# (A293) Critical Incident Stress Management and Mental Health Strategies after the 2009 American Samoan Tsunami

D.B. Bouslough,<sup>1</sup> P. Biukoto,<sup>2</sup> S. Stracensky<sup>2</sup>

1. Emergency Medicine, Providence, United States of America

2. IBJ Tropical Medical Center, Pago Pago, American Samoa

**Background:** Tsunamis are infrequent but devastating natural disasters. Loss of life, livelihood, and property contribute psychological stresses to an affected population, resulting in new psychiatric illness.

**Objective:** To describe post-disaster hospital, Department of Human Services (DHS), and Department of Education (DOE) methods of mental health resource dissemination, and their effectiveness.

**Methods:** A retrospective review of after-action reports, psychiatric clinic charts, and key-informant interviews over a 4 month period was employed. Descriptive statistics were used to evaluate data.

Results: The September 29, 2009 tsunami claimed 33 American Samoan lives. Hospital Family Assistance Center counselors aided families in the identification of 12 corpses, 9 missing persons, and providing psychiatric referral. Fifty-four hospital staff suffered loss. (Loss of: transportation, n = 13; utilities, n = 15; homes/shelter, n = 2). Coupled with the stresses of providing post-event medical care, the hospital staff was at high risk for psychiatric sequelae. Debriefing sessions for hospital staff were poorly attended due to conflicting work responsibilities, and an unfamiliar discussion format. DHS assembled four teams, each composed of one psychiatrist/psychologist leader and 6 crisis counselors. DOE school counselors utilized DHS mental health teams to screen all school aged children. The hospital psychiatry clinic remained the definitive referral destination. Federal mitigation grants provided funding for two psychiatrists, and two psychologists (including pediatric specialists) to augment hospital mental health capacity. Screening statistics and prevalence of psychiatric disease are further reported. Six month post-event rates of persistent psychiatric disease reflect that reported in recent literature (1-2%).

**Conclusion:** Hospital critical incident stress management requires culturally acceptable counseling methods and administrative support. Family assistance counselors are key players in identifying the needs of families of the deceased. Student counseling services and collaborative mental health teams provide a novel approach to the dissemination of mental health services within a community.

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#### (A294) Women Widowed in the Disaster – A Psychosocial Perspective

G.C. Henry, K. Sekar Department of Psychiatric Social Work, Bangalore, India

Disasters refer to collective stress situations that happen or at least manifest themselves suddenly in a particular geographic area, involve some degree of loss, interfere with the ongoing social life of the community, and are subject to human management (Gist and Lubin, 1989). The World Disaster Report

(2001) has reported that about 211 million people are affected by natural disasters every year and the poorest are becoming more exposed to disaster risks and disasters set back the development process by decades. The Tsunami imposed a huge burden on the community not only physically but also in terms of psychological trauma inflicted on them. Asia remained the most affected continent. Nine of the top 10 countries with the highest number of disaster-related deaths were in Asia. Women play an integral part in the functioning of societies, with established roles and rules. Enerson (1998) in her review of twenty years of disaster studies reports study findings that show that women are progressively vulnerable. The vulnerability of women stems due to the pre existing social epi- centres. Vulnerable woman-headed households generally consist of women with severely handicapped husbands and young children, handicapped women, widows, and young single women. The widows have to bear and go through the grief of the loss of their spouse. They have the burden of increased responsibility towards their surviving children, aged parents/ in laws and other family members. The current study focus on understanding the impact of widowhood in the after math of the disaster.

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# (A295) Post Disaster Mental Health among Ethnic Minorities in Rural China: Results from Qualitative Studies

E.Y.L. Cheung, E.Y.Y. Chan, H.P. Lam, C.L.Y. Lin, P.P.Y. Lee CCOC

School of Public Health And Primary Care, Shatin, Hong Kong

**Background:** China has one of the countries with highest occurrence of disasters and disasters are disproportionately affecting rural area of China where ethnic minorities are inhibiting. Limited studies have been conducted to examine how mental health of ethnic minorities in China might be affected by disasters. Through qualitative focus group study methods, this multisite project examines the mental health impact of disasters in ethnic minority groups in rural China.

Methods: 20 focus groups were conducted in rural Sichuan, Yunnan, Gansu and Hainan province of China to understand the mental health impact and coping of disasters during 2008– 2010. Ethnic minority groups including Tai, Naxi, Li, Jiang and Hui affected by earthquake, flooding, mudslide, storm and snow storm were included for the focus group interviews. Guided questions were used and male and female participants participated separately in different groups. Focus groups were held at common area within the village and were all type recorded and transcribed for analyses. Saturation of data was reached and thematic analyses were conducted.

**Results:** Whilst distress, including mood disturbance, sleep problems and heightened arousal after disaster occurrences, were reported among respondents, when compared with Han Chinese affected in disasters, ethnic minority respondents reported more resilience and coping capacity post disaster. Gender impact and gaps in mental health service were identified.

