

Impact of Natural Disasters on Children around Ngorima Clinic, Chimanimani.

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ABSTRACT

During disasters most humanitarian organisations focus mainly on food, clothing and shelter provision. This is despite that several issues will be affecting the survivors. This food, clothing and shelter assistance rendered is mostly centred on household levels taking parents and guardians as the most affected at the expense of children and minors. The psychosocial effects of exposure to trauma are significant to all age groups, but evidence concerning the experience of disaster-affected children is limited. The main aim of this paper was to conduct research inclusive of children and minors during such catastrophes. The study sought to assess impact of natural disasters on children around Ngorima clinic, Chimanimani. The research had 100 participants aged between 9 and 19 years, both males and females. The researcher adopted purposive sampling. Collection of data, involved interviews, focus group discussions, observations and document analysis. The data processed was presented into tables, graphs. Descriptive statistics was used to process data. Physical and infrastructural destruction was extensive to all the participants, psychological effect was present although most people did not initially think it was a major concern. There was also mention of emotional impact, educational disturbances and services deficits as well as disturbances of the social fabric and cohesion. Additionally, during disasters, transition stages are permanently disrupted, physiological wellbeing severely impacted and life prospects diminished by natural disasters whose impact can be avoided or mitigated. These findings led to the following conclusions: people from low status don't value their mental health as much as they do the physical aspect. Participants had psychological and emotional strain but could not fully comprehend that it was indeed an issue for urgent attention. Humanitarian aid was more than 85% aligned to food, shelter and clothing. In light of the above, it is important to have the following recommendations: Governments to establish structures supportive of psycho-social support mechanisms for disaster mitigation, to prioritize mental health for all. In addition, a policy should be in place to have a balanced service provision. Responsible stakeholders should have a quota system in their aid to include mental health as they offer humanitarian service. Lastly, evidence-based mental health interventions should be adopted during disasters.

Key words: Impact, natural disaster, children

INTRODUCTION

Natural disasters are some of the leading threats to the livelihoods of people including children across the globe, including Zimbabwe. Some of them can be predicted while some cant, some can be mitigated while some are beyond this. Despite all the circumstances, scholar over the world have looked into impact of disasters. They have scrutinized services needed in the aftermath of a disaster. However, most of their focus is on adults, parents and caregivers. This has alienated children as if they don't get negatively impacted by theses disasters. It shows there is still dearth in research regarding the impact of natural disasters on children. Living through a natural disaster is a traumatic experience for everyone, but especially for children Centers for Disease Control and Prevention. (2020). This study sought to help close that research gap by conducting an investigation into impact of natural disasters on children, in the rural areas of Ngorima clinic,

Chimanimani District, Manical and Province, Zimbabwe.

LITERATURE REVIEW

In the aftermath of natural and technological disasters, as well as terrorist attacks economic and psychosocial sequelae can be intense and of varying durations depending with personal biopsychosocial dispositions. Posttraumatic stress symptoms and full syndrome disorder, depression, anxiety, somatic complaints, and excessive alcohol use have been demonstrated consistently, particularly following large-scale disasters.

During any major event, be it negative or positive, the main focus is always on adults. This separates children from the whole film as it unfolds. Whilst adults have the role to safeguard their children, it is also imperative to include children in daily activities including consultations and in loco experiences. It is worse when there are negative world events like disasters when children are not recognized as if they don't feel the impact. Excluding them leaves indelible negative marks in their lives.

The impact of natural disasters on children is a global concern as can be attested to by literature that has been produced in other parts of the world regarding the phenomenon. Centers for Disease Control and Prevention. (2020) emphasised that disasters continue to hinder progress in child welfare and development, despite global efforts to meet the Millennium Development Goals and to respond better to the growing number of emergencies. Lone and Subrimani (2016) Communities will always face natural hazards, but today's disasters are often generated by, or at least exacerbated by human activities. At the most dramatic level, human activities are changing the natural balance of the earth, interfering as never before with the atmosphere, the oceans, the polar ice caps, the forest cover and the natural pillars that make our world a livable home. But we are also putting ourselves in harm's way in less visible ways. Subrimani (2016) also determined that different natural disasters such as floods, cyclones, earthquakes, droughts, tropical cyclones, landslides, windstorms and typhoons have different and some common causes.

