Mental health services for victims of disasters

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Disasters, whether natural or man-made, affect lives and property, devastating communities through a chain of catastrophic sequences affecting social and economic developments. They are often events difficult to predict, prevent and control. They impact on individuals to create survivors who must cope with trauma, loss and crisis. They present a challenge to mental health professionals who have to assist the traumatized population. In afflicted communities, a large number of individuals are in the ranks of survivors and rescuers.

In order to design, organize and implement post-disaster crisis-oriented services, an integrated, interactive, flexible linkage system between the mental health organization and emergency management agencies needs to be established. It is important to realize that while mental health professionals organize to assist survivors, multiple activities are taking place within the governmental/public system. Decision making about the 'life situation post-disaster' of the survivor in our care is also managed by other agencies.

Identification of post-disaster need differences between groups of survivors can be exemplified according to whether the physical impact of the disaster is direct or indirect (1): *primary survivors* are those who have experienced maximum exposure to the traumatic event; *secondary survivors* are the grieving close relatives of primary victims; *third-level survivors* are rescue and recovery personnel, medical, nursing, mental health, Red Cross, clergy, emergency staff, firefighters, police; *fourth level victims* are other people in the community involved in the disaster – reporters, government personnel; *fifth-level victims* are individuals who may experience states of distress or disturbance after seeing or hearing media reports (e.g., bodies of individuals falling down from the Twin Towers after the terrorist attack in New York in September 2001).

POST-DISASTER TIME FRAMES

Dividing and labeling time frames in the sequence of a disaster is helpful to identify both the responses of survivors and the programs that are organized to assist them. Generally the phases are identified as 'threat'/'impact', 'short-term' and 'long-term' (2). Post-traumatic responses follow a sequence that resembles the emotions, thoughts and behaviors documented in the loss and bereavement process. Although the reaction sequences are not of fixed duration, there is a developmental process that has been identified and documented. This process of biopsychosocial coping starts with feelings of disbelief, bewilderment, difficulty in focusing, using denial as the main defense. Anxiety and fear are eventually followed by varied degrees of depression and sadness. Secondary events can influence these processes toward healthy resolution or produce pathological syndromes. Variables like intensity of impact, extended geographical destruction, rapidity of assistance are examples of modifiers that have emerged to categorize reactions to trauma. The inability to comprehend the reality of the destruction of the World Trade Center in New York following the terrorist use of commercial planes unleashed varied mental health disturbances, as well documented by interviews of the mass media.

IMPACT PHASE

Following the impact, the situation is dramatically and catastrophically experienced. Individuals in the affected areas will immediately mobilize themselves and participate with the efforts of rescue, shelter and safety for the citizens. During these efforts, they will organize themselves to deal with the priority of burying the dead, attending to the wounded, identifying frail members of the community, beginning to apply their knowledge of first emergency aid while waiting for resources from the outside (3).

After the first days, when the issues of survival, shelter, food and water are dealt with, mental health issues present themselves as needing attention and generally last beyond the healing of the physical trauma. The following list presents a summary of the key activities that need to be organized and operationalized to deliver a mental health program aimed to mitigate consequences of the disaster in vulnerable populations.

Outreach

These activities are organized in shelters, congregated groups and homes in devastated communities. They aim to provide emotional support during the acute period following a disaster. Outreach assists survivors in expressing and understanding disaster-caused stress, difficulty in sleeping and thinking clearly, and grief reactions, aiding individuals to return to a state of equilibrium and function. Information is given to clarify that their reactions and behavior are normal and are expected due to the abnormal situation in which they suddenly find themselves (4). Following the earthquake in

the Republic of Armenia in 1988, which resulted in over 250,000 deaths, efforts were organized by international agencies to develop an assistance program. In her report, A. Sanentz Kalayjian (5) compares the outreach efforts of that disaster to the earthquake in San Francisco and Hurricane Andrew in Southern Florida. She describes the difference of preparation, resources and preparedness following these disasters, pointing to the necessity of organizational capacity to assist survivors.

The emerging knowledge learned in disasters through the years helped professionals modify and reformulate intervention modalities to focus on the 'person-situation configuration' as the unit of attention in post-disaster psychosocial treatment. This intervention post-disaster is now well known. Post-disaster crisis counseling is defined as "a mental health intervention technique useful in post-disaster events that seeks to restore the capacity of the individuals to cope with the stressful situation in which they find themselves". It has three aims: a) restoring capacity of the individuals; b) reordering and organizing their new world; and c) assisting the victims to deal with the bureaucratic relief emergency program" (6). The methodology to bring about these objectives varies according to the 'school of thought' used by the professional. The reality circumstances mandate a short, flexible, creative, adaptable approach compared to the usual organized, systematic clinical approach. This is an area where continued efforts to adapt clinical skills and modified approaches will be enhanced as professionals learn from one disaster to the next. Differentiating variables like age, sex and cultural backgrounds point to the fact that both reactions and successful interventions differ in children, adults and the elderly of different cultures, traditions and religions.