**Conclusion:** Study results disparities in resilience and coping behavior among different ethnic groups in China. More indepth studies should be conducted to understand post disaster

mental health needs and service utilization of ethnic minorities in China. Prebasp Disaster Med 2011;26(Suppl. 1):s82–s83 doi:10.1017/S1049023X11002792

### (A296) Psychosocial Disaster Preparedness Program Form School Children

E.A. Raj, K. Sekar

Department of Psychiatric Social Work, Bangalore, India

The impact of natural disasters on individuals is substantial. Among the affected population in any disaster, children are identified as the most vulnerable group along with women, aged and disabled people. An estimated 77 million children under 15, on average, had their lives severely disrupted by a natural disaster or an armed conflict, each year, between 1991 and 2000 (Plan UK, 2003). Children are most affected since they loose the familiar environment, loss of parents, witness death of their loved ones, fear of reoccurrence of the disaster event. The impact of disaster on children of different age group is multiple times greater than that of the adults. This leads to various psychological problems in children (Dave et al., 2003). Disaster preparedness, through care givers, is one among the ways to reduce the distress of individuals followed by any disaster because it reduces the vulnerability factor that minimizes the impact of any disaster on the individual. A disaster preparedness program with special reference to psychosocial aspects was developed and implemented among the school children through teachers in Kanniyakumari District, Tamil Nadu, India, one of the severely affected areas in Tsunami. The current attempt was to standardize a disaster preparedness module focusing on preparing children to deal with their psychosocial issues before and after disaster in an effective manner. The outcome of disaster preparedness input through teachers and its reach out to the students was determined through an experimental research. The results reveal that the teachers and students from the experimental group gained significantly more knowledge on psychosocial disaster preparedness after implementation of the program in comparison to control group where the program was not implemented. The implications of the study points out the need to integrate psychosocial component of disaster preparedness in to the broader Community Based Disaster Preparedness (CBDP) programs.

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# (A297) Psychosocial Care for Children Survivors of Tsunami Disaster - Pondicherry Response, India

E. Sinu,<sup>1</sup> K. Sekar,<sup>2</sup> R. Dhanasekarapandian<sup>2</sup>

1. Psychiatry, Manipal, India

2. Department of Psychiatric Social Work, Bangalore, India

Tsunami left 7997 people dead in Tamil Nadu. Nagapattinam, Cuddalore and Kanyakumari districts were worst affected in terms of human and property loss.. Highest number of children death (1776) were reported in Nagai District. In Project Area, Totally 522 children died due to tsunami in Pondicherry (152), Cuddalore (222), Chennai (48) respectively. Considering massive death of Children in Tsunami Disaster, Rural Development Integrated organization (RIDO) along with partnership of Plan International and Technical Support from National Institute of Mental Health and Neuroscience (NIMHANS) provided psychosocial care for tsunami affected children in the regions of Union territory of Pondicherry, Cuddalore and Chennai. Totally 150 community level workers; 50 from each region were selected and trained for a period of 1 week on psychosocial care for children affected in Disaster through using different mediums by master trainers who underwent intensive Training of Trainers program on psychosocial care for tsunami affected children at National Institute of Mental Health and Neurosciences, Bangalore which is a nodal agency in India on psychosocial care in Disaster management. Psychosocial care program for tsunami affected children was carried out over a period of 2 years in afore said regions and handholding support was given to the community level workers periodically in the field. The psychosocial care program was provided for children in their own community by their own community volunteers through group based activities using different mediums. Mediums used to provide psychosocial care were unique in their own way which brought out the underlying emotions of children related to tsunami. Emotional perceptions differed among children across the age groups. Involving the community level workers in providing the psychosocial care for children survivors of tsunami disaster showed encouraging results. Challenges, limitations and lessons learnt in providing psychosocial care for tsunami affected children through community level workers will be discussed.

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#### (A298) Assessment of Psychosocial Impact of Flood on Children - Indian Experience M.N. Vranda, K. Sekar

Department of PSW, Nimhans, Bangalore, India

A Disaster is the tragedy of a natural or human made hazard that negatively affects society or environment. Disaster impacts physical, psychological, social and economic areas of the individual and family and community. Most of the time these are interlinked to each other and its total impact on the survivors is substantial. Children are more susceptible to disaster suffering, and it is noticeable in many complex psychological and behavioral symptoms. On the other hand, the post-disaster psychological effects on children are not recognized and underestimated by the mental health professionals. India is highly prone to natural disasters such as floods, droughts, cyclones, earthquakes and landslides have been recurrent phenomenon in India. Out of 602 districts in the country, 125 districts have been identified as most hazard prone areas. The recent heavy rainfall and flood between 28<sup>th</sup> September to 2<sup>nd</sup> October 2009 in the Northern region of Karnataka State caused several deaths and massive destructions. This was the first time that North Karnataka received highest rainfall. The incessant rainfall that poured for four days caused the flood and devastated and destroyed the entire social fabric of the community. Floods carry greater risks to psychological as well as physical health of children. The psychological impact of the floods on children has been carried out both qualitatively and