Despite the existence of a robust policy framework on disaster preparedness and response and an integrated approach coordinated by the Civil Protection Unit, children remain vulnerable to the impact of natural disasters in Zimbabwe. It seems children's current and future goals are temporarily or be permanently disrupted. Their physical, economic and psychological wellbeing impaired with life prospects diminished by natural disasters whose impact can be avoided or mitigated. It is with this concern in mind that this study sought to unveil the overall impact of natural disasters on children in Zimbabwe.

Maslow ranked hierarchically human needs from the most basic one on the bottom, immediate physiological needs (like food, water and health care) to self-actualization in the top. He postulates that people will always strive to fulfill their needs, but do so in a hierarchical manner. In order to focus on esteem, first all the 'lower' positioned needs will have to be met (Maslow, 1943).

Maslow's pyramid of human needs can also be applied in case of a disaster or calamity. Whilst taking this hierarchy of needs into account, it becomes clear that in times of a disaster even the most basic human needs are at risk. During a disaster or calamity people can lose their homes, their access to food, water and health care is threatened, the overall situation could be unsafe and even the loss of loved ones or one's own life are potential risks. Individuals and their psychological, physical and social needs are challenged, causing stress to those that fall victim to a disaster or calamity. In order to minimize traumatic stress after disasters or calamities, first of all the basic, physiological needs of victims will have to be met. Whilst these issues are a common theoretical view accepted by almost every researcher, it is not always the case during disasters as children's concerns are addressed sometimes without involving them this has been noted to impact negatively on them. Whatever will be done will focus mainly on adults, leaving children at the mercy of all sorts of impact.

Several theories, posits that psychosocial effects of disaster involve, among other consequences, severe traumatic stress. This stress is expected to be caused by the rapid resource loss due to the disaster or calamity. Maslow's theory of motivation, stating that people have hierarchically classifiable needs in terms of significance, led to the assumption that needs and resources can be ordered hierarchically. Now, which psychosocial victim needs are pointed out as significant within scientific literature? As alluded to earlier, parents and caregivers get the most attention and are practically supposed to participate in the activities. It is from this perspective that the researcher focused only on the always sidelined group, which is children. These theories pushes us to wear multi-dimensional lenses with which to holistically examine impact of disaster on children, that is, psychological, physical, social, educational, economical and existential.

Annually, India is hit by at least one major natural disaster or the other where in the loss of life is accompanied by other losses of the magnitude that is difficult to comprehend. Different natural hazards cause varying levels of physical damage to infrastructure and agriculture with implications for their indirect and secondary impact. All these do happen in the eyes and lives of children as well. Datar, A., Liu, J., Linnemayr, S., & Stecher, C. (2013)

According to United Nations Children's Fund (UNICEF). (2011) Children are more likely to have social challenges if they have Health challenges, exposed to multiple potentially life-threatening disaster events like seeing trees fall, seeing windows break, being injured, or witnessing someone else be hurt (Kelley, M. L, 2010). Further, the issues of communicable diseases such as cholera and typhoid during floods times. The service providers including hospitals and clinics are destroyed.

Education of children is severely affected and impacted as children who miss school for extended periods after a disaster are more likely to have lower grades or drop out. Once schools are destroyed interruption of school activities becomes inevitable.

Peek, L. (2008) opines that these after-effects include displacement of populations, environmental changes and increased vector breeding sites. Unplanned and overcrowded shelters, poor water and sanitation conditions, poor nutritional status or insufficient personal hygiene are often the case which may cause diarrhorrea and other water bone diseases. Consequently, there are low levels of immunity to vaccine-preventable diseases, or insufficient vaccination coverage and limited access to health care services. United Nations Children's Fund (UNICEF). (2011)hinted that children living in poverty, children who are minorities, and children living in temporary or unstable housing are particularly vulnerable. And this is always the case during disatres as people are likey to lost shelter and property

There is a likelihood of a surge in both communicable and non-communicable diseases spreading after floods such as Cholera, Typhoid and Diarhorrea. The water sources are contaminated, therefore accessibility to clean and safe water is thereby affected.

