



S8. CHEMICAL WEAPONS FROM THE FORENSIC POINT OF VIEW

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Chemical weapons including lung damaging agents, cyanide, vesicants, nerve agents, incapacitating agents and riot-control agents have a long history in our world. They are toxic chemicals and cause serious health damages, capacity loss of individuals and death. They affect many individuals in the used area. For this reason they are called weapons of mass-destruction. They can use military purposes or terrorist attacks.

However Organisation for the Prohibition of Chemical Weapons (OPCW) has an exact position on the prohibition of the development, production, stockpiling and use of chemical weapons and on their destruction, the problem continues in some part of our world. Possible chemical weapon use have ben discussed in the offical and/or public documents or in media in places where conflicts are appeared. There have been some blurred information about the toxic chemical use in these places.

The extenstive analysis of victims in the problematic area can enlighten the real reason of death or serious health damage. Each toxic chemical used for mass destruction has a specific toxic and chemical characteristics. Their biotransformation in the living systems and interaction with biological compartments define their analysis in poisoned individuals. Toxic industrial chemicals (phosgene and chlorine), cyanide, mustard, lewisite, phosgene oxim, nerve agents, incapacitating agents (BZ, Fentanyl derivatives) and riot control agents (CS, CN, CR, and OC) were reviewed and current forensic analysis of these chemicals in poisoned casualties and environment were discussed in this presentation.

As a result forensic toxicology laboratories can review their capabilities and positions after a toxic chemical use for destruction of big masses.