



The Humanitarian-Development nexus: Lessons learned from the 2015 Nepal earthquake

LEARNING SERIES 2019/4



This publication documents the response of Helvetas to the 2015 Nepal earthquake, from the moment that it occurred to four years later. Many of the interventions entailed close collaboration with Solidar Suisse, as well as with Caritas Switzerland, with funding from Swiss Solidarity. Funding was also generously provided by numerous members of the Swiss public as well as administrative bodies and foundations. We would like to specifically acknowledge the contributions of the City of Zurich, Canton of Geneva, the Beneficentia Foundation, Medicor Foundation, Solaqua Foundation, and Aquilone Foundation.

As its title suggests, the document focuses particularly on the overlap between humanitarian and development responses, and the lessons that were learned. Although the principal authors are Jane Carter and Niraj Acharya, the document brings together the insights and experiences of many different people and is thus a collective product. We would like to thank all those named in the text who provided their opinions as quotes, and the many more unnamed persons who shared their thoughts and stories. Thanks also go to those who provided comments on the final draft document, notably Bibesika Bhurtel, Lukas Frohofer, Reto Gerber, Lionel Giron, Rabin Niraula, Aengus Ryan and Christiane Voegelé; nevertheless, the principal authors bear responsibility for any errors that might have been mistakenly included.

A special acknowledgment is owed to the people of Melamchi and Helambu who suffered so greatly but showed such fortitude. Platitudes are easy to write; the reality of their overturned lives was brutal, and their resilience truly remarkable.

Helvetas strives for a fairer world in which every person can fulfil his or her basic needs. We support women and men in taking charge of improving their own lives in a sustainable manner – working together as partners. Rooted in Switzerland, Helvetas is active in over 30 countries around the world. Nepal is one of the very first partner countries in which Helvetas began operations, under a 1956 agreement with the Government of Nepal.

Detailed information about the work of Helvetas in Nepal can be found at

<https://www.helvetas.org/en/nepal>

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Cover: The Bhandari family, Melamchi, rebuilds their home using earthquake resilient techniques.
Photo: Flurina Rothenberger

All photos are by Helvetas staff unless otherwise stated.

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ACRONYMS

AAP	Accountability to Affected People
CDECF	Community Development and Environment Conservation Forum
CEO	Chief Executive Officer
CLPIU	Central Level Project Implementation Unit (of the NRA)
CRS	Catholic Relief Services
CSRC	Community Self Reliance Centre
CTVET	Council for Technical Education and Vocational Training
DDC	District Development Committee (prior to federalisation)
DCC	District Coordination Committee (after federalisation)
DDRC	District Disaster Response Committee
DFID	Department for International Development (UK government)
DLPIU	District Level Project Implementation Unit (of the NRA)
DUDBC	Department of Urban Development and Building Construction
EFSR	Employment Fund Skills for Reconstruction an SDC project implemented by Helvetas
EFRS	Employment Fund Reconstruction Skills a DFID project implemented by Helvetas
GMALI	Grant Management and Local Infrastructure
HRRP	Housing Recovery and Reconstruction Platform
INGO	International Non-Government Organisation
JLO	Joint Land Ownership
MoU	Memorandum of Understanding
NRA	National Reconstruction Authority
NSET	National Society for Earthquake Technology-Nepal
OCHA	United Nations Office for the Coordination of Humanitarian Affairs
ODF	Open Defecation Free
ReAL	Rehabilitation of Agricultural Livelihoods
REAP	Rehabilitation of Facilities of Earthquake Affected People in Sindhupalchok
REAS	Rehabilitation of Earthquake Affected Schools in Sindhupalchok
SDC	Swiss Agency for Development and Cooperation
VDC	Village Development Committees (administrative unit prior to federalisation)
VMW	Village Maintenance Worker
WASH	Water, Sanitation and Hygiene
WUC	Water User Committee

SUMMARY

This Learning Series documents and draws lessons from Helvetas' practical experience in responding to the 2015 earthquake in Nepal – from when the ground first shook on 25 April 2015 to June 2019. Many of the interventions over this four-year period essentially took place at the humanitarian-development nexus, combining elements of both. The document is divided into six sections. The first provides a brief overview of the disaster, and the different humanitarian-development projects in which Helvetas was engaged. It also introduces the area of geographical focus, the (urban) municipality of Melamchi and the rural municipality of Helambu (both in Sindhupalchok district). It is experiences in this location that are the focus of this publication, much of them implemented in a consortium with Solidar Suisse with funding from Swiss Solidarity and other donations. The second section outlines the broad sequence of post-earthquake events at national level and the wider institutional context; this had a strong bearing on the way that humanitarian-development activities could be implemented. In section three, activities during the immediate response and recovery period are outlined, before a more detailed account in section four of the subsequent reconstruction and development activities. Work in consortium with Solidar Suisse focused on rebuilding resilient homes, and ensuring robust, safe drinking water supplies, sanitation and hygiene facilities (WASH). In collaboration with Caritas Switzerland, Helvetas supported WASH facilities in schools - in eight, using the “blue school” approach. In addition to restoring and improving houses and schools, Helvetas also supported agricultural livelihoods – through targeted cash distribution and repair/reconstruction of irrigation channels and improved watermills; agricultural advisory support and farmer business schools; the construction of an agriculture extension centre; and the promotion of joint land registration for women and men. All these activities sought to be gender-responsive and to prioritise the disadvantaged; many were more development orientated than strictly humanitarian responses, but all were necessary for affected people to rebuild their lives – ideally, for the better. Section five looks back on what was learned from these experiences in terms of project design, especially reaching the most vulnerable; partnerships; and management issues. The short conclusion in section six notes that another even larger earthquake is predicted for Nepal, and that preparedness is crucial.

“I ask myself whether, despite all its flaws, the Nepalese model is perhaps the future of humanitarian aid, in line with the intentions proclaimed last year [in 2016] at the World Humanitarian Summit in Istanbul?”

The following three elements make up the Nepalese model: The international organisations must cooperate with local NGOs, no more than one or two international employees per relief organisation are tolerated in the country, and the cash approach is to be given preference in reconstruction.”

Tony Burgener, Director Swiss Solidarity – translated from the original German, Tages Anzeiger online 22 April 2017



Ando Sherpa looks down from the ruins of his former home. Photo: Patrick Rohr

1. INTRODUCTION

1.1 The humanitarian-development nexus in the international context

Humanitarian relief, or development organisation? The first suggests an organisation specialising in rapid response to a crisis, operating within a short time frame and guided by humanitarian principles of neutrality, impartiality and independence – saving lives, reaching out to all in need. Generally quick thinking and quick action is required. The second suggests an organisation with a long-term perspective, operating according to principles of sustainability, poverty reduction, community ownership, and multi-stakeholder partnerships. To some, these two types of organisations and professional disciplines are quite discrete. Yet it is also true that the stereotypical differences represent two ends of a spectrum, and that a middle ground of considerable overlap exists. Increasingly, organisations that specialised in one discipline are also working in the other. The humanitarian-development “nexus” is a relatively recently coined term, but an appropriate one in recognising an interweaving of the two disciplines. “Linking relief, rehabilitation and development” (LRRD) is another term that has been used in the past.

This Learning Series is set in the context of a globally increasing number of humanitarian disasters – often directly or indirectly caused by human activity – and a consequent growing demand for humanitarian assistance (OCHA, 2018). It recognises the substantial body of literature on the humanitarian-development nexus (or even the humanitarian-development-peacebuilding nexus, see for example, Slim, 2019), as well as the many efforts at global level to seek more effective and efficient international responses to humanitarian crisis. Of special note in this regard is the 2016 World Humanitarian Summit in Istanbul¹ which led to the New Way of Working (NWOW) – seeking to bridge an acknowledged divide between humanitarian and development responses². A further important and related initiative is The Grand Bargain, a commitment/recognition among donor countries/agencies (including Switzerland and the European Commission) and aid providers as part of the United Nations Agenda for Humanity. Goal 10 of The Grand Bargain is to “Enhance engagement between humanitarian and development actors”.

1.2 Nepal's 2015 earthquakes

Nepal is a country highly prone to disasters, both due to its location in an area of major seismic activity, and due to changing weather patterns associated with climate change. The latter has led to an increased intensity and frequency of wind storms, floods, landslides and GLOFs (Glacier Lake Outflows). The likelihood of a large earthquake had been widely predicted by scientists, and some preparations had been made (see for example NSET, 2011). Nevertheless, when the earthquake occurred – or rather the series of them over April–May 2015 – the psychological shock was tremendous.

The epicentre of the earthquake on 25 April was Gorkha, to the West of Kathmandu, but damage was extensive over a much wider area, especially Sindhupalchok to the North East of the capital. Early days and weeks following the first earthquake were characterised by fear of further aftershocks, which continued for over a month. A large aftershock on 12 May, which had its epicentre near Charikot, Dolakha, caused extensive damage to already fragile buildings, and triggered lethal landslides, further raising the death toll. In total, well over 8962 people were killed, and over a hundred times that number rendered homeless. Many lost their livelihoods – especially farming communities whose livestock were killed, and basic infrastructure destroyed.

¹ <https://agendaforhumanity.org/agendaforhumanity?referer=home>

² https://www.unocha.org/sites/unocha/files/NWOW%20Booklet%20low%20res.002_0.pdf

The focus of this document is on the practical experience and lessons learned by Helvetas in responding to the 2015 earthquakes, from the early days of providing relief supplies to the much longer period of supporting rehabilitation. The document draws particularly, although not exclusively, from activities implemented in collaboration with Solidar Suisse and Caritas Switzerland, focusing on what are now the urban and rural municipalities of Melamchi and Helambu, respectively. Helvetas has a widely respected track record of supporting development in Nepal now spanning more than 60 years, with a large complement of skilled national staff (at the time of the earthquake, the organisation had over 250 employees; this swelled to 350 in the post-disaster period). Solidar Suisse and Caritas Switzerland have strong experience in humanitarian relief, both being members of the Core Humanitarian Standards Alliance, but had no prior experience in Nepal. The partnership came about through funding provided by Swiss Solidarity, which raises charitable donations in response to disasters. Helvetas also undertook earthquake relief and reconstruction with donations collected through its own appeal, as well as on behalf of both the Swiss government (Swiss Agency for Development and Cooperation, SDC) and the British government (UK Aid or Department for International Development, DFID). Box 1 provides an overview of all these different projects.

The period covered by this publication is four years – longer than the period of funding usually provided through Swiss Solidarity. This must be viewed in the context of the massive political and administrative changes that occurred in Nepal over that time – including a four-month long blockade with the Indian border, which severely restricted supplies of construction materials. These important contextual changes are outlined in section 2.



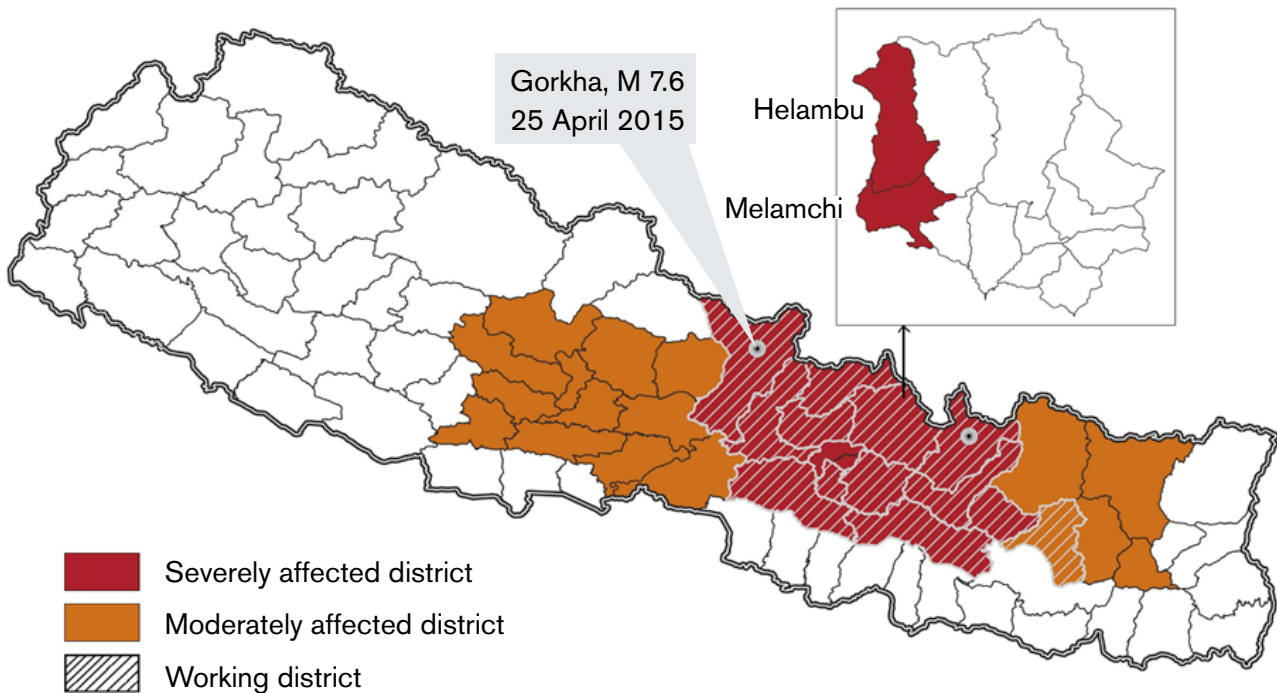
Temporary camping in the open at Gyalthum in the aftermath of the earthquake