According to United Nations Children's Fund (UNICEF). (2011) all these consequences of disaster affect children psychologically more than they do adults. They therefore impact on all aspects of the children's lives including schooling, physical health, eating, sleeping, growth and social adjustment. Despite this abundant evidence, little is done to draw the attention of policy makers and institutional frameworks to guarantee more effort towards children's psychological welfare during disasters

Havenaar, JM, Rummyantzeva, GM, van den Brink, W, report that earthquakes, storms, and other hazards killed about 3.3 million people between 1970 and 2010, an annual average of 82,500 deaths worldwide in a typical year, a small fraction of the roughly 60 million who die every year and of the 1.27 million killed in traffic accidents alone. According to WHO (2019), disasters kill many simultaneously affecting infrastructure and other valuables.

A disaster obviously hurts those affected. Peek, L. (2008) asserts that the most severe impact of natural disasters on communities is obviously the death toll, injuries, destruction of homes, property, livestock, crops and the homelessness and food insecurity that often follow. Stewart (2018) argues that it also spares many in the affected area, yet those spared may be indirectly affected. All community stakeholders suffer when a cyclone spares their premises but destroys their neighbors, infrastructure, livestock and crops.

Chaugam (2017) also suggests that a disaster undoubtedly reduces the well-being of those affected, and even if survivors recover and consume at their earlier levels, they will have suffered in the immediate aftermath. All these forms of help might not even benefit children as in some cases, parents abuses the assistance, getting drunk or being on drugs yet the grants were meant to benefit everyone including children.

Many studies have examined how disasters affect people in the short run, and have found some adverse effects on schooling, cognitive abilities, and mental health. Peek, L. (2008) argues that some survivors are pushed over the edge and never completely recover: widespread droughts in Africa result in stunted and malnourished children, with permanent adverse effects. The author posits however, that an effective safety net can reduce these consequences, but not every safety net is effective.

Kousky, C. (2016) found that in post disaster, some of the children particularly those in their pre-teens experienced psychological trauma that interfered with their eating and sleeping habits. According to LaGreca, AM, Silverman, WK, Vernberg, EM, Prinstein, MJ, many of the children reported insomnia, a general lack of appetite and significantly scaled back social and physical activity which posed several health risks. According to Covaciu (2018), it was discovered in her study in Haiti, that many of the children exhibited a significant drop in body mass, had a pale appearance and showed signs of emotional anxiety. According to LaGreca, AM, Silverman, WK, Vernberg, EM, Prinstein, MJ, some of the children developed psychological conditions such as anxiety, Attention deficit Hyperactive Disorder (ADHD), panic attacks and manics, depressive and mood swings. According to the same author, institutional support for these children and their families is limited in Haiti. These health complications significantly interfered with day to day life and posed the risk of these children developing even more severe health related problems in future, shortening their life span.

The stress of such a loss, Fox says, doesn't necessarily rest solely on the shoulders of the victims. Those with relatives affected by the disasters may also experience trauma, due to the level of concern they have for their relatives. Simply following the news of these tragedies can shake an individual's sense of security and safety. Living through a natural disaster can completely disrupt a person's normal routine, whether that involves school, work or life in general. In addition to a shaken sense of security, the effects of this include shock, anger, depression and hopelessness. According to Fox, the amount of time it takes to move past these emotions is dependent upon a number of factors, including the amount of available resources and community support, as well as finding healthy and positive ways to express negative emotions.

Fox says. "Being able to connect with others, taking advantage of community support and avoiding social isolation is very important to coping and recovery."

For his study in Zambia, Conteh (2015) found that the desire to escape a new, more deprived and often lonely reality consequent to the natural disaster, many of the children engage in unhealthy coping

mechanisms that include delinquency or early onset of sexual activity. According to Conteh (2015), these children are therefore more vulnerable to diseases, crime and abuse. Conteh (2015) concluded from his study that untreated psychological trauma in children that eventually manifests in unhealthy and anti-social behavioural tendencies effectively reduce the lifespan of those children. Conteh (2015) argues that there is abundant evidence to suggest that children that have been traumatized by natural disaster are more vulnerable to teen pregnancies, sexually transmitted diseases, substance abuse related illnesses and becoming criminal offenders if they do not get post-disaster rehabilitation and material assistance.

