# **TOXICOLOGY - II**

#### HYDROCARBONS POISONING

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Abstract: Hydrocarbon exposure is a common cause of accidental poisoning in children. Volatile hydrocarbons can be aspirated and cause chemical pneumonitis. Respiratory and central nervous system are most commonly affected. Clinical effects can be predicted by substance, route of exposure and dose. Kerosene is the most common chemical agent. Close monitoring and supportive care are the key to successful management. There is no documented role for prophylactic antibiotics and steroids. Ninety percent of hospitalized children with pneumonitis have benign clinical course and their symptoms improve within 72 hours. Fatality rate is low.

**Keywords:** Hydrocarbon, Poisoning, Kerosene, Pneumonitis, Accidental ingestion.

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## **Points to Remember**

- Kerosene ingestion is the most common cause of hydrocarbon poisoning in children followed by gasolene.
- Kerosene and gasoline with high volatility, low viscosity and low surface tension are more likely to get aspirated and cause lung injury.
- Affects the respiratory, CNS, gastrointestinal, renal, skin and hematological system.
- Chest X-ray taken shows changes within 2 to 8 hours after ingestion.
- Treatment of symptomatic children includes oxygen, IV fluids, beta2 agonists and if require, positive pressure ventilation.
- There is no role for steroids or prophylactic antibiotics.

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