



Diesel poisoning: A case series

Ashish Bhalla, Soumitro Ghosh, Ashish Bhalla Debaprasad, Susheel Kumar, Navneet Sharma
Post Graduate Institute of Medical Education and Research, Chandigarh, India.

Objectives: Diesel poisoning is an important cause of hydrocarbon related poisoning especially in drivers, farmers and auto mechanics in developing countries. Accidental aspiration of diesel may occur during siphoning of the fuel. Thieves, flame throwers or fire swallowers are at increased risk we present a series of 6 cases admitted to Post Graduate Institute of Medical Education and Research (PGIMER), Chandigarh emergency services.

Case Series: Retrospective audit of all patients with diesel poisoning was made by taking out admission files with final diagnosis of Diesel poisoning over last 5 years. The demographic details, along with presenting symptoms, biochemical abnormalities, radiology abnormalities and final outcome were noted. The results are presented as percentage of patients having abnormalities. All cases were male and were drivers or automobile mechanics. Mean age was 37 ± 16.17 years. Five patients accidentally ingested diesel while and one drank diesel by mistake. All of them had vomiting and two had aspirated vomitus while four aspirated diesel it directly while siphoning. Average amount ingested was around 46.7 ± 28.6 ml (Range: 20-100 ml). Symptoms started within six hours in all the patients. Commonest presenting symptom was dyspnoea and cough. Other symptoms were fever, chest and epigastric discomfort. All patients had tachycardia and tachypnea at presentation. Only one had hypotension which was fluid responsive. All patients had respiratory symptoms but only four had hypoxia ($SpO_2 < 90\%$ at room air). None had central nervous or cardiovascular system involvement. All patients had normal hemoglobin, Platelet count, coagulation profile and liver function. One patient developed transient acute kidney injury. Mean PaO_2/FiO_2 was 226.2 ± 104.5 , one had a ratio < 100 . 5 patients had consolidation, two had exudative pleural effusion and one had obstructive collapse of right lower zone. Flexible bronchoscopy and bronchoalveolar lavage done in two patients revealed foamy macrophages suggesting lipid pneumonia. Intubation and mechanical ventilation was needed for three patients. Average duration of hospital stay was 15.4 ± 7.3 days. Out of six patients, one patient (underlying COPD) died due type 2 respiratory failure and its complications.

Conclusion: Diesel poisoning is an important hydrocarbon related poisoning in adults. Severe hypoxemia, delay in presentation, prior respiratory co-morbidity and ventilator associated complications are associated with poor outcome.