INTRODUCTION TO "DISASTER RESUSCITOLOGY"

History of "Disaster Resuscitology." The late Rudolf Frey, Professor of Anesthesiology at the Johannes Gutenberg University of Mainz, West Germany (see pages VIII-X), founded the "Club of Mainz" in September 1976, following initiating discussions with Peter Safar at the "International Symposium on Mobile Intensive Care and Advanced Emergency Medical Services (EMS) Delivery Systems" in September 1973 in Mainz (1), and the drafting of objectives and plans with the founding members in 1976 in Geneva and Mainz. Throughout the initiating discussions, Safar stressed the following: Presently active national and international disaster relief organizations are public health oriented. In mass disasters, such as major earthquakes, these organizations have been rendering effective aid to uninjured survivors, usually starting one day or later after the disaster event. The majority of members of the Club of Mainz (now "World Association for Emergency and Disaster Medicine," WAEDM), are clinical leaders and scholars in resuscitation medicine. They recognize the need and opportunity to focus on the critically injured and dying, from immediately (minutes to hours) after the disaster strikes, to discharge from intensive care and outcome evaluation. There is a need to investigate retrospectively, concurrently and prospectively the potentials of modern rescue; life supporting first aid by trained uninjured bystanders; and advanced emergency and long-term resuscitation by medical field teams, during transportation and in hospitals (critical care medicine). The results of such studies should lead to cost effective plans for implementation. This new field of inquiry, planning and response, we call "Disaster Resuscitology." It would not include disaster prevention and rehabilitation, which are also very important, but which are beyond the expertise of the members of our association.

There is supporting evidence for the life saving potential of disaster related resuscitation medicine in civilian multi-casualty incidents and in military medicine during wars. The cost effectiveness of such a resuscitation approach to the victims of mass disasters such as major earthquakes, remains to be determined.

Resuscitation potentials in mass disasters are suggested by experiences and anecdotes presented at the 1973 Symposium on Advanced EMS Systems (1), The First World Congress on Emergency and Disaster Medicine of 1977 in Mainz (2), The Second World Congress of 1981 in Pittsburgh (this Supplement I, 1985) (3), The Third World Congress of 1983 in Rome (4), The Fourth World Congress of 1985 in Brighton (5), and the Fifth World Congress of 1987 in Rio de Janeiro in preparation (Host: Dr. Brenildo Tavares, Casa Postal 14700, Rio de Janeiro, Brazil 20,000; tel.: 21-2464344). In addition, interviews of earthquake survivors, including physicians, suggest the potential to save about 40% of the injured who later died, with immediate life supporting first aid by bystanders and advanced trauma life support within 6-12 hours (6). Causes of preventable death of earthquake victims who are accessible seem to be external blood loss, asphyxia from airway obstruction due to coma (head injury, hypotension) or dust inhalation, and crushing injuries.

The time has come to move from the retrospective appraisal of anecdotes to the acquisition of data within minutes to hours of the disaster event, by field researchers with resuscitation experience, who use study protocols to collect information at the scene and in receiving hospitals. The results of such research could then influence the plans of "National Disaster Medical Systems" (NDMS), which should be prepared by each country, through collaboration of health, civil defense and military agencies. The cost effectiveness of resuscitation components of NDMSs remains to be evaluated. International medical help would be facilitated by making NDMSs as uniform as possible worldwide.

History of this Supplement. The contents of this Supplement I, 1985 were first assembled and edited for the Journal "Disaster Medicine" of the Club of Mainz of 1983. The WAEDM membership and an unknown number of non-members received this Supplement I in the form of three numbers of 1983. In 1984, the publisher failed to produce "Disaster Medicine," which was discontinued. The WAEDM decided to preserve this important material for
members, non-member subscribers and libraries, by reprinting it in the form of Supplement I of the new Journal of the WAEDM, 1985.

The special features of this Supplement include: 1) upholding the memory of three leaders of resuscitation medicine and emergency care -- Rudolf Frey, Asmund Laerdal and Michael Pozzen; 2) introducing disaster-related resuscitation research in the laboratory, with patients, and in the community, as a new field of inquiry (Part I); 3) stressing self-training systems and impact evaluation of educational programs (Part I); 4) presenting summaries of international disaster relief organizations (Part III); 5) illustrating the importance of great differences in needed responses between multi-casualty incidents and mass disasters such as major earthquakes (Part III); and 6) initiating a needed dialogue between disaster medicine, military medicine, civil defense, and "peace medicine" (Part III of this Supplement and Volume I, Number 1, 1985).

Orders and subscriptions. WAEDM members, who paid the 1985 dues of $60, receive this Supplement I, 1985 as part of their Journal subscription, in addition to Numbers 1-4 of Volume 1, 1985. New members in 1986 will receive the Journal WAEDM Volume 2 for their 1986 dues; only if they pay an additional $60 to Dr. Baskett (Department of Anaesthetics, Frenchay Hospital, Bristol BS16 1LE, UK), will they receive Volume 1, 1985 including this Supplement I.

Non-WAEDM members, libraries and members who want additional copies of 1985, should order them from P. Safar, editor 1985 (Resuscitation Research Center, University of Pittsburgh, 3434 Fifth Avenue, Pittsburgh, PA 15260, USA; phone: 412/624-6735). Send $70 for Numbers 1-4 and Supplement I; $30 for Supplement I only; and $10 for each copy of Numbers 1, 2, 3 or 4. Orders for additional copies of 1986 should go to Dr. R. Adams Cowley (Maryland Institute for EMSS, 22 S. Greene Street, Baltimore, MD 21202, USA; phone: 301/528-5085).

References


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