Assisting families

When death occurs following the impact of the disaster, families need preventive mental health services, as they constitute a population at risk (7). The degree of loss, which includes loved ones, property, community, employment and unfamiliar surroundings, may overwhelm their coping capacity.

Offering help in the morgue, near the common burial grounds (where victims may be buried due to fear of epidemics) is a proper function for mental health workers. Collaboration with spiritual and religious representatives is very important. This is especially poignant when the body cannot be found/rescued and no burial plan can be offered as occurs in aviation accidents or multi-building fires.

Assisting survivors in shelters

Intervention procedures are related to the assessment of the shelter survivor situation. When this situation lasts more than a few weeks, the survivors' frustration can erupt in violence, anger and depression. The shelter mental health worker will have to ascertain how the condition of the survivors will impact on their ability in problem solving and coping with the challenges of the crowded environment found in countries with limited resources. A triage method to apportion resources needs to be developed. The ratio of needs and number of helpers will guide this procedure. Intervention objectives for the survivors in the shelter include helping them achieve physical comfort and increased capacity to organize their living area, as well as support to solve problems with the surrounding survivors. To concretely implement an intervention, the trained professional will first constitute himself/herself as a member of the sanctioned assisting team within the shelter. This permits the freedom to approach survivors and begin the interaction to offer support and guidance with respect to the expressed thoughts and emotions manifested by each survivor. The mental health helper will organize all his/her observations and data, as the survivor shares information about what happened to him/her, into a preliminary diagnosis, to ascertain the level of crisis and coping exhibited by the survivor. Using crisis techniques the intervention begins to be formulated, including emotional support and empathy, and accepting the feelings of denial and distortion. During the initial stages following the impact of the event, the survivor's cognitive system will cloud reality so as to filter painful thoughts. While receiving support, he/she will need at the same time personal guidance, assisting with plans and giving orientation and information. As time proceeds, the mental health worker may follow the survivor out of the shelter into temporary housing or have a team member continue with the assistance. During this period, a number of problems develop which survivors, emotionally traumatized, have difficulty in solving.

Collaboration, education and consultation with medical emergency personnel dealing with wounded or burned survivors will assist in the recovery toward a healthy outcome. It is important to verify if the population is struggling not only with the impact of the disaster, but also with a myriad of health and mental health problems preceding the disaster. The need to sort out the mental health status of the survivor will facilitate the triage work and assist in the decision for referral if long-term professional services are needed.

SHORT-TERM PHASE

The program objectives for consultation, education and assistance change during the weeks and months after the disaster. The acute phase is over and now a new post-disaster phase, that can last months, emerges with different problems facing the survivors. Mental health disaster workers can be trained to identify the new problems, which include all the ranges of depression, anxiety and post-traumatic stress disorder (PTSD). A variety of treatment approaches have been developed in the last few years, combining psychotherapeutic techniques

and medications. Many survivors of traumatic experiences suffer not only from the stress-related syndromes but also from depression, alcohol or drug abuse or personality disorders. If the disaster involved the death of a close family member, untangling the grieving process from the traumatic circumstances of the loss becomes an important part of the assessment. Treatment in general addresses two elements that are found in most survivors: the traumatic memories and the physiologic response of the organism that was exposed to danger. Both will last periods of time beyond the end of the event. Among the psychological treatment options, cognitive, exposure and behavioral approaches are being used by professionals. They aim to recreate, in a safe environment, the traumatic memories, fantasies, fears and sadness produced by the trauma. The survivor repeats the memorized events over and over and slowly but regularly they lose their capacity to inflict anxiety and pain. Medication therapy addresses many of the physiologic disorders. Antidepressant medication will lower anxiety and reduce sleep disturbances, startle reactions, difficulty in returning to function. Large trials of selective serotonin reuptake inhibitors are being carried out in order to assess their effectiveness in reducing the above symptoms. Additionally, group therapy, family therapy and therapy for children add to the choices available after a disaster.

Mitigation of further deterioration of the capacity of survivors can be achieved during this phase if preventive measures are taken. One important program that emerges is the school program for children, parents, teachers and administrators. Due to the fact that these individuals are congregated in institutions to help with the education of children, the opportunity to assist them as a nuclear population appears very effective if they are educated about preventive mental health approaches (8). Women, as heads of households in developing countries, are an important group that needs assistance in their functions of caregiver and to help them obtain resources to reconstruct their lives.

