

## **Social Impacts of Nepal Earthquake: Field Research in Sindhupalchowk**

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### **Abstract**

Gorkha Earthquake, on 25th April 2015 was the worst natural disaster to occur in Nepal to this date. Images of the suffering and destruction in the aftermath of this massive disaster, presented by the journalists, survivors, and humanitarian aid agencies, generated a global expression of solidarity for the people of Nepal. Sindhupalchowk was one of the worst affected districts. Due to its remote location, issues of accessibility arose that exacerbated relief work and hindered rapid disaster response. Vulnerable sections such as marginalized ethnic minorities, lower caste communities and people living in remote geographical regions are often deprived access to social services. This field research, conducted in the immediate aftermath of the disaster, was an attempt to document the testimonies of the survivors, their struggles and the sociological implications of the Nepal Earthquake.

**Keywords:** Nepal Earthquake, Community Resilience Sindhupalchowk, Post-Disaster Needs Assessment, Social Vulnerability

### **INTRODUCTION**

The epicenter of the earthquake was in Gorkha, but the Sindhupalchowk district suffered the strongest aftershocks, that caused large scale property damage and loss of life. As per the statistics presented by Ministry of Home Affairs, Nepal, it was estimated that 3,057 people died, 860 people were injured and 3000 people were missing in Sindhupalchowk.[1]Sindhupalchowk district faced the highest level of losses in physical infrastructure. Most of the roads and telecommunication lines were disrupted after the earthquake. It was estimated that almost 40% of the people in the district were in the need of assistance after the earthquake.

Sindhupalchowk is divided into two geographical regions; the northern mountainous region and the southern densely populated low hill region. As the southern part of the district was still well connected to the capital city Kathmandu it received unobstructed aid. However the northern part, which suffered the higher loss of life and property was not as well connected and as a result had fewer aid agencies active in the area. The northern part, including, Chautara, faced large-scale destruction due to the earthquake and its aftershocks which triggered multiple landslides. It was reported that most of the settlements in this region were completely flattened. Some of the regions including the Mankha Village Development Council (VDC) had faced landslides and floods in 2014 and were still recovering. This earthquake destroyed the efforts at

recovery and caused further damage to infrastructure in addition to lasting psychological damage to the inhabitants. Communities living in small villages, afraid of the reoccurring aftershocks, were living in makeshift structures created primarily from the sheets of tin that once formed the roofs of their homes. Some were cleaning the debris and trying to rebuild their homes. The physical damage caused to the homes caused psychological trauma and distress to the community. During a focus group discussion, many community members declared that they had lost faith in the traditional method of building homes. They declared that they wanted government or NGO intervention in the form of knowledge disseminating and training programs for creating disaster-resistant homes. They were aware that the initiation of such interventions could take a long time and declared their willingness to wait. The approaching monsoon season, the shortage of building materials in the aftermath of a disaster and the resultant high prices compounded issues of rebuilding homes. While the Government had allocated open spaces for building makeshift tents in the Kathmandu Valley, not all people had access to these spaces as roads were blocked by landslides and mobility was limited within VDCs.

UNOCHA stated that people living below the poverty line were the worst affected and most vulnerable as their houses which were made of mud and clay were destroyed after the earthquake. [2] Their vulnerabilities were further exacerbated if they were from minority groups as they are likely to be more affected by disasters than their counterparts. Therefore, humanitarian agencies appealed for immediate intervention for the construction of shelters for vulnerable communities before the onset of the monsoon season in June. Post-earthquake, the Government of Nepal implemented a 'one door' policy to ensure proper distribution of relief material. The government advised NGOs to establish a clear set of roles and responsibility and deliver the relief material through a uniform channel to avoid duplication of relief material. In the pre-monsoon season shelter and food were the two most important sectors that needed to be addressed. The process of aid distribution often has problems of mistargeting due to inclusion and exclusion errors. Some of the villages that were highly impacted after the earthquake were not given appropriate relief. One of the reasons could be the way government defined and classified destruction. These definitions of destruction levels were also used by international relief agencies active in the area. This can result in, highly impacted communities within relatively lesser impacted wards not receiving appropriate aid as they are generalized as less affected. Remote areas were also more

likely to receive less aid than the district headquarters as most of the roads were blocked due to multiple landslides. The earthquake exacerbated the social inequalities in the Nepalese society. Lower caste groups were more affected by the earthquake than upper caste communities. Exclusion and discriminatory practices keep the lower caste people out accessing credit, therefore, they were more likely to seek loans from informal moneylenders, who charge high rates of interest. This could impact their recovering strategy and increase their susceptibility to be caught in a debt trap after the disaster.