Box 1: Overview of projects responding to the 2015 earthquake in which Helvetas was engaged

Name	Implementing partners	Funding source	Location	Period
HREAP, Humanitarian Relief for the Earthquake Affected Population	Direct implementation with Solidar Suisse and local NGO	Swiss Solidarity and donations from the Swiss public	Melamchi, Helambu Gorkha	April-July 2015 (3 months)
TLC, Transitional Solutions for the Monsoon Season: Temporary Learning Facilities and Distribution of Shelter Material	Caritas Switzerland & local NGOs	Swiss Solidarity	Melamchi, Helambu	May-August 2015 (4 months)
REAP, Rehabilitation of Facilities of Earthquake Affected People	Solidar Suisse and local NGOs	Swiss Solidarity and Helvetas-raised funds, including the City of Zurich	Melamchi, Helambu	August 2015-June 2019
EREAP, Economic Recovery of Earthquake Affected Population	Solidar Suisse and local NGOs	Swiss Solidarity	Melamchi, Helambu	February 2016-December 2016
ReAL, Rehabilitation of Agricultural Livelihoods	Agricultural cooperatives and local NGOs	Swiss Solidarity	Melamchi, Helambu	August 2016-December 2018
REAP-II, Rehabilitation of Facilities of Earthquake Affected People	Solidar Suisse & local NGOs	Swiss Solidarity	Melamchi, Helambu	July 2017-June 2019
REAS, Rehabilitation of Earthquake Affected Schools	Caritas Switzerland & local NGOs	Swiss Solidarity & others	Melamchi, Helambu	October 2015-October 2019
EFSR, Employment Fund Skills for Reconstruction	Many local service providers	SDC	Sindhupalchok, Dhading, Dolakha, Gorkha, Ramechhap Okhaldhunga	July 2015-June 2020
EFRS, Employment Fund Reconstruction Skills	Many local service providers	UKAid (DFID)	Kavre, Rasuwa, Makawanpur, Okhaldhunga Sindhuli	July 2016-March 2018
REVIVE, Coffee	Coffee cooperatives	Swiss public donations	Lalitpur, Nuwakot, Gorkha, Kavre	November 2015-March 2017

1.3 Geographical area

Map showing the extent of the earthquake-affected area by district



Melamchi and Helambu, Sindhupalchok

The area of Melamchi and Helambu was amongst those most severely affected by the earthquake and subsequent aftershocks. It became the focus of Helvetas post-earthquake support due to the organisation's existing knowledge of the area and its people, and well-established partnerships with local NGOs. Helvetas had already some 20 years of experience in Sindhupalchok, providing technical assistance for trail bridge construction and supporting sustainable soil management and vocational skills training, all SDC projects, as well as coffee production and marketing (funded through other Swiss donations). At the time of the earthquake, Helvetas was working in the Melamchi-Helambu area on two specific activities. One was the participatory inventory and planning of water resources through a Water Use Master Plan, supported by the International Development Research Centre (IDRC) of Canada, under a project titled Building Effective Water Governance in the Asian Highlands (BEWGAH). This had started in 2012; a related watershed planning project, the Koshi Basin Project, was also being implemented since 2014. The other activity in Melamchi was building of community awareness about climate change and adaptive measures. Focusing on the integration of climate and environmental education into school curricula, this project, known as CoPILA, had been operating since 2011 with funding from Swiss public donations.

Other locations

In training masons and carpenters in earthquake-resilient construction techniques, Helvetas worked in many locations, but the training provided in Sindhupalchok included courses held in Melamchi and Helambu. The Revive Coffee project was implemented outside the Melamchi-Helambu area.

Box 2: Melamchi and Helambu

For Kathmandu residents, the name Melamchi is synonymous with a long-planned water scheme that will channel water from the Melamchi river to the taps of the city. The lower part of the valley, once the Melamchi river has joined the Indrawati, is also a major source of gravel and sand feeding Kathmandu's construction industry.

What is now the urban municipality of Melamchi covers a fertile valley of irrigated fields, the now thriving bazaar of Melamchi town, as well as the slopes to either side of the valley. Further upstream lies the rural municipality of Helambu, which is largely characterised by non-irrigated fields and more steeply sloping land, rising to over 4000 m. The diversity of the landscape is reflected in human diversity. The lower areas are predominately populated by Brahmin and Chhetri communities (so-called "high" castes), interspersed with Dalit (so-called "low" caste) settlements. In the bazaar, there are many Newar merchants as well as other castes and ethnic groups. The more sloping areas, especially those of Helambu, are chiefly populated by ethnic groups. Many are Tamangs, but there are also communities of Gurungs and Yolmo – the latter being people of Tibetan lineage who maintain a distinct cultural identity centred on Helambu. In the valley, agriculture tends to be the mainstay of livelihoods. In higher areas, especially amongst families with limited land, labour migration of young men to Gulf countries and Malaysia is common. Some households also gain an income from tourism, given that the popular trekking area of Langtang lies quite close by.

These are of course generalisations, within which lie exceptions. Furthermore, the devastation brought by the earthquake had a profound effect on all the communities of Melamchi and Helambu – pushing some to move to Kathmandu, others to work abroad, and still others to relocate their homes in areas perceived as safer or along roadsides, often on agricultural land lower down the valley.



The Melamchi valley today, looking down from Helambu



The earthquake caused huge devastation throughout Sindhupalchok

2. OVERVIEW OF THE PROGRESSION OF ACTIVITIES

2.1 Institutional context of the relief to reconstruction effort

The relief, recovery and reconstruction effort following the earthquake took place against the backdrop of a rapidly evolving political situation in Nepal. This had a direct impact on the way that humanitarian and development agencies could operate. Key events or political decisions and important bodies involved are indicated in the time line and are described briefly below.

Key political events at national level

Nepal's government promulgated a new Constitution in September 2015. This represented the outcome of Nepal's 11 year armed conflict (1996 – 2007) and subsequent political negotiations, and set the frame for more devolved, local decision-making. The Constitution recognises three spheres of governance: federal, state (provincial) and local, each with different rights and responsibilities. From being a country administered through 75 districts, Nepal now has a federalised structure of seven state (provincial) governments and 753 local governments, in addition to the federal government. Local governments are classified as rural or urban municipalities. Despite broad political support, the Constitution was not fully accepted by some Madheshi groups living in the Terai. Their agitation against the government was supported by India, leading to an undeclared border blockade that lasted from September 2015 to January 2016, four months in total. This greatly hampered the initial reconstruction effort, restricting transport (due to the limited availability of fuel) and blocking the import of other necessary goods.

Although the Constitution set out a new federalised form of governance, putting it into practice required elections. These took place successfully in several rounds over 2017; by the end of the year, democratically elected governments were in place at local, state and federal level. This was the first time that local level elections had been held in 20 years, and citizen expectations of service delivery were – and remain – high. At the same time, not all the old administrative structures at district level have been dissolved, and others appear to be re-emerging in new forms.

The political changes in Nepal have meant that the bodies responsible for decision-making over various aspects of the reconstruction effort have also changed over time.

Department of Urban Development and Building Construction (DUDBC)

The Department of Urban Development and Building Construction (DUDBC) has overall responsibility in Nepal for urban planning and construction designs of buildings. It published a first catalogue of approved earthquake-resilient building designs in October 2015. This served as the reference for REAP; in July 2016, DUDBC approved the project designs for two and three roomed buildings, and in December 2016 for four-roomed buildings. DUDBC brought out a revised volume of construction designs in March 2017. The original REAP MoU was signed with DUDBC, and later converted to an agreement with National Reconstruction Authority (NRA).

National Reconstruction Authority (NRA)

Within three months of the earthquake, a National Reconstruction Authority (NRA) was established to coordinate reconstruction efforts. However, political difficulties led to it being dissolved and only re-established at the end of 2015. Over the period of its existence, the NRA has been headed by four different CEOs, each of whom brought their own perspective to the job.

The NRA initially announced that all households rendered homeless would receive NPR 2 lakh (approx. USD 1,800) for reconstruction; this was subsequently revised upwards to NPR 3 lakh (approx. USD 2,700) in July 2016. A detailed three-tranche procedure for the release of this money was also elaborated: one sixth of the total to begin, then a further half of the total on completion of construction to plinth level, and the final remaining amount on completion to lintel. Both these latter conditions have to be certified by

a government engineer prior to grant payment into the head of household's bank account. The construction of a toilet was later added as another condition for the third tranche. Deadlines for the payment of each of these tranches were set and re-set several times as reconstruction proved slower than the NRA anticipated. The body responsible for checking and approving government reconstruction grants, the Grant Management and Local Infrastructure, GMALI, was originally located at district level and remained in the district headquarter after federalisation (see box 3).

The NRA also regulated the activities of NGOs and INGOs engaged in the reconstruction effort; first guidelines were released in late March 2016, followed by revisions in April 2017. Just prior to the release of the guidelines (from late February to late March), the NRA declared a moratorium on (I)NGO-supported construction activities due to a perception that matters were getting out of government control and that construction was taking place in a haphazard manner. Helvetas and Solidar Suisse respected this moratorium, even though it led to significant delays during the peak construction season of 2016.

Originally, no prioritisation of households for reconstruction activities was set by the NRA; all were to be treated alike. However, as time progressed, and it became clear that some households were unable to rebuild, the NRA developed a set of criteria to determine the most vulnerable and identify them for additional support. The additional support was a top-up grant of NPR 50,000 (approx. USD 450); the selection criteria are discussed in a later section. A list of households fulfilling the NRA criteria was drawn up and published in May 2018. It represented only a small proportion of all households eligible for a reconstruction grant and proved quite controversial.

Box 3: Administrative structures prior to and post federalisation in Nepal

Prior to federalisation, government administration functioned through districts and Village Development Committees (VDCs). The District Development Committee (DDC) was an important decision-making body, and all earthquake response efforts had to be coordinated through it. In the absence of elected representatives, both the DDC and VDC were staffed only by administrative officers. One VDC secretary often served several VDCs and was the only person who could certify matters such as the identity (and citizenship) of a person within “their” territory.

When the new rural and urban municipalities came into existence following federalisation, many responsibilities were allocated to them. These include all settlement planning and the regulation of construction within their territory. Both must give prior approval for any construction within the municipality; in the case of urban municipalities, a construction permit can only be given on submission of a detailed site plan. Since the establishment of the municipalities, Helvetas has worked closely with them, seeing them as the responsible local body that will continue in the future.

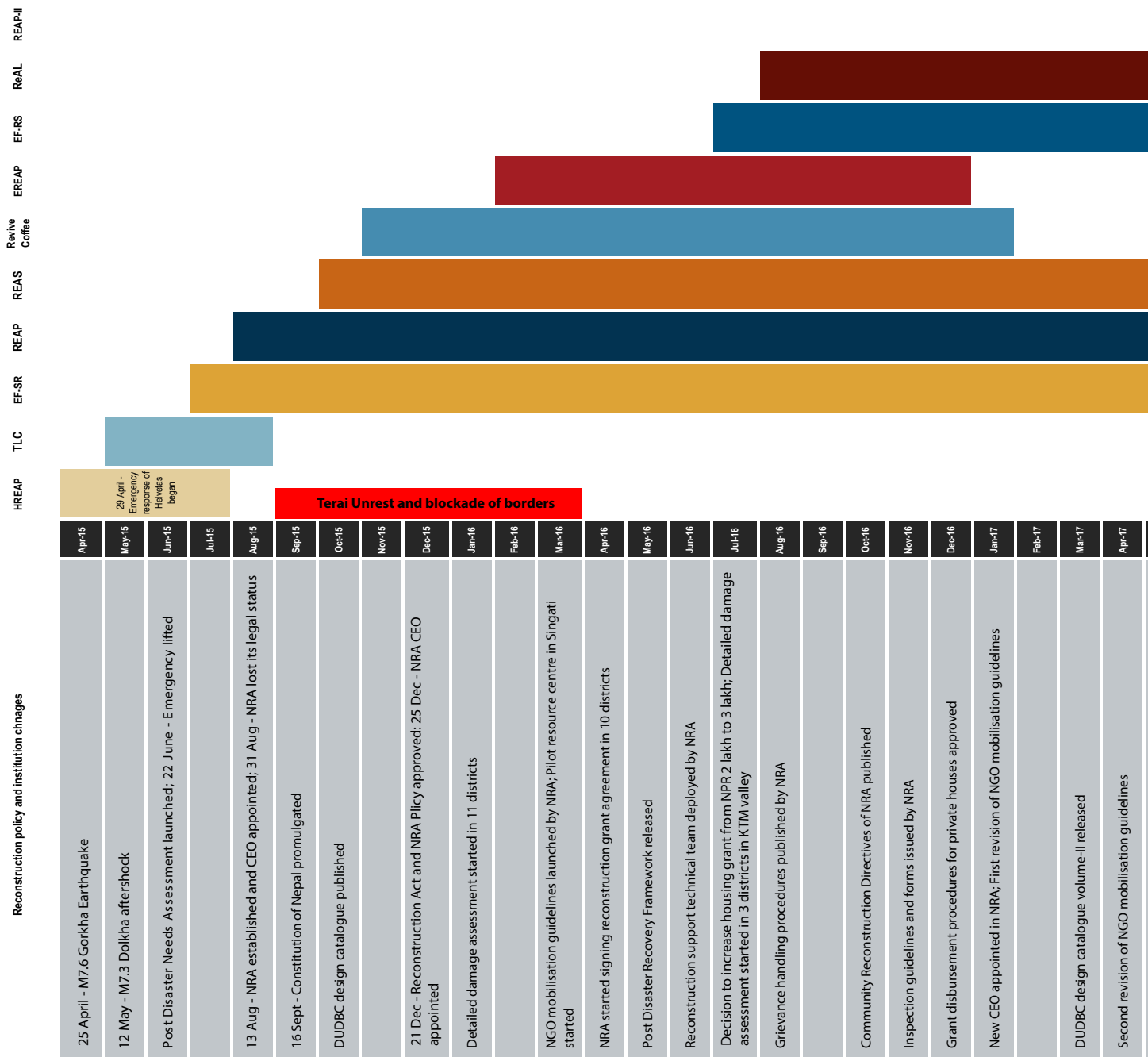
Housing Recovery and Reconstruction Platform (HRRP)