Another group that needs guidance are the survivors who have lost their homes and are frustrated in the lengthy rebuilding schedule of the country. Cases with diagnosable pathology are more frequent in this group and referrals to professionals need to be instituted.

Severe acute stress reactions, PTSD, depression and anxiety syndromes that increase in severity during this phase can be ignored, misdiagnosed or poorly treated if the professionals are not trained for disaster mental health problems.

LONG-TERM PHASE

A program of support services needs to be extended to the traumatized individuals for longer periods of time than generally is expected. When agencies are aware that a percentage of individuals at risk are unable to fend for themselves for a variety of reasons, their services can include assistance with finding shelter, employment and health resources. This part of the program is difficult to implement in certain countries due to the lack of resources.

'BURNOUT SYNDROME' OF CAREGIVERS

The mental health of rescue professionals following a disaster is an important component in emergency operations (9). Their job can expose them to the most gruesome sights and smells. Even though they are prepared, in their daily work as policemen, fire fighters, ambulance drivers etc., to come in contact with painful experiences, when this is multiplied by 100's or 1000's of bodies that have to be disposed of, the impact is severe. Nobody is prepared or immune to this devastating effect. Added to this, we need to consider fatigue, intense dedication to the task with reluctance to be relieved from duty, even for a short break. This was exemplified by the angry reaction of the firefighters who battled with police when they were asked to stop working in the area of the remains of the World Trade Center disaster. The basic components of the intervention consist of debriefing, identifying critical incidents, helping set the situation in perspective, and reinforcing the capacity and skill of the worker (10). The step-by-step procedures are as follows:

1. introduction to the objectives, format, time-table, confidentiality of debriefing;
2. asking the members of the group to voice their experiences;
3. sharing responses and reactions;
4. explaining and understanding the reactions;
5. identifying coping methods using cognitive and educational methods;
6. closing the meeting and offering further help if necessary.

UTILIZATION OF PARAPROFESSIONAL WORKERS

In some regions there is a need to develop a combination of professional and paraprofessional response teams to assist survivors. Professional and paraprofessional workers can combine efforts successfully to provide a disaster recovery response that is grounded in crisis theory and intervention techniques. Professionals have resorted to variations and experimentation utilizing a variety of human resources, according to availability. Certain conditions emerge as necessary to accomplish the objectives of successful use of paraprofessionals. These include:

1. individuals with some counseling experiences;
2. individuals with communication skills and sensitivity to the ethnic, social and religious characteristics of the victim;
3. training sessions and close supervision throughout the intervention program.

PRIVATE SECTOR UTILIZATION

Recently the private sector of mental health services has increased its volunteer activity after catastrophic impact on citizens in urban settings.

There are several conditions that need to be fulfilled before a private professional can participate in these activities. They include:

1. knowledge of local post-disaster plans and networking with disaster agencies (e.g., Red Cross, government teams, clergy);
2. skills in crisis intervention, consultation and education.

CROSS-CULTURAL ISSUES IN DISASTER ASSISTANCE

Some involvement of the political institutions in disaster response is universal and, in many cases, extensive. The level at which the government becomes involved differs significantly among various societies. Disaster response in the United States is deemed primarily a local responsibility, except when local resources are severely diminished by a direct impact. In other societies, however, disaster response is considered primarily a national responsibility of governmental involvement. In these pattern areas, the armed forces are given not only a major supporting role, but also frequently a controlling role in disaster response activities.

Religious institutions also differ in their involvement. In part, this is due to their degree of differentiation and institutionalization and, to a certain extent, to their secularization and the extent of the scope of their pre-disaster activity. The clergy has an important mental health role following some disasters, specially when there were large numbers of fatalities, as exemplified by earthquakes in Armenia, or slides in Honduras (11).

EDUCATION

Opportunities for media communication and dissemination of mental health information present themselves following a disaster. The human story in disaster is compelling and media professionals seek psychiatrists to interview at a rapid pace. In the midst of community crisis, the impact of these messages exert a strong influence. There are two specific areas that offer objectives to be accomplished by educational methods. One area deals with our knowledge of how the population has been psychologically affected by the trauma and the sequences of the stress response to the disaster. The other area is to offer knowledge of how the mental health system will respond and what professionals have to offer in post-disaster situations. Each of these areas has: a) methods; b) content; and c) structure to disseminate knowledge. Disseminating information about the mental health services, including consultation and education, facilitates the actual operations of assistance.

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