A major sector affected after the earthquake was the livelihood. People living under the poverty line were most vulnerable after the disaster. Around 70 per cent of the households in Nepal had borderline consumption of food that could get reduced after the disaster. [3] Therefore, the government and NGOs initiated programs to supply food kits to the affected population. For long-term recovery, livelihood restoration is important. Cash for work schemes introduced by relief organizations can provide alternate livelihood options for the affected population. By cleaning debris, improving the waterways and restoring the agricultural fields, affected populations, not only received a source of income but can also assist in the recovery process of their villages. It was estimated that the education of 1.5 million children was affected by the disaster. [3] Loss of homes, school closure, and constant aftershocks created a sense of anxiety and insecurity among the students. In such a situation Child-Friendly Spaces (CFS) can be an effective and important measure to continue the non-formal education of children and work towards their psychosocial well-being. Students who have lost their text books, school bags, stationary kits and other important study material should be provided with all the important resources. Therefore, the government needs to initiate projects to build the schools to facilitate an improved learning environment. Programs to train teachers to educate children on issues of disaster risk reduction and disaster management practices should also be introduced to create the idea of safer, disaster resilient schools.

Water, sanitation, and hygiene are primary concerns after the disaster. The community water systems were disrupted in most VDCs. Due to this, the villagers had to travel longer distances to fetch water. The earthquake destroyed a large number of toilets, which negatively impacted the privacy and safety of females. [4] In some cases the drainage and water supply pipelines cracked, polluting the potable water that led to the spread of water-borne diseases. The government made restoring the water supply of the communities a priority and distributed chlorine tablets for purifying water. Plans were created to construct new toilets.

Mental health situation in Nepal is a concern primarily because the political violence and social unrest in the last decade had already increased the cases mental health patients. Psychological distress, depression, anxiety and PTSD are some of the most common symptoms of bad mental health, which may increase after the earthquake. [5] There is also a sociological dimension to mental health, as people coming from the lower caste, females and older people are more likely to become victims of bad mental health. Former child soldiers and refugees from Bhutan are highly susceptible to bad mental health. Male as compared to females are more likely to commit suicide after the disaster, as they are considered the caretakers of the house. The idea of self-

esteem, “ijjat” and social marginalization in Nepal, “beijjat”, are strongly ingrained in the Nepalese society which may also increase the chances of marginalization and depression among the communities. Old people are one of the most vulnerable groups after the earthquake. It is estimated that 7.9% of the Nepalese population constitute the old people.[6] However, the relief agencies may find it more difficult to identify and address this group for humanitarian aid. Old people have a limited mobility and unlike younger people, they often cannot access centralized relief distribution centers. In some conditions when the parents are injured or dead, the elderly are the only ones available to take care of the younger ones, which increase their responsibilities and vulnerabilities. Old people with disability and no family members have a higher level of vulnerability. Therefore relief agencies need to start advocacy for inclusionary practices to accommodate the needs of old people. Services including cash assistance and unconditional cash transfer are a great strategy to help the old people as they may not be in a position to be included in Cash for Work Schemes.

## **METHODOLOGY**

The field research was conducted in three villages of Sindhupalchowk district, Bhimtar, Bhotsipa and Sipa Pokhare. The study was conducted between the periods of 14th May to 8th June, 2016. These regions were one of the worst affected regions. Sipa Pokhare, a small remote mountainous village had more than 70 casualties after the earthquake. To conduct the research, semi-structured interviews were developed. Focused group discussions were also conducted in these villages. The sensitivity of the issue was addressed and the questionnaire was flexible. Respondents were mostly selected from lower caste groups, ethnic minorities, females, children, elderly and people with disability. Relief workers were also interviewed to discover the perceptions of humanitarian agencies. Most of the interviews were informal conversations under which questions like, how people were affected by the disaster, what were their coping strategies and what kind of relief they had received from the government and humanitarian agencies were addressed. 39 interviews were taken, including, 23 females, 11 people of ethnic minorities, 4 children, and 2 elders. A major limitation of the research was that people in trauma may not address all their concerns to someone they would perceive as an outsider.