The Housing Recovery and Reconstruction Platform (HRRP) was established in December 2015 as a donor-supported body coordinating post-earthquake housing reconstruction. It took over from the Nepal Shelter Cluster (which coordinated the initial relief effort) and serves as a platform coordinating the efforts of the NRA, its Grant Management and Local Infrastructure (GMALI), Central Level Programme Implementation Units (CLPIUs), other relevant government authorities, as well as partner organisations (POs). Having been established before federalisation, HRRP was structured by district, and remains so. Phase 4 of HRRP (August 2019 – July 2021) is mainly funded by DFID (UK Aid) and CRS (Catholic Relief Services) Nepal. Technical coordination is led by the National Society for Earthquake Technology-Nepal (NSET). Helvetas has regularly provided to the HRRP details of its reconstruction work and participates according to interest in the knowledge-sharing events that it organises (continuing to do so through the SDC project EFSR, Employment Fund Skills for Reconstruction).




Durga Prasad Gajurel crosses the trail bridge at Mahankal (now in Helambu rural municipality) on 7 July 2015; he carries pipes for repair of the village irrigation scheme. Photo: Narendra Shrestha

2.2 Time line



14 May - First phase of local elections; Correction & Exception Manual of NRA released	May-17
Inspection form for houses with drystone masonry released; 28 June -Second phase of local elections	Jun-17
Deadlines for grant disbursement set (1st: 13 Jan 2018, 2nd: 13 April 2018 & 3rd: 15 July 2018)	Jul-17
Relocation and Rehabilitation of Hazard Prone Settlement Procedure, NRA	Aug-17
18 Sept-3rd phase of local elections; Disaster Management Act promulgated	Sep-17
New CEO appointed in NRA	Oct-17
1st phase of federal and provincial elections	Nov-17
2nd phase of federal and provincial elections	Dec-17
	Jan-18
PMIS launched by NRA; Deadlines for grant disbursement reset	Feb-18
	Mar-18
CLPIU and DLIPIU moved under NRA; Deadline for second tranche extended until July 2018	Apr-18
NRA published list of vulnerable households	May-18
	Jun-18
NRA approved vulnerable support project	Jul-18
New CEO appointed	Aug-18
Deadline for second tranche extended until 15 Jan 2019 and for 3rd tranche to 14 May 2019; Responsibility of reconstruction monitoring and grant disbursement to municipalities	Sep-18
	Oct-18
Extension of deadlines until July 2019 and for vulnerable until July 2020	Nov-18
	Dec-18
11 point agreement with 282 local governments for leading reconstruction works; Revision of private house reconstruction grant disbursement guidelines	Jan-19
	Feb-19
Re-survey of grievance cases started; Strike and consensus of reconstruction engineers	Mar-19
	Apr-19
	May-19
	Jun-19

Until Oct 2019 

3. CONTRIBUTIONS TO EARLY RESPONSE AND RECOVERY

In the hours immediately after the first major shock on Saturday 25 April - during which many aftershocks were still taking place – the Helvetas management in Nepal focused on checking the safety of its own staff and their families. By the third day, however, staff were back at work and contributing towards the relief effort in an organised manner. The senior management team decided to channel relief supplies, predominately tarpaulins, to two locations: Gorkha and Sindhupalchok. Soon, however, it became clear that it was better to focus on one area to avoid a dilution of efforts and eventually maximise synergies between different interventions.

The international community was quick to respond to the emergency, with many relief organisations arriving and almost overwhelming Kathmandu. In accordance with international norms, relief efforts were coordinated through the UN and OCHA lead cluster coordination system. In the temporary absence of a working government system (itself affected by the earthquake), the coordination system served to guide initial emergency relief planning and implementation.

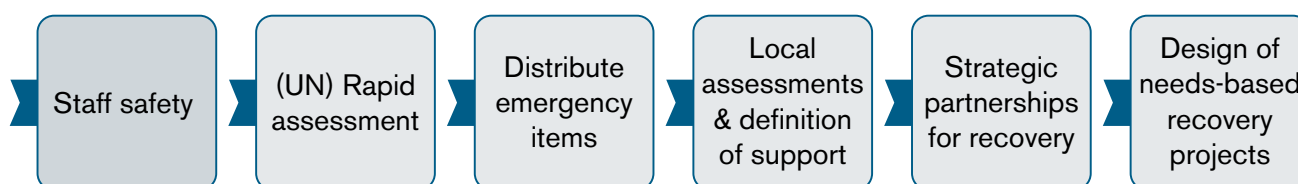
In Switzerland, Helvetas staff had begun organising a response on the day of the earthquake. An Emergency Fund that the organisation has set aside for exactly such a purpose was released, enabling the Nepal country office to authorise the purchase of relief supplies. A relief appeal was also organised and quickly launched. It attracted a huge response from the Swiss public. Whilst many Swiss people donated funds, there were also a number who sought to fly out to Nepal to help in person. They were not always easily persuaded against this idea, although the reality was that very few foreign experts were needed on the ground.

Helvetas held discussions with Solidar Suisse and Caritas Switzerland with a view to forming partnerships for emergency relief and later reconstruction activities in Nepal. The synergies were obvious: Solidar Suisse and Caritas had the humanitarian relief experience and knowledge, whilst Helvetas had the local knowledge and experience. All three organisations being Swiss, there was clear potential for attracting funding from Swiss Solidarity (as proved the case), as well as a degree of shared cultural understanding, especially at Head Office level. The partnership was quickly forged and became a far more lasting and productive one than many other partnerships suggested by other international humanitarian organisations arriving in the immediate post-earthquake period.

The partnership with Caritas Switzerland entailed a specific technical input. National staff of Helvetas Nepal provided WASH (water, sanitation and hygiene) support to schools built with Caritas support (the REAS project). This support took the form of a water supply, and awareness-raising on sanitation and hygiene. The partnership with Solidar Suisse was a different model, and a true consortium. The initial project proposal (REAP) was jointly elaborated; joint support visits were organised from Switzerland; a follow-on project (REAP II) was also designed jointly, as was a final project evaluation. As technical support, Solidar Suisse fielded a resident expatriate specialist who was deployed to work with a Helvetas team of national staff.

In the first weeks after the earthquake, before these project teams were established, Helvetas organised a core Disaster Response Committee of six key staff and sent out teams of staff who volunteered to conduct local needs assessments. Meanwhile, the Country Director, Deputy Director and the three Swiss staff present in country played a strong liaison role with other relief and donor agencies. The Deputy Director took on the additional role of chief spokesperson for media coverage.

Sequence of activities following the earthquake



"I was in Dhankuta conducting a staff training when the earthquake occurred. Within 15 minutes I was in mobile communication with the International Programme Adviser, Country Director and then Franz in head office. After that, I started contacting our staff via our security coordinators and by the following day could confirm that every staff member was safe, although the houses of some were damaged, and many were traumatised. The next day, I travelled to Biratnagar [close to the Indian border] where, with other staff members, I purchased tarpaulins and other emergency supplies in bulk, and sent them by air courier to Kathmandu. By the time I could return to Kathmandu myself, on 28 April, the tarpaulins had already been loaded onto our vehicles and teams were heading out to Sindhupalchok with them. I think we were the first INGO to get supplies through to Melamchi."

Srijana Shrestha, Helvetas Safety and Security Coordinator, interviewed April 2019



"We observed that almost all the latrines in the assessed VDCs (Mahankal, Ichowk, Sipa Pokhari) had toppled down, and respondents indicated that the same is the case in other VDCs... We assumed that food and sanitation would be the first problem, but the rapid assessment showed that shelter was the first requirement, and the management of animal carcasses and dead bodies buried under fallen infrastructure was the second priority."

Bikram Rana, member of Helvetas early response team and later Team Leader, REAP I, 6 May 2015

It was soon clear that the greatest need was not food, but tarpaulins and blankets for shelter, and clean drinking water. Helvetas staff located at Nepalese towns bordering India worked with the finance team to organise rapid procurement, using known contractors. Helvetas drivers and vehicles were deployed, with volunteering staff, to distribute the supplies to the affected communities. In this way, it was possible to supply relief materials rapidly and effectively. During the emergency period (covering the first three months), over 15,700 tarpaulins and 11,500 blankets were distributed, along with over 10,000 sets of shelter materials, 4,280 water purifying kits, and 5,100 dignity kits for women. Care was taken from the start to coordinate with the local government body – at the time, the District Disaster Response Committee. The army was also deployed by the national government to conduct an inventory of supplies arriving for distribution, assist the clearing of debris, assess the structural damage to buildings, and provide security. This raised some initial concern about the possible public perception of an INGO working alongside the army; in the event, however, there was very little overlap in activities on the ground. The army provided a significant early contribution, and then left.



"The devastation caused by the earthquake was massive, and I could not imagine that the villages would be able to revive to their pre-earthquake situation. After three days, CDECF with support from Helvetas got engaged in distributing relief materials. The community appreciated our work then - and continues to appreciate what we are doing now with the construction of earthquake resilient houses and other infrastructure. Today the face of the villages has changed incredibly. I am happy to be part of this reconstruction endeavor."

Pandav Adhikary, partner NGO CDECF, Sindhupalchok, interviewed June 2019

The earthquake occurred shortly before the prolonged rains of Nepal's summer monsoon, which lasts from early June to September. It was important to establish adequate temporary shelters before the rains set in. This, local communities quickly started doing themselves, using whatever materials available (such as corrugated sheeting, bamboo and salvaged materials) and assisted by relief agencies offering tents and tarpaulins. Keeping recovered grain stores dry was also a major preoccupation. Thereafter, ensuring that the monsoon paddy planting went ahead as usual, thus avoiding future food shortages, became a priority. Maintaining the usual activities of the agricultural cycle was, furthermore, psychologically important for the affected people. Helvetas staff worked on the emergency maintenance of damaged irrigation canals and distributed over 20,000 kg of seed of the locally preferred paddy variety. At the same time, other staff were engaged in erecting toilets in public buildings, especially schools, as well as temporary latrines for household use. They also established emergency drinking water systems – repairing pipelines, tapping water sources for temporary shelters, and building new or repairing damaged reservoir tanks.



"We neither have sacks nor seed bags to store grains. We are storing harvested wheat outside our temporary shelter as there is no room inside. It's just covered by a tarpaulin – I don't know how I can save it from rain, rats and insects. I'm really worried about how to store wheat seed for the next season – all the households here have the same problems."

Purnima Tamang, Virkharka village, Kiul, interviewed mid May 2015

"We don't need relief packages any more – now we are alive, we want to continue farming to sustain our lives from now onwards... We are slowly coming back to agricultural activities. We have harvested the wheat crop but have no place to store it; as the planting season is approaching, we must sow paddy immediately, but we don't have seeds. At this moment, we are desperate to have paddy seeds, repairs to the irrigational canal, and support for harvesting and storing the wheat crop."

Prabha Bhandari, Mukhtar village, Kiul, interviewed mid May 2015

As the weeks turned to months, staff were rotated on earthquake-related duties so that they could also continue their work on projects in other parts of the country that were largely unaffected by the disaster. Special thought was also given to prioritising the most vulnerable and working with women – as discussed further in sections five and four, respectively.

For the people who had lost their homes and family members or neighbours, the 2015 monsoon was a generally traumatic and physically uncomfortable period. Nevertheless, being able to plant and then harvest the usual monsoon crops represented one important step in re-establishing their lives.

"This immediate support to repair the irrigation channel helped avoid food shortages in the months to come."

Madhav Gajurel, Ichowk, interviewed early August 2015

Once the 2015 monsoon was over, reconstruction should have begun immediately. However, it was delayed by political issues mentioned in the previous section (especially the Indian blockade), and only really started in late spring 2016. The main building season in Nepal is during the driest time of the year, November to May, so much time in the first season after the disaster was wasted.