Rabalao (2010), findings from a South African study indicate that many of the children that experience the trauma of floods often do not continue to performance well in school particularly if they do not receive psychological rehabilitation services post-disaster. Rabalao (2010) asserts that diminished educational prospects are among the most significant psychological impacts of natural disasters on children's livelihoods. Rabalao (2010) opines that because children do not only acquire an education for employability later in life but also develop social, physical and functional skills development, most of the children that are traumatized by natural disasters miss out on this development. According to Rabalao (2010), there was adequate evidence in the study to indicate that the children in the study began to engage in school and classroom activity significantly less post disaster and their grades dropped. This author concluded that this is an indication that the psychological and emotional toll of experiencing disaster had significantly interfered with their learning.

Similarly, North, CS, Nixon, SJ, Shariat, S, found in his study in Mozambique that such psychological impact of disaster as Post-Traumatic Stress Disorder (PTSD), depression, anxiety, emotional distress, sleep disorders, somatic complaints and behavioral problems lead to significant occupational problems that diminish children's prospects in life. For example, Shore, JH, Tatum, EL, Vollmer, WM, (1986) found that these psychological impacts significantly enhance the child's physical vulnerability to illness and disease, malnutrition, health stress and Physical and sexual abuse. According to (Shore, JH, Tatum, EL, Vollmer, WM, 1986) there is enough evidence to suggest that this continuum of negative impacts eventually leads to missed school, poor academic performances, and delayed progress, failure to complete education, inhibited social development, restricted functional development and proneness to anti-social and delinquent behaviour if psychological help is not provided timeously and comprehensively. This study therefore determines whether there is a continuum from psychological trauma to significant physical, educational and occupational challenges for children that have been affected by natural disasters in the Chimanimani District of Zimbabwe.

METHODOLOGY

The complexity of the research and the desire to get raw, unfiltered information pushed the researcher to utilize a mixed research approach comprising both qualitative and quantitative approaches. Based on the phenomenological research design the study used purposive sampling which led to the successful selection of 100 participants. These were children between the ages of 9 and 19 years old affected by Cyclone Idai. 60 were females while 40 were males. In-depth interviews and focus group discussions were employed to collect data. A review of related literature was also used to buttress the endeavor. Data derived from these were tabulated and presented in the form of tables and narrations

RESULTS/FINDINGS

Table 1: Participants by age groups

Range	Frequency	Percentage
9-11	23	23%

12-14	25	25%
15-17	35	35%
18-9	17	17%
Total	100	100%

Table 2: Distribution by gender

N=100

Gender	Frequency	Percentage
Males	40	40
Females	60	60
Total	100	100

Table 3: Impact by aspect

N=100

Aspect	Females	Males
Emotional	58(96%)	30 (75%)
Physical	40 (67%)	40 (100%)
Psychological	60 (100%)	40 (100%)
Social	56 (93%)	30 (75%)

Generally female participants were severely impacted as some got pregnant, some forced into early marriage. It was also noted that gender-based practices had biased priority by continuing educating boy child after disasters.

Psychological Effects: The Cyclone Idai brought in mental health challenges. During and post Cyclone Idai many children reported post-traumatic stress symptoms after experiencing a disaster, such as having thoughts recurring about the disaster, having sleeping difficulties, with concentration of some being affected. Participants indicated a higher level of altered eating and sleeping patterns

Emotional impact: The emotional toll of natural disasters was more devastating. Seeing dead bodies, loved ones missing, that was a daunting experience. Most participants felt that less attention was given to them as parents focused mainly on recovering lost property or looking for daily provisions. Girls easily noticed emotional distance from parents with 96% of them mentioning it.

Social disruptions-Educational Disturbances and deficits of health facilities. The schools and other social amenities infrastructure were affected. There were no schools and functional health facilities. During the recovery period after disasters the children experience multiple stressors incidences, which can be parents changing or losing jobs, moving to a new home, residing in emergency camps or going to a new school. Whilst every child /participant agreed that social interruption was a concern, boys seemed less perturbed by this than girls.