## **FINDINGS**

Sipa Pokhare faced a huge loss of life and property. The Nepal government was committed to mainstream disaster risk reduction in development, however, our observation was that it had not been implemented and community members were struggling after the disaster. The main road that connected Sipa Pokhare with the capital Kathmandu was blocked after the earthquake due to multiple landslides. Local villagers and youth took their own initiatives to rescue people from the debris and provide medical assistance. The interviews also revealed that people were not trained for first aid relief, which is an important part of disaster education. Due to delay in the

relief process, people had to pool their own resources and raise funds for the reconstruction of the village.

An attempt was made to look at the gender specific issues people belonging to different age groups faced in the aftermath of the disaster through personal interviews and focus group discussions. All names were changed to protect the identities of the respondents. One of our interviewees Malti told us that, "After the earthquake, I lost my home and my husband. I have three daughters and an infant son. The cash aid that I received from the government is already spent and now I am hopeless about the future of my children." Mamta stated, "I have lost everything that was dear to me after the earthquake, my son and my husband. I have no money. The monsoon will start soon and without a shelter, I am not sure how will I survive." Others who were lucky enough to survive the earthquake are not sure how will they continue their income, as Sharmila mentions, "It was a scene of devastation. Within seconds I lost my entire home, my family and I survived, but we have no medium of income. We are eating less food to save some money, although we are not sure if that will help us." Other common concerns married women with children had were related to how the earthquake would effect their children's education, i.e. whether they would be able to replace the textbooks and other material they would need, if they could afford to pay the school fees, whether the school infrastructure would be rebuilt in time, and how the long break in education would effect the children. Mothers with adolescent children reported concerns regarding the idleness their children were getting used to with the schools being shut down. Women also reported concerns about the future. Migration to other countries for work, especially India and Qatar, is a common livelihood option for the men in the area. Men who leave for work to these countries may not return for a few years, leaving women in charge of their households. In the aftermath of the devastating earthquake, women reported that the likelihood of their husbands migrating has become very high.

Young children were highly affected by the disaster, Maya a third standard student told us, "I love my school. We used to sing, dance and play. My school is completely destroyed after the earthquake. I miss my teacher and my classmates." Rohan a 12th standard science student told us, "I used to get the best grades in my class. My entire home has collapsed and all my school material, including my school bag, books, and notebooks are lost. I have to go college next year and I am afraid I am not ready for the final examination." Meena a sixth standard student told us about a temporary informal school set up by her teacher. She said, "One of our English teachers felt that it was important that students should not stop studying after the school, so she is going to take classes regularly in a make shift camp." It should be stated that these types of classes were not common as local teachers who were also victims of the disaster initiated them. Further, the teachers were also facing financial issues, as their salary for the month of April had not been released to them and there were uncertainties regarding the payment of their salary for the month of June.

Old people with disabilities faced appalling situation after the earthquake. Meena, a widow in her 60s was injured after the earthquake when some debris fell on her. She was rescued by her neighbors but had no money to buy medicines. Her only son was working in Qatar as a laborer could not come back to take care of her. She said, "The

only people I rely on are my neighbors, but their houses have also collapsed and they may not have the time to help me now.” 76 years old, Seti, informed us that, “I knew some of the people who died, they were very friendly to me. Now I have lost my neighbors and my home. I have no idea how I will build my home without their support. When you are seventy-six, your body is not that young! Only God can help me.” Our observations suggested that old people, especially those with disability require immediate relief from the government, as they are not capable of rebuilding their homes without some form of outside intervention.

Water and Sanitation issues are primary concerns in Bhotsipa, there were complains that due to the mixing of drainage lines with water supply, the drinking water had become contaminated and diseases like Cholera and Diarrhea were spreading. Shivani complained, “All my children are sick after the earthquake. I cannot find clean water anywhere. All the children in our village are getting sick and the medicines provided by relief agencies are not enough. I do not have enough money to take my children to Kathmandu for expensive treatment.” Some mothers like Asmita were, concerned that the coming monsoon would worsen the health of their children. She said, “My child is six month old, our house is completely devastated. My husband and I can live without a roof in open fields, but what about my infant? How will he survive during the monsoons.”