Housebuilding according to earthquake-resilient norms



Living conditions in the early months after the earthquake were very difficult

4. A HOLISTIC APPROACH TO RECONSTRUCTION AND DEVELOPMENT

The Helvetas contribution to the reconstruction effort aimed to be as holistic as possible, contributing to the longer-term development of the Melamchi-Helambu area. Support therefore, not only focused on rebuilding resilient homes (and schools), and ensuring robust safe drinking water, sanitation and hygiene facilities, but also covered a range of activities for restoring agricultural livelihoods. These included unconditional cash distribution and restoration/upgrading irrigation channels and improved watermills; agricultural advisory support and farmer business schools; the construction of an agriculture extension centre; and support for joint land ownership (giving women equal title with men). Although the funding for all these activities came with a humanitarian label, many have features of longer-term development interventions. Furthermore, all these interventions were endorsed by local governments and routed through them; this resulted in activities being well recognised and appreciated by the government and by other development agencies.

4.1 Shelter (housing)

“Good and disaster resilient reconstruction is an investment in the future. In that sense reconstruction is a development rather than just a humanitarian assistance issue.”

Tom Schacher, Architect and Solidarity Swiss evaluation consultant, pers. comm. September 2019

Training in earthquake resilient construction techniques

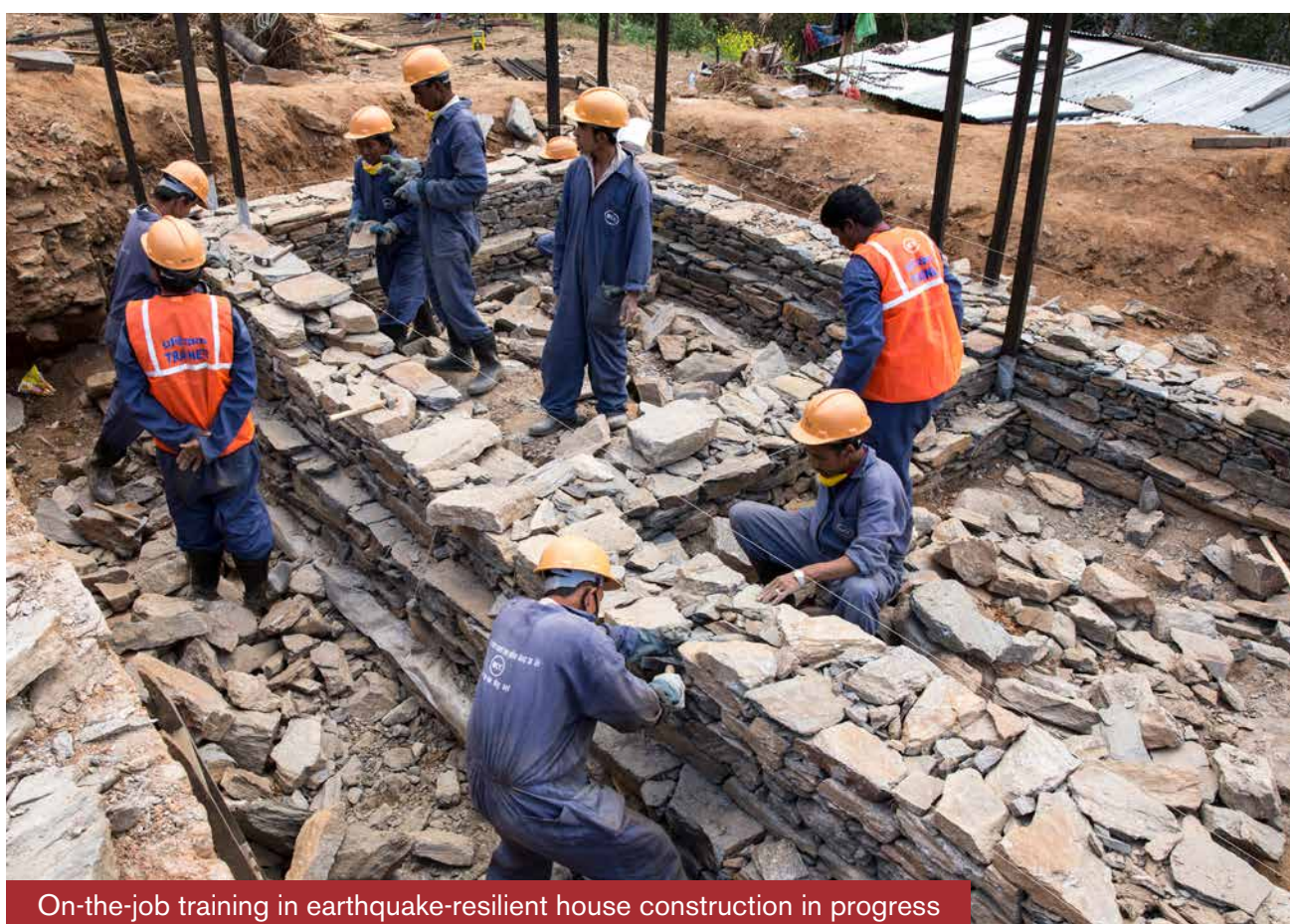
The task of reconstructing homes (let alone public buildings) was huge, and it was clear that simply building back in the same manner was unwise. Yet the Nepalese workforce – especially out in rural areas – was largely unfamiliar with earthquake resilient building techniques. Training masons and carpenters in such techniques was a crucial first step in reconstruction. In this, Helvetas was able to draw on the long experience of the Employment Fund (EF), an SDC project implemented by Helvetas also supported by DFID and the World Bank. Working with both private training institutions and the Council for Technical and Vocational Education and Training (CTVET – the government agency responsible for training curricula and standards), the Employment Fund had been supporting vocational education in a variety of sectors – including construction – since 2008.

The Swiss government (SDC), and subsequently also the British government (UK Aid) agreed to re-orientate the Employment Fund into a project focusing solely on skills for reconstruction. The SDC project, EFSR began already in July 2015 – though practical construction work only started after the monsoon. As already noted, the offer of this training extended well beyond Melamchi and Helambu. The selection of participants was based on them having lost their own home and wishing to rebuild it, as well as an expressed wish to take up masonry or carpentry as a trade, thus contributing to a future pool of trained workers. Some of them already had construction experience, but this was not made mandatory. What was mandatory was a quota of 30% women trainees, to ensure employment opportunities for women; experiences in this regard are outlined in other publications but were not very successful in Melamchi and Helambu. In the immediate period after the disaster, many people expressed interest in the training without having a clear intention to continue as masons or carpenters afterwards. Subsequent selection was made more rigorous, to determine genuine motivation. In all, over 10,000 masons were trained through Employment Fund Skills for Reconstruction (EFSR), an SDC project and Employment Fund Reconstruction Skills (EFRS), a DFID project, both implemented by Helvetas, representing a huge pool of skilled labour – even if not all of them have continued to work full time in the construction sector.

The training that was devised, refined over time and used by both projects was an on-the-job, 50-day course under which a group of ten trainees was split into two teams of five, with each team reconstructing

the house of one of their members during the training period. Emphasis was on learning through doing, incorporating key earthquake-resilient techniques into the building. Two outcomes were used for assessing the service providers that organised the training. These were the existence of the reconstructed houses; and evidence of those trained being engaged in gainful employment as masons or carpenters six months within training completion. It was a win-win situation: individuals were trained, and a house was built for once amongst their number. In many cases, the Nepalese system of *parma* – shared labour – was adopted by the groups, so that they contributed their labour to building a house for every group member. Nevertheless, this had to be balanced by the need of group members to earn cash income.

Many agencies organised training in reconstruction techniques for people in the earthquake-affected areas, and there was much debate over what this training should entail. Different models were considered and shared through the Housing Recovery and Reconstruction Platform (HRRP). The need for a training that lasted 50 days was particularly questioned, but the NRA eventually adopted and institutionalised the 50-day training course as a government norm for individuals without previous construction experience. For already skilled masons, a seven day “top up” course was deemed enough.



“Integrating the earthquake resilient technology and deeply -rooted practice of “parma” – a system of labour exchange – was key to building houses fast. This model was successful in providing an example of how houses can be built with earthquake resilient components yet using the same traditional materials. I feel proud to have been part of this process and making it into a national reconstruction model. Very few believed in it the beginning.”

Subas Subedi, currently Team Leader of the SDC project ENSSURE and former Team Leader of the SDC project EFSR

Adjusting to government reimbursement mechanisms for house reconstruction

The Solidar-Helvetas consortium originally planned to rebuild 1,000 homes, selecting those most in need and covering the full cost of materials. However, this plan had to be revised down to 783 houses due to the rapid increase in construction costs, and the announcement by the NRA that no grants could be paid directly by INGOs but instead had to be channelled through the government inspection process and follow the government-set rate. As already noted in section 2, this rate was revised upwards in July 2016 from NPR 2 lakh to NPR 3 lakh in recognition of the true cost of rebuilding. The price of construction materials has generally continued to increase. Four years after the earthquake, the construction of even the simplest two-roomed home already costs over NPR 5 lakh (approx. USD 4,500). Furthermore, although the tight inspection mechanism has largely ensured the construction of safe houses, there have been many cases of payment delays due to misunderstandings both on the side of house owners (regarding the necessary procedures) and government engineers. There was generally a high turnover of government engineers; this meant that not all were familiar with the REAP house design or the fact that it was government-approved. Some questioned its suitability – generally being more ready to approve reinforced concrete structures. The payment delay is discussed in section 5, as in some cases it led to indebtedness.



“Due to the delays in grant payment earlier on, especially in busy construction periods, some beneficiaries came to our office when drunk, demanding their money from us and the field team. They threatened us, saying that if we did not pay in time, we would be un-welcome in their community. This really disturbed us.”

Chhabi Dhakal, REAP Engineer, interviewed 29 May 2019

Box 4: REAP and REAP II: key differences and lessons learned

REAP	REAP II	Lessons learned
House design fixed in terms of construction materials; intended to meet the needs of the most vulnerable households.	Project provided technical assistance only; thus, there was flexibility in house design, according to owner wishes.	“Owner-driven” house design should be allowed far as possible within earthquake-resilient norms.
Strong emphasis on the use of local materials to keep costs low; also, money remains within the community.	Choice of materials in the hands of owner.	The cost of materials can change over time according to supply, demand, and improving rural access (roads). Also, locally available materials may not always conform with earthquake-resilient norms. House owners should feel confident that their house is strong. Thus, some flexibility in choice of materials is desirable.
Top-up support to vulnerable households – initially in cash, later in materials.	No top-up support to vulnerable households, only technical assistance.	Top-up support to vulnerable individuals is highly desirable. However, the selection criteria used is a crucial point (see discussion in section 5).
Support for accessing NRA grant only given to participating (i.e. selected) households.	All households given support to access the NRA grant.	Given the complexities of the grant release system, and the distance to the offices concerned, this support was highly appreciated.
The free online software Kobo was used for collecting household data in the scorecard survey, but other monitoring data was recorded and analysed in Excel.	The commercial software ComCare was introduced, allowing more detailed monitoring.	Kobo served as a learning ground for digital monitoring of shelter activities. ComCare then proved to be an excellent tool for monitoring both technical and social support to households.
Project field office in Melamchi.	Resource centre in Helambu (Chanaute), a location that facilitated the deployment of field staff.	Resource centre was not used as much as anticipated, perhaps because it was only seen as an office. Possibly it would have been used more if located close to the municipal office, which people are frequently required to visit.
Grievances received by staff on their mobile phones or recorded in visits to the office and followed up.	Fixed phone line for grievances; all noted in the ComCare database and followed up.	A fixed line phone for grievances with a 24-hour recording service is necessary; all calls should then be noted in the database and followed up.
REAP employed technical staff, but social services (excepting one Social Safeguard Officer as supervisor) were provided through the partner CDECF.	The number of technical and social field staff (the latter still employed by CDECF) was increased to cover the entire area. Deliberate recruitment of local people speaking local community languages (Tamang, Helmo).	High staff numbers are needed to ensure regular visits to all households given the difficult terrain. Local staff (speaking the community language) are essential. However, later in implementation, once staff are familiar with the work, social and technical functions might be performed by one person.

House design

The house design adopted under the Solidar Suisse-Helvetas original shelter project (REAP) was a simple two or three-roomed, single storey building; see box 5. The successor project (REAP II) no longer insisted on this design, but also provided no top-up support to beneficiaries. Key differences between the two projects are given in box 4. Clearly the follow-on project sought to learn from early experiences but was also designed in a different context and within certain funding constraints.

Box 5: The REAP house design

The aim of this design was to create houses that were affordable, even for the poorest people, whilst remaining structurally sound and conforming to earthquake-resilient norms. The use of local materials was prioritised, both to minimise transport costs and to keep money flows within the community rather than going outside to vendors of cement and other materials. Key features included adequately excavated foundations, wooden bands at intervals up the walls, well cut corner stones, minimum diameter wooden door and window frames, and a corrugated iron roof. Timber was chemically treated to be termite resistant. The use of materials salvaged from former housing was also foreseen, if they fitted within the prescribed norms. However, the amount of salvageable material was originally overestimated at 80% in the case of stones; experience showed that on average only 50–60% could be reused (Chhabi Dhakal, pers. comm. 30 May 2019). In the case of timber and corrugated galvanised iron (CGI), generally only some 25% could be re-used.