CONCLUSION

The Cyclone disaster brought unforgettable experiences for everyone in the Chimanimani. There was a disruption of daily activities, serious depletion of social protection and social amenities and other infrastructures. After people died, with some injured or displaced children experienced stress, confusion and trauma disorders as a result of such an unfortunate event in their life time. The healing after such experiences is difficult and it might take some time to be realized. In the aftermath of any disasters, life goes

on for all the survivors and most activities resume. Whilst some people will be able to rebuild their homes and replace personal possessions consumed by the disaster, it is the emotional and psychological impact, that remains lingering for some time, albeit, invisibly. Ultimately, most people are able to move beyond the experience of loss and disaster, but some of this relates to the availability of social and economic resources to aid in recovery and to the responsiveness of those around them. Finally, it was concluded that children are negatively impacted socially, physically, psychologically and emotionally.

RECOMMENDATIONS

From the conclusions, it is highly recommended that Pre disaster psycho-social support be available. Setting up disaster mitigation committees and establishment of robust disaster preparedness systems.

There should be clear cut support structures specifically for children in the aftermath of calamities.

Interventions for victims of disasters to focus on the positive and engage them in stress-reducing activities, using individual, family and group sessions. Responsible stakeholders should have a quota system in their aid to include mental health and evidence-based mental health interventions should be adopted during disasters.

REFERENCES

1. Centers for Disease Control and Prevention. (2020) Caring for children in a disaster: how are children different from adults? (n.d.). Retrieved March 27, 2020, from <https://www.cdc.gov/childrenindisasters/differences.html>
2. Datar, A., Liu, J., Linnemayr, S., & Stecher, C. (2013). The impact of natural disasters on child health and investments in rural India. *Social Science and Medicine*, 76(1), 83–91. <https://doi.org/10.1016/j.socscimed.2012.10.008>
3. Disaster Preparedness Advisory Council. (2015). Ensuring the health of children in disasters. *Pediatrics*, 136(5), e1407–e1417. <https://doi.org/10.1542/peds.2015-3112>
4. Havenaar, JM, Rummyantzeva, GM, van den Brink, W, Long-term mental health effects of the Chernobyl disaster: An epidemiologic survey in two former Soviet regions. *Am J Psychiat* 1997;154:1605–1607. Google Scholar
5. Katz, CL, Pellegrino, L, Pandya, A, et al. : Research on psychiatric outcomes and interventions subsequent to disasters: a review of the literature. *Psychiat Res* 2002;110:201–217. Google Scholar
6. Kousky, C. (2016). Impacts of natural disasters on children. *The Future of Children*, 26(1), 73–92.
7. La Greca, A. M., Silverman, W. K., Lai, B., & Jaccard, J. (2010). Hurricane-related exposure experiences and stressors, other life events, and social support: Concurrent and prospective impact on children's persistent posttraumatic stress symptoms. *Journal of Consulting and Clinical Psychology*, 78(6), 794–805. <https://doi.org/10.1037/a0020775>
8. LaGreca, AM, Silverman, WK, Vernberg, EM, Prinstein, MJ: Symptoms of post-traumatic stress in children after Hurricane Andrew: A prospective study. *J Consult Clin Psychol* 1996;64:712–723. Google Scholar
9. North, CS, Nixon, SJ, Shariat, S, et al. : Psychiatric disorders among survivors of the Oklahoma City bombing. *JAMA* 1999;282:755–762. Google Scholar
10. Peek, L. (2008). Children and disasters: Understanding vulnerability, developing capacities, and promoting resilience—An introduction. *Children Youth and Environments*, 18(1), 1–29. Retrieved from <https://www.jstor.org/stable/10.7721/chilyoutenvi.18.1.0001>
11. Pfefferbaum, B., Jacobs, A. K., Griffin, N., & Houston, J. B. (2015). Children's disaster reactions: The influence of exposure and personal characteristics. *Current Psychiatry Reports*, 17(7), 56. <https://doi.org/10.1007/s11920-015-0598-5>
12. Save the Children (2007). *Legacy of disasters: The impact of climate change on children*. London.

Retrieved from: <https://resourcecentre.savethechildren.net/library/legacy-disastersthe-impact-climate-change-children>

13. Shore, JH, Tatum, EL, Vollmer, WM: Psychiatric reactions to disaster: The Mount St. Helens experience. *Am J Psychiat* 1986;143:590–595. Google Scholar
14. United Nations Children’s Fund (UNICEF). (2011). Children’s vulnerability to climate change and disaster impacts in East Asia and the Pacific. Retrieved from https://www.unicef.org/media/files/Climate_Change_Regional_Report_14_Nov_final.pdf