

## **Current Practice of Atropine Therapy in Acute Cholinesterase Inhibitor Pesticide Poisoning**

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**Objective:** Atropine is often a life saving drug in acute cholinesterase inhibitor pesticide poisoning (1). Though the guidelines for the management available, patients may not be managed accordingly (1, 2). Therefore we have looked into the current practice of atropine therapy and consequences. **Method:** A cross sectional study was conducted in a teaching hospital and a general hospital in Southern province of Sri Lanka using a semi-structured questionnaire. **Results:** 36 patients (28 males) with anticholinesterase poisoning (28 organophosphorus, 8 carbamate) were admitted to hospitals. Atropine was started on two patients at local hospitals. Among 34 patients atropine was commenced on 10 (29%) patients without any cholinergic features. Six (16%) patients did not receive loading dose of atropine. Two patients died during loading dose of atropine. All the patients received maintenance dose of atropine via an intravenous drip set (not via an infusion pump). 27 (79%) patients developed atropine toxicity during maintenance therapy. Maintenance dose was not titrated against symptoms in any of the patient. Nine (25%) patients died in spite of treatment. Association between atropine toxicity and death were analyzed by using Chi- squared test;  $X^2=0.62$  ( $p>0.05$ ). **Conclusions:** Atropine therapy was commenced in 29% of the patients without any cholinergic feature. 79% of the patients developed atropine toxicity. Further education regarding treatment protocol on anticholinesterase poisoning is needed for doctors. **References:** 1. Eddleston M, Dawson A, et al. "Early management after self- poisoning with an organophosphorus or carbamate pesticide - a treatment protocol for junior doctors." *Crit Care* 2004;**8** (6): 391-7. 2. Fernando R. Management of poisoning , National poisons information centre, National Hospital of Sri Lanka, Colombo, .2007: 42-52.