“The REAP-supported houses conserved traditional and cultural design elements, being built from locally available materials - stone with wooden bands rather than concrete design. Concrete houses of the same design throughout the village result in a loss of the cultural identity of the community. Furthermore, people of different communities have a different choice and interest in shelter design based on their geographical, cultural, religious and caste identity. Thus, the agencies involved – both government and non-government – need to listen to the people’s voice when supporting reconstruction to ensure their full ownership as well as the necessary features for earthquake resilience.”

Tek Nath Acharya, Social Safeguard Officer, REAP II pers. comm. March 2019



“Helvetas/Solidar has supported the reconstruction of houses in four wards of Melamchi municipality. They are being completed in time, thus helping us to showcase the pace of our reconstruction in the early days. These houses are built with local materials and are therefore not only cheaper and affordable for poor people, but also healthier compared to the houses built with cement.”

Dambar Aryal, Mayor, Melamchi Municipality, interviewed February 2019

Although the REAP design has generally remained the cheapest form of construction, over time the price of materials in different locations changed, according to supply and demand. For example, timber prices in Melamchi rose as the most readily available forest resources were exploited, whilst the construction of new rural roads reduced transport costs – rendering concrete bands competitive in price with timber in some locations. Many house-builders preferred concrete bands, thinking that they would be stronger, and this led to some difficult discussions between project staff and house-owners. While it had been intended that the design should be owner-driven as far as possible, the REAP design, with its treated timber bands, was strongly favoured by the project as being the most cost-effective. Some households out of those originally selected dropped out for this reason, preferring to earn money first (by labour migration or local employment) and then build a house in accordance with their wishes. Generally, those who remained in the REAP scheme were the most vulnerable and disadvantaged.



"I am happy with my four-roomed house, I believe it will resist another earthquake. However, I would have preferred to put a cement band rather than a wooden band at the foundation level – that would have made it even stronger. I'm still hoping to plaster the outside, but I don't have the money to do so yet. I completed the construction last year, all together it cost about NPR 6 lakh. I received the NPR 3 lakh grant but I have an outstanding loan of NPR 2,30,000 on which I'm paying 18% interest."

Kami Tamang, trained mason and beneficiary of REAP, Manu, Melamchi, interviewed March 2019

Social support in house reconstruction

The social support provided during house construction proved to be essential in helping the most vulnerable – people who were poorly literate, infirm or otherwise unable to cope with the government bureaucracy of claiming the grant to which they were entitled. A first step in this respect was to open a bank account, which many did not have, and which required official proof of identity. This was just the first of many bureaucratic hurdles in which they needed support. Even after the implementation of the federal system of government in 2017, government inspection procedures remained district-based; for Melamchi-Helambu residents, this means travelling to the district town of Chautara. For those living in more remote areas, a round trip to Chautara takes a full day at minimum and may be prolonged due to the absence of government officials on other business. Associated with such a trip are transport, accommodation and food costs. For disadvantaged, vulnerable citizens, support in accessing grants was essential.

Beyond the practical support provided by project staff, the psycho-social element of regular visits should not be underestimated. Vulnerable individuals undoubtedly took great comfort from staff visits, helping them to gain the courage and confidence to re-build their homes.



"I am a blind person living with my wife. I was trapped inside my old house when it was destroyed in the devastating earthquake and was only just rescued alive. My neighbours supported us to erect a temporary shelter. Later Helvetas and [the local NGO] CDECF came and encouraged us in the construction of a new house. They not only provided the technical support but also facilitated the access to the reconstruction grant in different tranches, which would otherwise have been extremely difficult for a person like me. The construction of my new house took about 6 months, now I am living in it. I'm very happy."

Masino Tamang, Ichok, Helambu, interviewed January 2019

Modern technology to track construction progress

With house reconstruction proceeding at a varying pace in different locations, it was important to keep a careful track of progress. Under REAP, this was done through maintaining a detailed database in Excel. In REAP II, the use of the commercial software CommCare was piloted. This allowed a highly accurate tracking of exactly what was taking place on the ground, both regarding the technical and social services provided to households. Numbers of visits to a household and by which staff member, the reason for the visit, the progress since the last visit, grant payments made and the time taken between certification by the government engineer and grant payment into the beneficiary's bank account, grievances received and addressed – all could be readily retrieved and filtered by household, location, staff member, date and so on. This was not only helpful to project managers; it also generated a healthy exchange and comparison of progress between field staff, and greatly facilitated accountability to affected people (see section 5).



"Implementing the "CommCare" project under REAP II has been an exciting and rewarding experience. It has also been a challenging one. For anyone conducting a similar project, I would say good preparation is crucial. This means building a solid team who know what data must be collected and how to enter it; understanding the phases of implementation and therefore what is important to record; and knowing where to access useful resources along the way." (as explained in the CommCare administrators manual).

Chandrakant Lal Karna, IT Specialist and CommCare database manager REAP II, pers. comm. May 2019

4.2 WASH (Water, Sanitation and Hygiene)

Expertise in WASH is a core competence of Helvetas in Nepal, activities being focused in Karnali, in the West of the country. The deployment in the reconstruction effort of staff who had worked in Karnali was a deliberate strategy to utilise this experience – but additional disaster-resilient aspects were also brought to bear in the design of the water schemes. In total, 54 drinking water schemes were supported through the Solidar-Helvetas consortium in the Melamchi-Helambu area, resulting in 3,448 households having access to safe drinking water. In addition, Helvetas provided support in behavioural aspects of WASH to the 36 schools constructed through CARITAS support. The so-called "blue schools" model was used in eight schools (see more below in section "Innovative Blue School" below).

Improved physical water supply structures

One of the effects of the earthquake was the change the groundwater profile, so that some regular sources dried up and others materialised. In many cases, new intakes were required for existing, damaged schemes, in addition to the replacement of destroyed pipelines, reservoirs, or regulating chambers.

All water supply structures were reconstructed with improved resilience in mind – most notably by reinforcing collection chambers with concrete bands. The innovation most appreciated by community members, however, was private tap-stands. Experience has shown that these are cost-effective, as levels of maintenance are better than community tap-stands. As most households in the communities served had previously relied on community tap-stands, the private ones represented a major improvement. Furthermore, the water distribution chambers were constructed to allow for further private connections in the future, should new houses be built.



"We used to fetch water from a community tap some 15 minutes' walk away and had to carry the water in big cans (drums). Now water is at my courtyard, I can fetch it at my convenience and in smaller cans. I don't need to carry big drums anymore, this is a great relief for me..."

Rimai Lama, Treasurer of Upallo Gaon water supply scheme, Melamchi-6, interviewed May 2019

Households were also supported in the construction of toilets. Those covered under the REAP shelter programme all received financial and technical support to build one. Beyond this, there have been concerted campaigns in all the wards of Melamchi and Helambu for them to be declared or re-declared (post-earthquake), as ODF, Open Defecation Free; some communities have received support for toilets from other donors in this regard. The ODF campaign extends to the entire district of Sindhupalchok, which declared itself ODF in August 2019.

Institutional aspects

All drinking water schemes were established with close community consultation and engagement, entailing the formation of a user group headed by a water user committee, WUC. Regular technical maintenance is undertaken by a Village Maintenance Worker (VMW) living locally and trained for this purpose; priority is given to interested women and/or disadvantaged individuals. For example, in one case in Helambu, a physically disabled man, Durga Prasad Chapagain, has become the VMW. The ways in which the institutional sustainability of water user groups has been supported is outlined in box 5; whether for drinking water or irrigation water, the principles are similar.



"I started to work on the scheme after the training. I was a bit confused at first, but after finishing one structure, I was very happy. When I saw the whole drinking water supply scheme completed, I was quite overwhelmed. I constructed the intake, the flow regulating chamber, the distribution chamber, the reservoir tank, and private taps in people's yards. The training gave me both a skill and income.... After this construction, I could do the work by myself [for another one] if given the design.... People will remember me for this."

Durga Prasad Chapagain, VMW, Nayabasti water scheme, Helambu Ward 6, interviewed December 2017

Box 6: Promoting sustainable institutions for water use management: key aspects

Inclusive membership: All households using the given water resource are members. For drinking water, each household pays a standard small sum for their own tap stand. In the case of irrigation, the user committee is free to set the fee either according to the amount of land irrigated – so those with more land pay more – or a fixed rate.

Representative committee: This comprises elected women and men who are together representative of the ethnic and caste diversity within the user group, and who supervise the management of the scheme. Any change in the rules governing the supply must be agreed by the WUC, for example, limiting the water supply to certain hours, or increasing the monthly maintenance fee, should either prove necessary.

Maintenance fund: Membership fees are used to establish an Operation and Maintenance fund, and a bank account opened in the name of the WUC. The committee can waive or reduce this fee for households that face difficulty in paying. Every household also pays a regular maintenance fee that is decided by them. This goes into the WUC bank account to fund future repairs.

Trained maintenance worker: A Village Maintenance Worker is trained through the project. S/he is paid a small stipend from the WUC's Operation and Maintenance Fund.

Registering the scheme with the appropriate authorities: Prior to federalisation, water supply and irrigation schemes had to be registered at district level, with the District Water Registration Committee. This was done for the earlier schemes. Since federalisation, registration has been done at municipal level, following the recommendation of the ward. All the necessary papers were handed to the municipalities by project completion; all but two irrigation schemes were registered by the time of project completion.

Perhaps the greatest danger to the water supplies in future is damage through road construction, which is continuing apace throughout rural areas. In this respect, it is important that WUCs are cohesive and robust enough to defend their rights at municipal level, since it is the municipality that plans, builds and maintains rural roads, working through local contractors. Strong leadership of water schemes will no doubt play a part in ensuring that they are not damaged – or if they are, that they are quickly repaired.



“We know that a project only lasts a certain time. But water is our life – so if there is a problem in future, it is our responsibility to deal with it, to make repairs as necessary. We will not ask for money from others, we will do it ourselves.”

Dhan Bahadur Tamang, Bicharichour Ratoghar Taprasa WUC Chairman, interviewed May 2019

Promotion of hygiene awareness

The social aspects of WASH were supported by the partner CDECF, notably through young, local women acting as social mobilisers. They worked to ensure delivery of a “package” of awareness measures: hand-washing at key times (especially after toilet use and before food preparation); keeping food utensils clean – including the construction of wooden racks for drying utensils in the sun; ensuring the safety of drinking water from tap for consumption; and generally maintaining order and cleanliness. The partnership with CDECF is discussed in section 5.

Innovative blue schools

Helvetas uses a “blue schools” concept that was co-developed with other Swiss experts and is implemented in a variety of countries worldwide.³ It incorporates WASH concepts into both the physical infrastructure of schools, as well as in teaching. The infrastructure comprises a reliable, all year supply of piped water; separate toilets for girls and boys – with additional facilities for menstruating girls in the case of secondary schools; hand washing stations with soap; drinking water provision (with water filters if necessary) in classrooms; and school gardens using water run-off from washing points. Teachers are supported in incorporating information into their local curriculum about hygiene, vegetable cultivation, and healthy nutrition.

In collaborating with Caritas Switzerland in its school reconstruction programme, Helvetas was not responsible for the sanitation infrastructure within the school premises – this was undertaken by Caritas. The role of Helvetas was to ensure an adequate and regular water supply to the school premises, and to sensitise pupils and parents to sanitation and hygiene measures. In the latter, Helvetas partnered with the CDECF, which worked with teachers to reinforce WASH principles and ensure their implementation in daily school activities. In eight schools, this was further developed into the full “blue school” model which includes the use of waste water for vegetable cultivation.

“The school is a hub for knowledge sharing and learning where the introduction of a small thing can produce a greater result. Schools are a gateway for transferring hygiene and sanitation knowledge to the community. In my observation small children are more influenced and play a key role in transferring hygiene-related messages to their families... The dedicated water supply and child, girl and disabled-friendly WASH infrastructure built after the earthquake have a supportive role in the promotion of hygiene and positive behavioural change amongst students. Without enough water, the sanitation facilities and the water filters, better hygiene and positive change in behaviour wouldn't be possible.”

Hasta Pandit, School Management Committee Chair, Shree Mahendra Higher Secondary School, interviewed June 2019

³ <https://bit.ly/33kvgjk>



"We've learned how to grow vegetables such as these cabbages using drip irrigation, which means that you save water. The water is directed from the pipes just to the roots, rather than all over the vegetable garden."

Rupa Neupane, student, Panchakanya School, discussions February 2019

4.3 Earthquake-resilient irrigation

The lower reaches of Melamchi and Helambu cover fertile land, traditionally irrigated and cultivated for paddy in the summer. One, sometimes two, additional winter crops are often also grown; where all-year irrigation is possible, off-season vegetables such as potatoes are cultivated and fetch a high market price. The widespread damage to irrigation channels following the earthquake disrupted this agricultural pattern, although as mentioned in section 3, the rapid support provided in the immediate emergency period enabled some farmers to grow paddy as usual in the 2015 monsoon.

