple seizures after bupropion overdose in a small child. *Pediatric Emergency Care* 24: 474-475, No. 7, Jul 2008 - USA 801117568