

*BUILDING SAFETY IN POST-DISASTER
SHELTER SELF-RECOVERY*

A REVIEW OF CURRENT KNOWLEDGE

FINDINGS MAY 2017

Centre for Development and Emergency Practice CENDEP
Oxford Brookes University

AIMS

- What is self–recovery?
- Provide an overview of the range of interventions and strategies that have been employed to support self-recovery
- Examine what factors promote greater safety in self-recovery

Included

Describes post-disaster shelter reconstruction –

not part of a longer-term development programme

What is self recovery?

Describes shelter repair or reconstruction activities that members of the disaster-affected population take responsibility for themselves.

include projects that provide assistance or guidance where beneficiaries are active decision-makers in how their homes are rebuilt or repaired and are in charge of the process, either building the shelter themselves or procuring local labour to do so

exclude processes where, for example, beneficiaries provide manual labour to rebuild homes under the instruction of other persons leading the project;

Included

Describe shelter recovery activities engaged in by householders and supporting organisations in sufficient detail that it is possible to judge the degree to which householders have been involved in the process, with particular regard to making decisions about the design and construction of their houses..

Total 19 documents

Unassisted self-recovery 1

Assisted self-recovery 18

Though unassisted self recovery was mentioned in some of the 18

Assisted self-recovery Types of assistance

| Key features of shelter programme aimed at improving safety | Number of programmes including feature (N=18) |
|--|---|
| | |
| Expert technical advice | 14 |
| Training in safer construction techniques | 14 |
| Monitoring of construction process | 13 |
| Written guidelines/ information about safer construction techniques | 11 |
| Cash conditional on compliance with safer building guidance | 10 |
| Improved hazard resistance of local building techniques | 6 |
| Householder / contractor participation in construction of demonstration building | 5 |
| | |

FINDINGS

There is very little robust evidence of how effective these programmes are with regard to improving safety.

Most case studies and programme reviews outline which aspects are designed to improve safety

they rarely report how many households have successfully incorporated these features,

or include any assessment of likely hazard resistance of the finished structure.

FINDINGS

Much of the literature does not provide a clear, detailed overview of what happens during programme implementation, making it difficult to understand the role of beneficiaries in the process.

FINDINGS: WHAT MAKES SHELTER MORE OR LESS SAFE

Only a small sample!

FINDINGS: WHAT MAKES SHELTER MORE OR LESS SAFE

TECHNICAL SUPPORT

FINDINGS: WHAT MAKES SHELTER MORE OR LESS SAFE

TECHNICAL SUPPORT

ADAPTING LOCAL CONSTRUCTION TECHNIQUES

FINDINGS: WHAT MAKES SHELTER SAFER?

TECHNICAL SUPPORT

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MODEL HOUSE

FINDINGS: WHAT MAKES SHELTER SAFER?

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ADAPTING LOCAL CONSTRUCTION TECHNIQUES

MODEL HOUSE

POSTERS AND MANUALS?

FINDINGS Technical support

Training householders and artisans in safer construction techniques is a key component.

Monitoring construction to ensure that hazard-resistant features are effectively incorporated is likely to have a substantial effect on whether this training has an impact

Providing technical support requires time, expertise, personnel, and sufficient funds. The capacity of the delivering organisation to provide technical assistance is crucial

Supporting this approach is may be more resource-intensive than other types of shelter programmes

FINDINGS Adapting Local Construction Techniques

New technologies are more likely to be adopted by communities if it they are easy to modify by end-users

Increases the likelihood that such methods will continue to be used and developed

Effective adaptation of local methods requires a significant time commitment, which may be problematic for reconstruction timetables or donor financing

FINDINGS Model House

The demonstration of the model house proved to be an effective tool for knowledge transfer and skill building, as the communities learnt a new skill, and also became aware of DRR features that could strengthen their house. Prior to this, they were unaware of techniques to make the house resistant to disasters.

FINDINGS Posters and Manuals

Programmes that provided IEC materials did not report on how well beneficiaries had understood this information, or measure the impact that it had on construction techniques

the impact of these approaches was reported in the vaguest of terms:

“Many field visits were made to ensure that the messages were being disseminated to communities and used in the construction”

We need better information

FINDINGS Posters and Manuals

Anecdotal information promising

“After logistic delays materials were distributed without IEC materials or full training of builders in build back safer technology... Assessment report: 94% of roofs assessed as weak or very weak due to the lack of knowledge in build back safer by carpenters. In addition, 80% of walls still needed bracing.”

INTERESTING ANECDOTES UNASSISTED

Non beneficiary families replicated construction techniques used in the project

Carpenters and masons trained by the project using safer construction methods in the community

Beneficiaries who learned new masonry techniques were employed by non-beneficiary families to build their houses

Safer construction methods were implemented by households due to improved understanding of build-back-safer measures within the wider community

FURTHER WORK

- Monitoring how households actually rebuild after disaster
- Better reporting by agencies.
- More meaningful evaluations of shelter programmes.
- Investigating DRR literature.
- Searching for known SR responses after specific disasters.

Included

Humanitarian shelter programmes will only be included if beneficiaries have been able to make key decisions about layout, materials, construction details and construction techniques used. Programmes that *require* beneficiaries to choose a specified design, even where there are two or more designs to choose between, have been excluded. Programmes that *recommend* hazard-resistant design, where beneficiaries are free to build according to this design or not, as they choose, are included. Programmes that require inclusion of certain safety features in the construction, usually as part of a cash-based programme, have been included.