In all, Helvetas supported the renovation and/or construction of 42 irrigation schemes through the ReAL project, with funding from Swiss Solidarity. These drew on lessons learned from other small-scale irrigation schemes implemented by Helvetas elsewhere, most notably by the project LILI⁴. All the schemes constructed under the ReAL project incorporated Disaster-Risk Reduction (DRR) elements such as reinforced concrete canals, and the covering of canals running through areas prone to soil or rocks falling from above. In addition, they incorporated bio-engineering aspects (Studer, 2017), with communities being encouraged to plant vegetative cover such as napier grass (*Pennisetum purpureum*) and broom grass (*Thysanolaena latifolia*) on areas prone to earth-slips. Most importantly, the project adopted a community-based approach from the outset, establishing a user group of all households whose land would be benefitted by the scheme and ensuring that they elected a representative Water User Committee (WUC). Such committees took a lead role in construction, ensuring that key decisions were taken in a democratic manner and that the users provided the labour as far as possible. They also established a maintenance fund and appointed a maintenance worker who was trained by the project (see box 6).



"We didn't have any knowledge or experience of this type of excavation (digging out a channel from a landslide area), so we brought two masons from Bahrabise who know about such things.... Everyone came to help – women as well as men.... During the latter half of the project we managed to construct part of the canal by ourselves; now the women too can prepare the cement mortar, fix the reinforcement and support construction. Everything we did, we discussed – maybe in total we had 22 or 23 meetings, and for all of them, we kept minutes."

Dawa Sangbo Gurung, WUC Secretary, Halde irrigation scheme, Melamchi, interviewed February 2018

⁴ The LILI project was an SDC project implemented by Helvetas that operated in the districts of Achham, Dailekh, Kalikot, Jajarkot, Dolkaha, Khotang, Ramechhap and Okhaldunga over 2006–2014.

As in the case of drinking water schemes, a crucial factor will be the institutional robustness of the groups and their committees in arguing for their rights at municipal level. Even before the project end, two irrigation channels were damaged by contractors building municipal roads. Although both Melamchi and Helambu municipalities agreed that they will repair, at municipal cost, any damage caused by road-building, this will need to be followed up and is likely to require regular lobbying on the part of the WUCs.

4.4 Agriculture and livelihoods

Support for agriculture and livelihoods was provided through ReAL in collaboration with eight local agricultural cooperatives – the main local source of agricultural credit and support. This partnership began with a cash transfer programme, and then expanded to other activities.

Cash distribution for urgent livelihood needs

It is widely recognised that following a humanitarian disaster, one of the most effective ways of supporting affected people – in situations in which markets are operating reasonably effectively

– is the provision of cash (Harvey and Bailey, 2011; CaLP, 2018). However, this is not easy to organise transparently and fairly (see section 5). Since funding was limited, cash payments had to be selective; determining those most in need took time and resulted in grievances. In the end, payment only proved feasible in July–August 2016, over a year after the earthquake. For the beneficiary households, it was nevertheless an important support in recovery. Rather than hand over cash directly, it was channelled through the bank account of the participating cooperatives, which then issued a cheque to each of the selected women or men. As far as possible, payment was made to women as they were considered most likely to use it productively.



Bagirathi Pandit learned improved agricultural techniques through training provided under the ReAL project

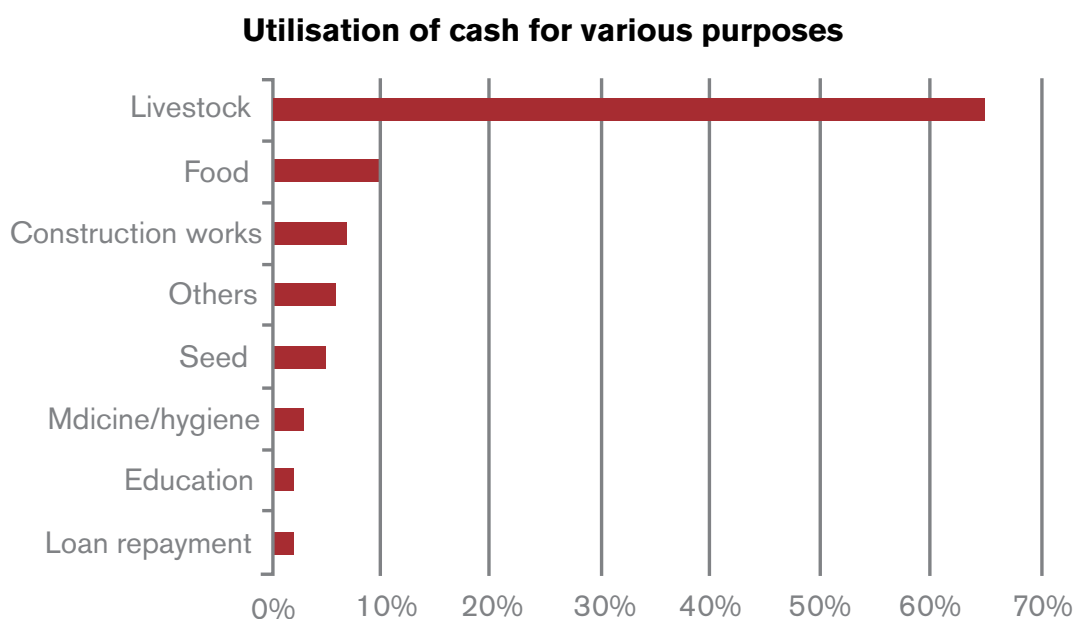


“Unconditional cash immediately empowers the affected family, with dignified choices based on their priorities without any conditions to fulfil. This is the kind of support that any disaster affected family deserves in crisis. For example, I know of a case of a disabled woman with no agricultural land and limited livelihood options who used the cash that we delivered to buy a sewing machine and immediately started earning for her family. This was a far better option for her than the provision of seed or animals that would not have helped her much. Often unconditional cash can reduce the cost of relief support, as the provision of materials entails the additional costs of procurement, delivery and distribution.”

Rabin Niraula, Helvetas staff member engaged in early relief work, pers. com. June 2019

A follow-up survey from the cash transfer programme, conducted in December 2016, showed that some 65% of the money had been used by households to purchase livestock, replacing those that had been killed in the earthquake (Helvetas, 2016). Nevertheless, farmers were free to use it as they wished. Other uses of the money included food, seed, household items, construction materials, payment of wage labour, medicines, loan repayments and children’s education.

Graph showing the use of cash distributed to earthquake affected households through Helvetas



Agriculture extension services

Existing Helvetas experience in providing advice in agricultural production and marketing, especially through the established technique of Farmer Business Schools, was adapted to the post-earthquake reconstruction period. This was important in supporting members of (irrigation) Water User Committees to farm in the most effective manner – including introducing improved varieties, crop rotations allowing all year land use (especially high value winter vegetable cultivation under poly-tunnels), and tailoring production to market demand. Under ReAL, Helvetas worked closely with the eight cooperatives, “incubating” them through different agriculture related training courses and activities, which enabled them to expand their activities. The project also linked farmers with agrovets, local governments and private sector actors, thus strengthening markets in the project area. As an example, plastic for poly-tunnels was procured collectively by the cooperatives through agrovets in a competitive bidding process; this reduced the cost for farmers and increased the coverage of agrovets. Towards the end of the project, the cooperatives jointly procured eight improved he-goats of the Boyar breed from Chitwan, which are available to service farmers’ she-goats for a small fee.



“For the trainings provided through Helvetas support [as with others], we have found that women are more reliable. If you give them a training, they follow it. Men – and I am a man myself – do not always follow the training recommendations so well.”

Tanka Prasad Gajurel, Chair, Nawajivan Sana Kishan Krishi Sahakari Sanstha Ltd. (New Life Small Farmer’s Agriculture Cooperative) Chanaute, Helambu 7, interviewed May 2019

Improved water mills

Traditional water mills to grind food (or process other materials) are a common feature of rural Nepal. Harnessing the force of running water to turn a wheel or turbine, thus producing mechanical energy, they are an important means of reducing work drudgery, particularly for women, in preparing grain for consumption. Many water mills in the Melamchi-Helambu area were destroyed or damaged in the earthquake. However, their owners were reluctant to rebuild them as they calculated the cost of so doing, to be higher than the likely return on investment, given that grinding charges are low.

The implication was that women in more isolated areas would have to return to using traditional grinding stones; alternatively, they would have had to transport the grain long distances to process it in electrically-powered mills that produce flour of inferior taste.

Helvetas conducted an inventory of 204 such mills to identify those most in need of renovation. The selection of an eventual 31 was conducted in collaboration with ward representatives, based on the available water supply (service catchment), demand amongst users, and composition of the users (disadvantaged groups were given priority). Priority was also given to women owners. The new or renovated mills were all constructed according to an improved design giving greater grinding efficiency - key features being an improved runner and turbine, PVC (polyvinyl chloride) penstock, and a permanent intake canal. In addition, the shed housing the mill was built according to earthquake-resilient specifications, and a toilet was added for the convenience of users, ensuring sanitation standards.

Two ownership models for the improved water mills were used: community and private - the latter being far more common. Only three were established as community mills, with a nominated operator. In both, construction materials were provided by the project, and the owners (individual or group) provided their labour and any materials that could be salvaged. Helvetas staff also gave mill owners or operators a pre-construction management training, and post-construction operation and maintenance training. All the mill owners (private or community) made a social commitment and installed an information board setting out their eight rules of use, and seven social commitments. These included giving priority to pregnant, elderly, differently abled people, as well as a 50% discount for extremely poor households. The commitments were largely respected during the project lifetime, but after project closure in December 2018, individual mill owners no longer felt obliged to continue them, and some reverted to "same rules for all".

Earthquake-affected coffee producers

Helvetas has been engaged in supporting the development of the coffee sector in Nepal over many years, focusing on improving market opportunities for small-holder coffee farmers. A dedicated project to assist the post-earthquake rehabilitation of the coffee sector, REVIVE coffee, was implemented outside the Melamchi-Helambu area in coffee-growing pockets of Lalitpur, Nuwakot, Gorkha, and Kavre. Working through primary and secondary coffee cooperatives, the project sought to return coffee processing plants to full function – especially the pulping centres operated by cooperative groups. More than 40 pulping centres and three central collection and processing centres were repaired or reconstructed, using an earthquake resilient design that also considered sustainability aspects (Helvetas, 2018a).



Ram Prasad Dangol processes coffee cherries in the reconstructed primary coffee cooperative building of Syauri Ashrang, Bagmati rural municipality, Lalitpur

4.5 Working with women

Helvetas aimed to mainstream gender equality and social inclusion through all its humanitarian-development work. Specific “women-friendly” aspects included the distribution of dignity kits during the emergency relief period; improved stoves; and campaigning for joint land ownership.



“Disaster hits everyone equally; however, social constructs worsen the experiences and impact for the socially marginalised, making them more vulnerable. Women in Nepali society are more affected by disasters – including the earthquake. When all the structures were damaged, menstruating women and girls had difficulties with the lack of a safe, private and secure place to change themselves, and the social practice of considering them untouchable during this time made it even more difficult for them. Helvetas provided dignity kits during the relief response, which was a great support to them. We consciously ensured the provision of WASH facilities in both the relief response and rehabilitation period; in designing shelter, toilet provision was a major component. Focusing on women’s priorities like menstrual hygiene helped the efforts of Helvetas to be more inclusive and engaging women in the planning and decision-making process made it participatory. Addressing the privacy and safety of women should be an integral part of any recovery phase. If managed well, relief and rehabilitation efforts can provide a tremendous opportunity to address established harmful social norms. I felt fortunate to lead Helvetas’ reconstruction and rehabilitation programme which brought drastic changes in the lives of the women that we worked with. To see women coming together supporting each other and holding courage to challenge gender roles after the earthquake was an encouraging and hopeful experience in my life.”

Mona Sherpa, Fomer Deputy Country Director, Helvetas Nepal

Menstrual hygiene

In Hindu tradition, menstruating women are considered untouchable and “polluting” – meaning that they literally should not be touched; should not prepare food; and are supposed to sleep in a separate area, away from other family members. Helvetas has campaigned actively against such discriminatory practices in its WASH projects (especially in Karnali), and staff realised that such messages also needed reinforcing during the relief effort. Some agencies, thinking that they were being “women friendly”, sought to offer women-only shelters for menstruating women. However, this could also be interpreted as reinforcing negative gender norms, and was thus opposed by Helvetas (Mona Sherpa, pers. comm).

The supply of dignity kits as a component of relief supplies is not a new idea, but they were something that was highly appreciated by women. Each kit contained washing materials and a soft cotton cloth as reusable sanitary padding. The provision of disposable sanitary pads was rejected given the difficulty of hygienic disposal, and the fact that they would have been unfamiliar to some women. Many (especially older women) are used to simply binding themselves with old cloth during menstruation; the soft cotton cloth represented a great improvement.

“We had to wait until dawn or then to dusk to defecate, which meant there was a risk of snake bites and harmful insect bites. It was even worse when I had my period. But the tarpaulins and the dignity pack made a huge difference...”

Sukmaya Tamang, then pupil of Saraswati Higher Secondary School, Gyalthum, Mahankal, interviewed 7 August 2015

Improved stoves

Many rural households in Nepal continue to use fuelwood for cooking (and heating), although this is changing with better road access, power supply lines, and the greater availability of gas cylinders, and gas and electrical stoves. Since fuelwood collection is arduous, and the smoke from fuelwood is bad for lungs and eyes, there have been many campaigns to introduce stoves that use less fuelwood and channel smoke outside the home. The primary beneficiaries of this intervention are women, as it is they who are mainly responsible for cooking. Under the REAP project, households were given a choice between fitting either smokeless stoves using fuelwood or gas hobs; over 700 were installed.