The incidence of mental health issues has increased after the disaster, especially among the people who had a history of depression and anxiety. Manisha, a sixty eight year old widow said she had reoccurring dreams about her husband who died during the earthquake. She said, “I see my dead husband in my dreams. He told me that the world is a sad place. I should not be too attached to the world and go to the other world to get a better life. I should end my life.” Anish, a 35 year old married man with two children stated the following during an interview, “We have lost all our cows after the tragedy. I have no means to support my family. I think my family has huge expectations from me. They believe that I will manage to find other work, another way to earn money but I don’t know what will happen if I fail.” Local social workers and doctors have identified cases of mental health patients and it is likely that an intervention may be initiated.

Community resilience was exceptionally high in the people of Sindhupalchowk. Destruction at this scale could not stop the people from attempting to rebuild their lives and return back to normalcy, despite all the odds. As Manish mentions, “Most of the people came together to volunteer and help their neighbors and their community. The scene was heartening as I had never seen all people from different religious groups and castes working together to save human lives. I think it is always an outside force that tells us what we are capable of.” Previous research has observed that people tend to return back to their lives and normal schedule as soon as the disaster response work is over. This was observed in the aftermath of the Nepal earthquake also with respondents like Amit who stated the following, “ Yes, the disaster has destroyed my home, but this cannot stop me from working I still have to earn a living for my family, so I go to my agricultural fields everyday to clean the debris. I am also attempting to find someone to repair my agricultural equipment because I cannot wait for the government to help me.”

## **CONCLUSION**

The Nepal Earthquake has exposed the social vulnerability of communities. Lack of resources, an absence of a clear disaster management plan and improper development plans have all contributed to turning this natural hazard into a social disaster. The government needs to develop both short and long-term recovery measures. Sectors including shelter and livelihood require a more comprehensive, long-term strategy, where as WASH, mental health and education requires immediate intervention. DRR should be integrated into all the future development projects.

While the UNISDR is working along with government to establish HFA guidelines in the development plans of the Nepal government to address and identify underlying risk factors and establish strategies for risk mitigation, there is a need for an institutional framework to develop a disaster mitigation strategy by implementing the National Strategy for Disaster Risk Management adopted in 2009. [7] Warning Centers are also required in Nepal for disasters like storms, landslide, and flooding. Ministry of Agriculture should also develop its own DRR plan and include Standard Operating Procedures to be followed in pre and post disaster scenario.

The government should identify open spaces in Nepal where makeshift tents can be built and relief distribution centers can be set up. A cluster approach in partnership with government and various relief agencies would reduce the chance of relief duplication and improve coordination during emergencies. Social Protection Schemes by the government are essential for disaster recovery of communities. Consumption rate and income of the households in Nepal has reduced by almost 20%. [8] The informal sector of the economy, which includes agricultural laborers and farmers have been affected the most. Loss of agricultural equipment may also have long-term effects on agricultural productivity.

Women, lower-caste communities, ethnic and religious minorities should be prioritized for social protection schemes. Direct Cash Transfer, Cash for Work, Social Insurance, and Mid-Day Meal scheme are some of the most important social protection schemes. Management Information System (MIS) can be used to improve the accessibility and identification of vulnerable communities that are the prospective beneficiary of social. A National Framework for Social Protection Scheme and guidelines for poor household surveys should be developed by the government. International Labour Organization's Social Protection Recommendations should also be integrated into the development plans.

Gender equality and social inclusion are issues that need to be addressed by the communities after the earthquake. People living below poverty line have limited access to community resources and are susceptible to marginalization, which may exacerbate their vulnerabilities. They are less likely to be a part of community decision-making processes and may also be discriminated against during the allocation of relief material. In the aftermath of a disaster of this scale, they may have to resort to negative coping strategies, child labor, early marriages and human trafficking. Lower caste communities have lesser capital, fixed or otherwise, as compared to the members of the dominant communities; therefore they are likely to have insufficient capacities to deal with the aftermath of a disaster. The first step towards improving this situation is the conduction of comprehensive study of the

social vulnerabilities within communities like ethnic minorities and lower caste people, as they are most susceptible to disasters. Some steps to reduce vulnerabilities are ensuring joint-ownership of houses between men and women under the National Shelter Policy, the introduction of Microfinance schemes and Skill development among the most vulnerable communities, and livelihood diversification. Our research concludes that communities should not be merely studied as victims, rather as proponents of change, having exceptional coping capacities.

### **ACKNOWLEDGEMENTS**

The authors acknowledge the support of the Jamsetji Tata Center for Disaster Management and Nepal School of Social Work in the development of this research.

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