fare. Incidents caused by chemical agents are far more common than are biological and radiological agents. Factories, laboratories, farms, suicidal cases involving chemicals, and vehicles transporting chemicals and terrorism are potential sources of HAZMAT incidents.

Hong Kong Hospital Authority (HA) will provide consultations to the Hong Kong Special Administrative Region (HKSAR) about the medical management of HAZMAT incidents. In addition, to ensure an adequate supply of antidotes, the HA will cooperate with other agencies and all emergency departments in Hong Kong to deal with HAZMAT incidents. Since contaminated victims may arrive at hospital by their own transports, emergency departments should be prepared to decontaminate victims using at least Level C Personal Protective Equipment (PPE). In order to achieve the above objectives, each emergency department should acquire decontamination facilities, PPE, adequate stock of antidotes, and an updated database of hazardous material. Drills for HAZMAT incidents should be conducted at regular intervals.

Chemical incidents are uncommon. If one occurs, it will cause a major threat to the health of staff working in hospital. Medical preparedness is essential for effective treatment of victims and the protection of staff against chemical contamination.

Keywords: agents; chemical; contaminated; decontaminated; hazardous materials, HAZMAT; Hong Kong *Prehosp Disast Med* 2001:16(3):S109-110.

Management of Nerve Gas Casualties Prof. Foroutan, Seyed Abbas

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In the post-World War I era, the chemical warfare of Iraq against Iran is unique in various dimensions. From December 1980 to June 1983, there were experiments and military maneuvers and drills. From July 1983 to January 1984, there occurred localized and limited Iraqi chemical attacks carried out using mustard gas. From February 1984 until the end of war (1988), mustard and nerve agents were used on a large scale.

On 17 March, 1984, the first nerve gas, "tabun", was used against Iranians. Then, Iraq began to use sarin, and finally, a mixture of sarin+GF until the end of war.

Iranian cities on the western provinces and border villages had been the site of continuous chemical attacks by Iraq during March 1988. Both mustard and nerve gases were employed, but the role of nerve gas was more significant. On 17 March 1988, the city of Halabja, in the northeastern part of Iraq, was the site of a huge Iraqi chemical attack. People from this city and satellite villages were bombarded especially by nerve gas. Many Iranian villages, especially in the regions near Marivan city, were heavily bombarded by mustard and nerve gas.

The existence of a chain service system for treatment of chemical casualties drastically decreased the mortality and morbidity rate. Treatment used a practical triage system for nerve agent victims and administration of atropine, oxime, and diazepam.

Critical in the field emergency was administering the highest possible dose of atropine in the shortest period of time.

Keywords: atropine; chain service system; chemical; diazepam; Iran; Iraq; mustard gas; oxime; sarin; tabun; warfare.

Prehosp Disast Med 2001:16(3):S110.

Stress in Emergency Health Care Providers Dr. Angelina Chan

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Emergency Medical Service (EMS) is a particularly high stress field, working not only with the acutely sick and injured, but also in emotionally charged and, at times, dangerous physical environments. Increasing utilization of the EMS increase the risk of occupational stress and injury to EMS personnel.

Evidence exists suggesting that this particular group of health care workers are experiencing cumulative exposure to line-of-duty trauma, e.g., managing severely injured, dead, and dying victims, which may lead, not only to stress and burnout, but also to other forms of mental health problems. Hence, it is important to understand critical incident stress and the other associated types of psychological distress that may arise in this profession. Various risk factors, currently available interventions, and self-care are discussed.

Keywords: critical incident stress; emergency medical services; EMS; psychological distress; stress *Prehosp Disast Med* 2001:16(3):S110.

2.2. Prehospital Care: Air, Land, and Sea Operations

Another Type of Flying Doctor

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The world's commercial airlines have expanded dramatically in the past decade. The opening of new tourist destinations and the increase in tourist numbers have encouraged airlines to look at larger aircraft able to carry greater passenger loads over longer distances. The next generation of aircraft will be able to carry >500 people in a double-deck configuration.

At any one time, there are many hundreds of thousands of people flying. Many travelers today are elderly and a significant proportion have existing medical problems. The airlines dilemma is what to do should a passenger become ill on a flight. There are only two options, continue to the