Joint Land Ownership

In almost all communities in Nepal, land and property are inherited traditionally from father to son(s) in a patrilineal system that leaves wives and daughters with no legal share. This puts women in a very vulnerable position in the case of widowhood, divorce, or a husband taking a second wife (an illegal but nevertheless common practice). It also means that women have no collateral against taking loans and are thus often denied credit. Only about 5% of land and property in Nepal is owned by women⁵. In 2011, the government of Nepal introduced a policy of Joint Land Ownership (JLO) – providing an easy mechanism for husbands and wives to register their land in both their names. However, the policy was not widely adopted – in part because of limited public awareness of its provisions, and in part because men did not see it as being in their interest. This meant that although wives were often contributing equally with their husbands in rebuilding their homes after the earthquake, legally they had no right to this property.

Under the projects REAP and REAP II, the Solidar-Helvetas consortium partnered with the local NGO Community Self Reliance Centre (CSRC) to support couples to register their house and land jointly, under the JLO scheme. This entailed gaining the support of the local authorities, notably the Helambu rural municipality chair and the Melamchi municipality mayor, as well as the land district coordination committees and the Sindhupalchok land revenue office. The project organised awareness raising campaigns and local JLO events were attended by land revenue officials. At these events, households could submit their JLO applications on the spot – lowering the (already small) cost of registration, as they were not required to make the journey to the land revenue office. By project completion, over 900 households in the Melamchi-Helambu area had registered JLO.



“We signed the JLO because we believe it is a good thing. That way neither of us can sell the house and land without discussing with the other. We would first have to agree.”

Harka Singh Tamang, husband of Sirmai Tamang, Chapabot

⁵ <https://www.land-links.org/country-profile/nepal-2/> Sourced August 2019



Roshini Sapkota uses her rehabilitated tap stand.. Photo: Flurina Rothenberger

5. LESSONS LEARNED ON THE HUMANITARIAN: DEVELOPMENT NEXUS

5.1 Project design

The importance of presence prior to a disaster

Humanitarian relief is a specialist discipline which calls for expertise and excellent coordination. There is no doubt that Helvetas Nepal staff learned much in this respect in the immediate period after the earthquake. At the same time, the fact that Helvetas was present in the earthquake-affected area prior to the disaster greatly facilitated its effective contribution to the response, recovery and reconstruction effort. The importance of familiarity with the context, as well as the relationships of trust that already existed with authorities, partners and institutions at many levels should not be underestimated, as further elaborated below. In addition, there were many opportunities for the rapid adaptation of existing project activities to the post-earthquake situation. These include the training of skilled masons and carpenters in earthquake resilient techniques; the tailoring of WASH activities and improved small irrigation schemes; the support to the coffee cooperatives to return to their activities, and the use of tools for agricultural extension, such as Farmer Business Schools, that had been developed through many years of experience. Across all of these, ran a strong focus on gender equality and social inclusion.

Leaving no-one behind

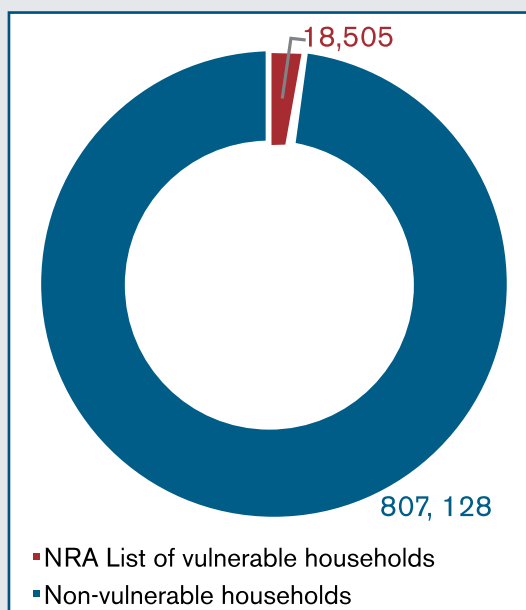
Perhaps the most sensitive and important issue at the nexus between humanitarian assistance and development cooperation is the matter of targeted support. Humanitarian relief in the aftermath of a disaster requires impartiality; all in need should be treated equally. No distinction between individuals is made regarding characteristics such as ethnicity, caste, religion, political affiliation or economic status. Nevertheless, there is a commitment to leave no-one behind – with specific programmes often being devised for vulnerable groups such as women, small children and the elderly. A development approach recognises the diversity within populations and seeks to intervene in a targeted manner to reduce poverty. The “blanket” versus “targeted” approach divided opinion from the outset; four years after the earthquake, there is still considerable preoccupation within the NRA and amongst donors on this issue. Here it is important to distinguish between the immediate emergency period (lasting three months) and the subsequent period of recovery and reconstruction.

One challenge in the aftermath of the earthquake was that the number of households registered with what was then the District Disaster Response Committee (DDRC) increased by 10–20% over the first few months. This was mainly because, in hope of relief support, multi-generational families split, or returned to their villages having been living outside (mainly in Kathmandu). The position of the DDRC as well as the national government was that all affected households should be treated equally. However, once the emergency period was over, Helvetas sought to prioritise the economically poor and socially discriminated; in any case, the available funds were inadequate for a so-called blanket approach. Debate focused on whether to restrict support to limited geographical areas, selected as having a high number of disadvantaged households, or to target disadvantaged households within a wider geographical area. Discussions with the DDRC continued for two to three months before reaching agreement that the Solidar-Helvetas consortium would work in three to five selected (then) wards of the eight (then) VDCs in which activities were on-going. The wards were selected in consultation with VDC and local representatives, based on vulnerability and need. Even then, further selection of vulnerable households had to be made. This was done using a UN scorecard that had been tried and tested in other emergency situations, and which was translated into Nepali (Social Mobilisation Guideline, 2015). Unfortunately, it had limitations in terms of cultural appropriateness; in addition, the weightage given to different criteria resulted in some skewed assessments of vulnerability. Thus, for example, families with many children were given a high vulnerability scoring, even if they had relatives overseas sending monetary support. This created many grievances, as some of the households selected for support were not considered by community members to be most in need, whilst other highly vulnerable households were not included.

As it became increasingly obvious that certain households had special difficulties in rebuilding their homes, the NRA produced a list of vulnerable households. However, this was only released three years after the earthquake, in May 2018. The definition of vulnerable focused on age, physical disability and solitude, and did not attempt to encompass any issues of social discrimination or economic poverty. Thus – like the earlier scorecard – it resulted in some households being identified as vulnerable which were not, and vice versa. Although implementing organisations often have a clear idea at field level which households need additional assistance and which do not, such decisions should never be left to individual staff. Box 7 sets out recommended principles for defining vulnerable households in any future disaster and represents a practical reflection of core humanitarian principles and accountability to affected people.

Box 7: Defining vulnerable households

In May 2018, the NRA released a list of 18,505 “vulnerable households”; about 2% of all the households registered as eligible for the reconstruction grant. These vulnerable households qualified for a top-up grant of NPR 50,000 in addition to the NPR 300,000 reconstruction grant. Households were identified as “vulnerable” if they included a disabled person, an orphan child, or senior citizen (men over 70, women over 65), so long as they did not have an able-bodied adult less than 70 years old. This was a commendable effort to provide additional reconstruction assistance to those most in need of it. NPR 50,000 is a significant amount of money for a poor Nepali household. However, any programme that attempts to identify one group of people for receipt of money while excluding everyone else is fraught with the risk of being perceived as unfair. To manage it successfully, some important principles should be followed.



1. It must be public. People should know whether they are included in the list.
2. It must be understandable. People should know why they are included or excluded.
3. There must be a clear course of action for people to take if they find that the information about them is wrong.
4. The inclusion criteria should be selected with expert input. Which criteria are likely to cause vulnerability?
5. The inclusion criteria should be weighted. Which situation makes a household more vulnerable, having a family member with a disability or having a family member over 70 years old?
6. Vulnerability should be measured, not identified as an absolute condition. That is, instead of saying “this household is vulnerable and that one is not”, say “this household is more vulnerable than that one”.
7. Instead of identifying the “vulnerable” households, identify the most vulnerable. That is, the 2% (or whatever percentage, depending on funding available) with the highest degree of vulnerability.
8. Exclusion criteria should be avoided if possible. Having an able-bodied adult in a household does not preclude it from vulnerability. Even seemingly obvious exclusion criteria like “house already constructed” may be misleading. A family might have rebuilt their house but at the cost of taking on expensive debt.

In the absence of such principles, there is a possibility that drawing up a list of people to receive additional aid can result in dissatisfaction and even bitterness between families and within communities, thereby risking that a well-intentioned initiative undermines community cohesion. Aengus Ryan, Solidar Suisse Technical Adviser to REAP II March 2018–June 2019 and Project Manager April–June 2019

Adaptive project management

There is a tendency in humanitarian projects to provide standardised support, as this is quickest and easiest to deliver. Where speed is essential, this often makes sense. In interventions of a longer-term nature, adaptive management becomes increasingly necessary, as illustrated by the example of the REAP house design (refer to boxes 4 and 5), which allowed for virtually no owner modifications. In the project's second phase, greater flexibility was accepted provided the design conformed with the government's earthquake-resilient norms.

Another issue that required adaptive management, but for which provision was made neither in REAP or REAP II, was home-owner debt. Informal interest rates in rural Nepal are high, with private money-lenders sometimes demanding 2–3% per month, thus 24–36% per annum. Alternative sources of credit are limited and only accessible to those with collateral; such sources include cooperatives and savings groups, but the interest rates they offer are still significant, generally no less than 12%. Unfortunately, many households had to take a loan to finance reconstruction, and then got into debt when grant payment through the government system was delayed. An external review of REAP and REAP II, although extremely positive overall, noted that the problem of indebtedness had been underestimated in project design, and suggested that more could have been done to address it (Chhetri and Thiele, 2019). Although it is doubtful that training in financial literacy would have helped, specific mechanisms to facilitate affordable credit and thus avoid debt traps are worth considering in any future humanitarian-development response.

Accountability to affected people

There are clear humanitarian guidelines regarding Accountability to Affected People (AAP), as set out in box 8. AAP requires an organisational mindset of humility, respect and collaboration with people affected by a disaster and is relevant to issues covered elsewhere in this document – such as the selection of households for targeted support, tailored support (for women and vulnerable individuals), mechanisms to avoid debt, and inclusive user groups with representative committees. This section considers how Helvetas and its partners, including under the consortium with Solidar Suisse, aimed to ensure transparent communication and to respond to grievances.

Box 8: Commitments under the Core Humanitarian Standards (CHS) that require accountability to affected people (AAP)

Commitment 1: Communities and people affected by crisis receive assistance appropriate and relevant to their needs.

Commitment 2: Communities and people affected by crisis are not negatively affected as a result of humanitarian action.

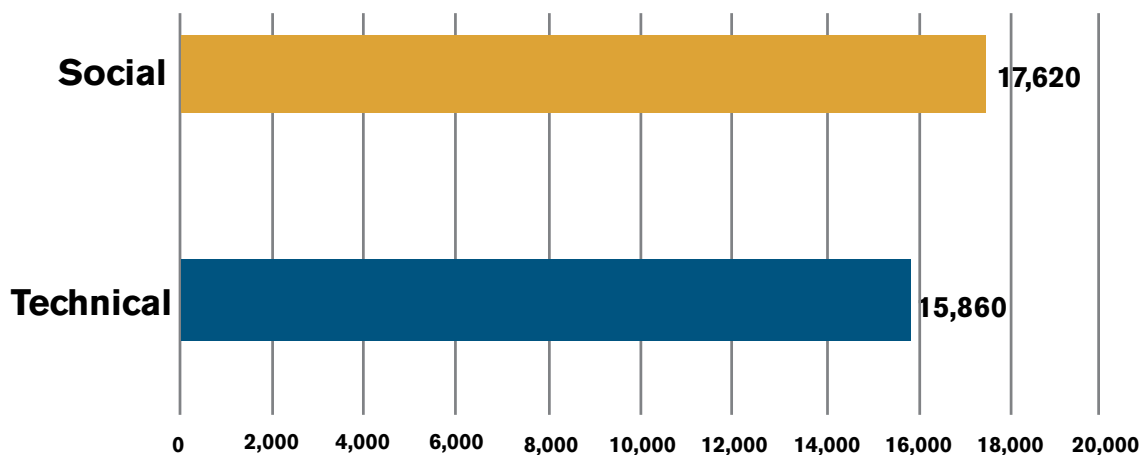
Commitment 3: Communities know their rights and entitlements, have access to information and participate in decisions that affect them.

Commitment 4: Communities and people affected by crisis have access to safe and responsive mechanisms to handle complaints.

