

Rehabilitation of Malin Village

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Abstract- Last year a huge landslide occurred in Malin village. A great amount of obstruction was faced by villagers. This is one of the largest landslide tragedy occurred in 2014. The numbers of collateral found were 151. It is very necessary to take precautions to avoid such a calamity from occurring again. So we visited Malin village, we observed ground conditions and collected soil sample for geotechnical testing. The testing is to be done for ensuring that the site is appropriate for rehabilitation. If the site is good for rehabilitation then, homes are to be planned in minimal cost from the funds given by government authorities and NGOs and a proposal is to put forth in front of government. These homes will be under low cost housing scheme and the design will be such that in situations like these, destruction will be minimised.

1. INTRODUCTION

On Wednesday, 30th July 2014, Maharashtra state media reported that a landslide occurred in the village of Malin in the Ambegaontaluka of the Pune district in Maharashtra, India refers fig. no. 1



Fig no1

The landslide, was believed to have been caused by a burst of heavy rainfall, 151villagers have been buried after a major landslide hit part of the Malin village at 5.00 AM local time. As of 4th august, 134 villagers have been confirmed dead and 17 are reported missing, believed dead. The bodies so far recovered were of 50men, 64 women and 20 children. The villagers were reportedly asleep in their houses when they were buried by a mass of mud, three kilometres wide and 30 metres deep. The landslide was first noticed by a bus driver who drove by the area and saw that the village had been overrun with mud and earth. In addition to those dead, more than 160 people, and possibly up to 200, were believed to have been buried in the landslide in 44 separate houses. Rains

continued after the landslide making rescue efforts difficult, As such this is the second worst landslide of the year to date, after the Afghanistan landslide of a couple of months ago.

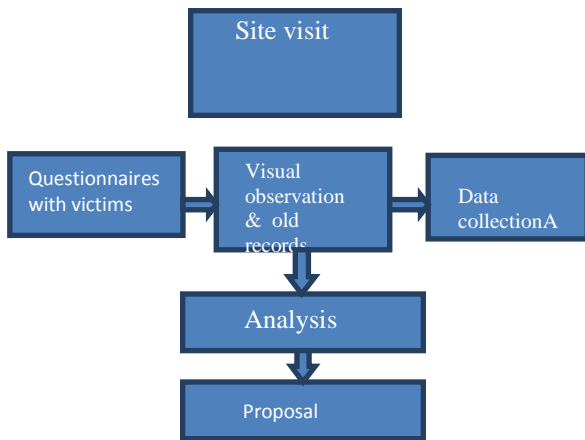
The Home Minister RajnathSingh announced Rs 2 lakh. Maharashtra Chief Minister PrithvirajChavan also announced an aid of Rs 5 lakh to the family of the victims from the CM Relief Fund. It was also said that the state government would provide free medical treatment to the injured. Many villagers in the affected area sheltered by the district administration at "Ashram Shalas" in an adjacent village.

We have to be trying to check the stability to actual site of the disaster then if it is possible that to construction the location, we suggest the low cost housing plan to the government.

2. METHODOLOGY

1. Defining Aim and object
2. Site visit
 - a) Questionnaires with victim
 - b) Visual observation
 - c) Taking the soil sample for testing
3. Analysis
4. Designing
5. Proposal

FLOW CHART



3. AIM

To propose suitable solution for rehabilitation and resettlement of Village Malin.

4. OBJECTIVE

1. Brief study of Village Malin.
2. Testing of soil
3. Prepare a rehabilitation low cost housing plan for Malin villagers.

5 SITE VISIT

We visited Malin Village on 15th Oct 2015. The site visit was for survey purpose and data collecting.

After visiting the site we saw there were hardly any village left, we saw there were only remains of trees and ruins of houses, Only visual scenario gave us idea about the impact of disaster, all we can see was land with hardly any human habitation.

During site visit we met the Tahsildar and Naib Tahsildar of Ghodegaon Taluka and Sarpanch of Malin Village, they were of immense help to us, they provided the necessary information related to disaster, they gave us the required permissions for carrying out surveying and data collection.



Fig no 2

Then we decided to talk to victims of disaster, after talking to them we realize how big was there problems, after talking to

them we realize how they were affected during the disaster and after the disaster, the situation was crucial for them,

We learned that they were emotionally attached to the place and were ready to resettle on that place only, they were habitual to that place, but government authorities had proposed them a different site for rehabilitation, but locals had difference of opinion about the site government providing them, they don't want to move to new location.

So we decided to carry out a project for rehabilitation at affected site, for that we planned to conduct Geotechnical test on samples to be collected from affected site, samples to be collected were from 3 different levels, top, middle, and bottom level of the site each by digging 3 m bore hole, the sample collected was 20 kg each for each level.



Fig no 3

6. ANALYSIS

Collected samples were tested for following Geotechnical tests

- 1) Natural Moisture Content
- 2) Sieve Analysis
- 3) Standard Proctor Test
- 4) Free Swell Index
- 5) Unconfined Compression Test
- 6) CBR

Based on results of test, the conditions for rehabilitation will be decided.

7. DESIGN

After the analysis of soil, we will come to know is the site suitable for rehabilitation. So for the proposal of houses we are going to design the plan of houses.

The houses which will fit in the budget given by government and NGOs for the affected people, such houses will be designed. These houses will be low cost houses but also strong and durable this will be given due attention.

REHABILITATION OF VILLAGE

If the affected site is still safe then we are going to give the proposal of low cost housing to the malin village people to rehabilitate them.

Malin village people are facing many problems; money problem is one of them. They don't have sufficient money for constructing a safe house in less amount of money. So we are going to design low cost housing plan for them. We are trying to design the more safe houses for them, so as to minimise the destructions and calamities in situations like these.

8. PROPOSAL

After the planning the houses, we are going to take a step further and present a proposal in front of government.

Understanding all the needs of village people, houses will be planned in favor of villagers, and put forth in front of government.

CONCLUSION

Based on survey and studies in guidance of concerned authorities and experts, testing of soil is being done and low cost housing will be proposed for the rehabilitation of people of Malin village.

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