

## B.25 Uganda - 2007 - Slow onset floods

### Case study:

### Materials and public information

Full case study

#### Country:

Uganda - Katakwi and Amuria districts

#### Disaster:

Floods

#### Disaster date:

Between July and mid September 2007

#### No of houses damaged:

More than 20,000 households were severely affected

#### No of people displaced:

58,000 people

#### Project target population:

100,000 families located in 96 villages

#### Occupancy rate on handover:

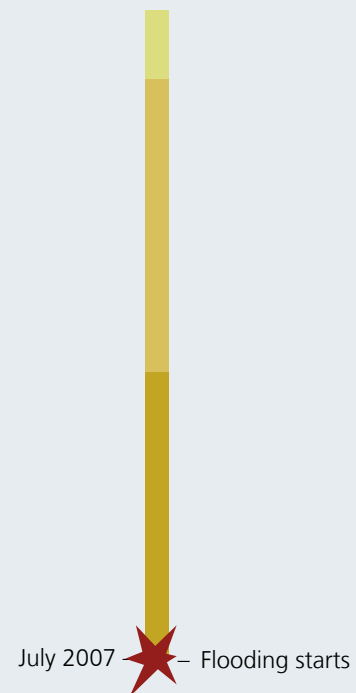
7458 shelter completed

#### Shelter size:

Traditional round hut 12m<sup>2</sup> with veranda



#### Project timeline



#### Summary

10,000 plastic sheets were distributed during the relief phase. These were for temporary roofing materials in the absence of grass, and were also used to prevent rain from destroying walls and moulded bricks.

To ensure that communities rebuilt more flood resistant shelters, both communal and individual tool kits were distributed. These were combined with a large scale public information program on building back safer.

As the traditional building season was three months after the floods, during the dry season, the project had components of water, sanitation and agriculture. The approach taken was to work through community mobilisation.

#### Strengths and Weaknesses

- ✓ The programme worked in many sectors including distribution, water and sanitation and health activities. The assessment included a multi-sectoral team
- ✓ A shelter specialist was rapidly deployed to support programmes.
- ✓ The emergency items arrived within 2-3 weeks of the floods. This was possible because there was an existing emergency stockpile in Nairobi.
- ✓ The project used large scale public information and participation to empower communities.
- ✓ A simple technical solution was used, based on simple improvements to a traditional construction.
- ✓ Different organisations operated in different geographical areas. This helped to avoid duplication.
- ✓ A combination of communal kits and individual kits helped the organisation to target more families.
- ✓ The international organisation worked with a national partner that was strong in community mobilisation.

- ✗ The recovery process was slow due to bad weather.
- ✗ The government had already started housing programs (concrete blocks and iron sheeting) which were often too expensive for the affected population.
- ✗ There was some resistance towards earth and thatch buildings.
- ✗ The national partner organisation had a lack of experience in shelter projects.



A boy walks past a flooded house  
Photo: Jacob Dall



### Before the disaster

For 20 years, Katakwi and Amuria districts of Eastern Uganda were controlled by the Lords Resistance Army and affected by Karamajong raids from the North. Although security had improved as a result of presence of the army and police forces, many people remained afraid, preferring to sleep at night in clusters in camps rather than returning to their family plots.

The traditional local shelter design is a round mud hut with a thatched roof.

The majority of the families are engaged in farming and other small businesses. The main crops are sorghum and cassava, but the crops had not been harvested before the floods struck.

### After the disaster

Heavy rains in the East of Uganda caused slow-onset floods that damaged houses in the camps and destroyed crops in the fields.

### Programme overview

To reduce the impact of floods in the region, the program focused on improved prevention and preparedness. It also used local building knowledge to improve the houses.

The supported shelter programmes improved awareness on how to rebuild more safely as well as providing tools and grants.

### Selection of beneficiaries

Through coordination meetings, the area was split geographically between organisations.

The shelter project focused on twenty camps and promoted community awareness, participa-

**View of a village after the floods showing the traditional circular shelters.**

**Photo: IFRC**

tion and technical awareness. The project combined interventions in many different sectors such as camp planning and water and sanitation.

The programme paid less attention to individual needs. It focussed instead on information sharing and the distribution of communal tools. The tools could be used for shelter, road works, agriculture, and other uses.

### Implementation

- 10,000 tarpaulins and 2000 communal kits were distributed
- Technical awareness posters were distributed
- Prototypes shelters were erected with the community

The project trained sixteen members of the partner organisation to support 224 community volunteers. These volunteers were active within camps.

Affected families themselves built the shelters whilst volunteers monitored the construction.

### Technical solutions

In the initial emergency phase, plastic sheeting was distributed along with other materials.

A list of necessary but lacking tools was drawn up with the community. These would be required to help families to reconstruct their traditional earth dwellings.

Information, education and communication materials such as posters were produced. These

showed improved earth construction, and illustrated the following details to protect the house from flooding or termites:

- The house and foundations should be elevated.
- Foundations should be built with a large plinth beam of wattle and daub. This would need to be repaired by house owners after each small flood
- A water proof barrier should be put the foundations to protect the walls and floors which are made of adobe blocks.
- Walls made of sun dried mud blocks should be conical in shape
- Proper materials to build more resistant earth blocks should be identified. Examples are clay from termite hills, and using mud mixed with cow dung to protect against termites.
- Wood in direct contact with the earth should be treated to protect it from termites.

### Material lists

The communal kit contained: a wheelbarrow, a hammer, a wood saw, a claw hammer, a machete, a hoe, an axe, a pick axe, a sharpening tool, a tape measure, a spirit level, a dumpy level and a first aid kit.

The household kit contained: a sickle, brick making moulds, damp proof membrane (polythene sheeting), anti termite treatment for wood, sisal roll, nails, a 20 litre Jerry can, a medium trowel, a window shutter, a door shutter, and wire.



House under construction with improved plinth  
Photo: IFRC



Public information images on proper site planning with space between buildings  
Image credit: IFRC



Images from public information posters on building a flood resistant structure: (1) elevate the plinth and put a plastic sheet under the floor (2) fold the plastic sheet over the ground level ring beam (3) build conical walls (4) thatch the roof, render the walls with mud and elevate the area around the house to protect it from flooding  
Image credit: IFRC