(Note that other commitments are not directly related to AAP). Source: Routley and Bogati, 2017 quoting <https://corehumanitarianstandard.org/the-standard>

In the early days of house reconstruction under REAP, the Solidar-Helvetas consortium held many local meetings, organised through the local partner Community Development and Environment Conservation Forum (CDCEF), to communicate what the project could offer, the house design, and the government rules for grant payments. At these meetings, participants could express their interest in support, and sign up. Nevertheless, different rumours circulated, and it was often necessary to visit interested households many times to provide further explanations. The project also shared information via local radio, in newspaper articles, pamphlets and on notice boards. Recognising that many affected people, especially women, had limited literacy, clear illustrations were used to show earthquake-resilient features of buildings, and to communicate sanitation and hygiene messages.

**Graph showing number of visits made by REAP II staff
July 2017–May 2019**



The need for clear communication was further recognised under REAP II, in which the project office was conceived as a “drop in” resource centre, providing information on demand. It was used less than expected, possibly because it was not located at the municipal headquarters – although the location was selected for its proximity to affected people. Door to door visits by project personnel, monitored through ComCare software, were the key means by which information was shared. Household visits were also most effective for reaching women and individuals with limited physical mobility (the old and disabled). As illustration, the graph shows the number of visits conducted by REAP II staff up to the end of May 2019.

By the time of REAP II, local elections had taken place and thus municipal and ward representatives were in place. The project actively engaged with them, inviting them on joint field visits that allowed for discussion over successes and challenges. This investment of time proved important in ensuring that elected representatives fully understood activities and communicated their understanding more widely.



“Those who had no drinking water got drinking water. Those who had no shelter got a house. But to retain these things, people also got knowledge – especially on sanitation and hygiene.”

Ked Nath Ghimire, Chair, Ward 7, Melamchi municipality

Grievance handling was an important part of both REAP and REAP II activities. Although project staff initially willingly gave their mobile phone numbers to affected people, receiving calls of complaint became very onerous. Instead, a dedicated telephone line for grievances was established and answered during office hours; outside office hours it allowed recorded messages. Under REAP II, all grievances were recorded in the ComCare software, together with when they were followed up, resolved, or referred to other authorities if necessary.

5.2 Partnerships for sustainability

Local communities, local institutions

The approach of Helvetas, including in its consortium with Solidar Suisse, was to aim for local people to be “in the driving seat” as far as possible – not as beneficiaries of support, but as partners in reconstruction activities. Thus, for example, affected people learned the necessary skills to rebuild their houses themselves; village maintenance workers undertook training to ensure the continued functioning of water supply schemes (both drinking water and irrigation), and school management committees participated in the promotion of hygiene and sanitation measures. A user contribution was an essential part of community

level reconstruction interventions – building ownership through the contribution of labour, as well as a fund for future maintenance in the case of water supplies. Nevertheless, those who were genuinely unable to contribute could be, and were, exempted from such demands on the agreement of other users. The requirement for community contributions is not such a common practice in humanitarian interventions but has clear advantages for sustainability.

Experience in Melamchi-Helambu also broadly vindicated the approach of working with and strengthening local institutions wherever possible, rather than establishing new ones. Nevertheless, shared values and respect is a necessary part of ensuring a good partnership. For cooperatives, this entailed ensuring that internal governance and financial management was in order, and that activities were conducted according to clearly agreed parameters. For user groups, it was important to verify that membership was indeed inclusive with no legitimate households having been omitted, and that committees were not only representative on paper, but functioned in a democratic manner. Some grievance cases were raised – particularly regarding user group membership – but this was not a major issue. Where households were excluded from a water user group, it was usually on grounds of technical impracticality rather than any social criteria.

Implementation with and through local NGOs

In Melamchi-Helambu, Helvetas had already been partnering with the local NGO CDCEF for many years; the partnership with CSRC began in 2017 and was specific to JLO. The relations with the two organisations have deepened over time and have contributed to the smooth implementation of many activities. The local staff, being from the area, often speak one of the local languages of Tamang or Helmo, in addition to Nepali, and can be easily approached by community members. Nevertheless, the report to Swiss Solidarity on Accountability to Affected People (Routley and Bogati, 2017) found that although local NGOs were appreciated by local people for their accessibility, they were often not trusted as much as INGOs such as Helvetas.

The relationships between Helvetas, Solidar Swiss and our local NGO partners have not always been without tension. The local partners sometimes expressed frustration that positive results are attributed to the Solidar-Helvetas consortium, and difficulties are attributed to them. This is reported in the final external evaluation of REAP and REAP II, along with the comment that in any future humanitarian response initiative, the difference between salaries of the partner staff and project staff should be reduced and more attention given to institutional capacity building of CDECF (Chhetri and Theile, 2019).

The recommendation about reducing the difference between Helvetas and local NGO salaries is difficult to implement. Helvetas salary scales are broadly in line with other INGOs; they are considered fair and not excessive. To suggest an increase in partner salary structures would be interfering in their internal organisation and would likely distort the market for NGO services. Regarding capacity building, this had not been thought necessary at project outset – neither was it requested. This is because the partnership with CDECF was a mature one of 20 years, under which there had been considerable investment in capacity building early on (before the earthquake). However, it is a fact that staff turnover in local NGOs is high, and institutional learning should not be assumed. Thus, the need for regular capacity building of partners should be assessed and included as necessary in any future humanitarian response effort.

Good relations with the government

Over its many years of supporting development in Nepal, Helvetas has always aimed to work with the relevant government bodies as well as other stakeholders. As this text has already shown, working with the government was a key feature of the organisation's response to the earthquake, even when it sometimes seemed to curtail the pace of activities (as in the case of the moratorium on reconstruction activities imposed by the NRA late February to late March 2016).

5.3 Management issues

Good communication between the country office and head office

From the start of the earthquake response, strong communication was maintained between the Nepal country office and the head office in Switzerland. This was crucial for planning activities and reporting progress, writing proposals for further funds, and for communicating with the Swiss public on latest updates. Clear communication channels with agreed responsibilities were set up for these purposes; respecting them led to efficient team work between the two countries.

Office locations and management

Field offices were established in Melamchi and Helambu, with a coordination office in Kathmandu housing administrative, coordination and managerial staff who reported to the country office. Differing viewpoints on this set-up emerged during project evaluations. Perhaps the main lesson learned is the need for flexibility, adapting to needs over time. In the first year or two after the earthquake, it was important to have senior project staff based in Kathmandu, as it was here that they could interact with the government authorities taking decisions. The procurement of materials was also organised more efficiently in the capital. Later, especially once elected municipal and ward level representatives were in place, there was a greater need for communication by project managers at local level. Similarly, once supply chains developed, procurement could also be organised locally.

National personnel; expatriate input for specific tasks

Almost all the immediate relief work was conducted by national Helvetas staff. During the emergency period, the three Swiss staff present in Nepal at the time were engaged, generally part-time, in coordinating with donors and international agencies, generating funds, and in strategic decision-making. Once the consortium with Solidar Suisse was formed, a senior humanitarian expert provided important, pertinent advisory inputs early on. He was followed by a series of five resident expatriate specialists, one after the other, who were based in Melamchi. Their professional contribution in earthquake-resilient housing design and construction techniques was highly valued.

The position of the Nepal government was to minimise the number of foreign nationals per relief organisation as far as possible. Furthermore, after the immediate emergency period, all such organisations were required to register with the SWC (Social Welfare Council) and to work through local NGO partners, especially in social mobilisation. This is fully in line with the UN Agenda for Humanity.



“During the emergency period immediately following the earthquake, striking the balance in priority setting was crucial: to do whatever possible to support both the victims and your own family members; to decide in which geographical area to work – the epicenter or Helvetas’ working area; to avoid delaying other development projects whilst working on the humanitarian response; and to support activities on the ground whilst writing proposals to new donors for humanitarian aid. Most important of all, we needed to build rapport with new institutions such as the Disaster Committees and reconstruction authority at the same time as working with existing line ministries. The earthquake’s devastation was of course limited to a certain geographical area; in other parts of the country, regular development activities could continue. However, some of the staff on these projects had volunteered to work on earthquake response

activities – we developed a rotation system so that they did this part time, until dedicated earthquake response staff could be hired. In these cases, I had to negotiate with donors about delayed project outputs. Some donors were much more understanding and accommodating than others. Balancing different donor demands and expectations took up a substantial amount of my time.”

Bharat Pokharel, Country Director, Helvetas Nepal

Simplified procurement for swift action

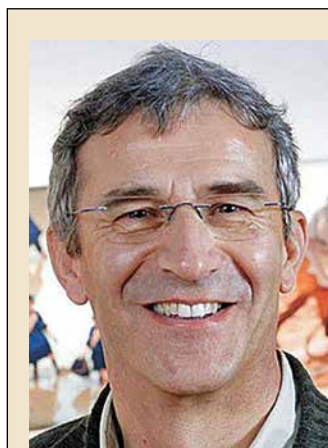
The procurement procedures of a development organisation are too complicated for situations in which speed is essential. Helvetas Nepal has therefore devised new procurement guidelines for use in humanitarian situations. A list of reliable suppliers has also been drawn up, although it was decided not to purchase emergency supplies in advance due to cost considerations, the desirability of providing fresh materials tailored to need when disaster hits, and a lack of storage space.

Human resource management

Prior to the earthquake (and because of experience during the civil conflict), Helvetas Nepal already had in place a robust safety and security system for its staff. This allowed for the rapid checking of staff safety in the immediate aftermath. The Safety and Security Officer also organised counselling for traumatised staff and their families, which was widely appreciated. In the first few months after the earthquake, responsibility for conducting relief efforts was rotated between staff to avoid over-burdening them and permit some continuation of other duties in non-earthquake affected areas. Nevertheless, the pressure of responding to the earthquake, combined with the personal trauma experienced, was often underestimated by staff themselves. A need for specialist counselling for staff is widely recognised in humanitarian organisations; it is important to take this seriously. At the same time, staff working on reconstruction projects several years after a disaster cannot be considered as under the same levels of stress as those engaged in the immediate aftermath.

Staff recruitment procedures also had to be modified in order to respond adequately to the earthquake. Helvetas Nepal has a strong workforce diversity policy, entailing affirmative action for women and members of discriminated groups. This is not practical when rapid hiring is needed. The organisation has therefore developed a policy for short-term recruitment in the case of emergencies that waives workforce diversity criteria.

Fund-raising, visibility



"In the early days after the earthquake our Communications & Fundraising Department tried very hard to increase Helvetas' visibility by insisting that our field staff wore a kind of Helvetas "uniform". Together with the Helvetas Nepal management I refused because of the negative feed-back that we received from villagers who were badly affected by the earthquake. They felt quite disturbed and exposed with all the media teams and NGO staff wandering about in eye-catching clothes. Later, we heard that Helvetas staff came to be recognised as they didn't wear such clothes, and they stayed when others left."

Franz Gaehwiler, then Regional Coordinator Himalayas, Helvetas Zurich, Switzerland

The comments of Franz Gaehwiler provide an important lesson for future emergency responses and emphasise the need for sensitivity to local perceptions. Many humanitarian organisations use eye-catching clothes branded with their logo to enhance their visibility for donation purposes. It is true that this can be very effective. It is also argued that such clothes encourage team-work amongst staff and allow for accountability to affected people. However, caps and T-shirts can (and do) exchange hands easily, so the accountability intention may be undermined. Ultimately, respecting the feelings of disaster affected people should be paramount.



Sarina Lama of the Halde water irrigation users group. Photo: Flurina Rothenberger

6. CONCLUSION

For Helvetas Nepal, the first year after the earthquake represented a particularly steep learning curve in terms of adapting Helvetas Nepal organisational procedures and processes. At the same time, the importance of development experience in the country was underscored – particularly for understanding the institutional and cultural context. Despite a focus from the beginning on reaching the most vulnerable, this proved to be the most challenging task. It might have been easier had the organisation insisted on working in even more narrowly focused geographical areas within Melamchi-Helambu, targeted for their poverty and remoteness. This would also have reduced transaction costs. However, at the time there was tremendous pressure to reach all affected areas; and the Melamchi-Helambu area at least falls within one valley system. Although not a novel conclusion, it is important to highlight the need to establish a locally appropriate, transparent and accountable system for identifying vulnerable households as soon as possible after any disaster. This should be accompanied by budgeting additional support – both in terms of financial resources and staff time - to address their needs. This is an important policy issue.

It is widely reported that Nepal is at high risk of another, even more devastating earthquake. Indeed, some scientists argue that the 2015 earthquake and subsequent tremors only increased tension along part of the collision zone between the Indian and Eurasian plates (Ruegg, 2019). Lessons learned from recent experience therefore merit careful examination and internalisation.

“The framework conditions were certainly not easy and the Solidar Suisse-Helvetas consortium had many challenges to overcome. Now, four years later, I can proudly look back on the successful humanitarian response of the consortium together with the local partners and on the achievements that led to a significant improvement in the living conditions of the people affected.”

Lukas Frohofer, Coordinator Humanitarian Action, Solidar Suisse, Zurich, Switzerland



Laxmi Tamang and her husband in the polytunnel they established after agricultural training through the ReAL project. Photo: Flurina Rothenberger



A WASH user committee meeting, Melamchi. Photo: Flurina Rothenberger

References

Chhetri and Thiele, 2019. End Evaluation Report The REAP and REAP-II Projects Rehabilitation of Facilities of Earthquake-Affected People in Nepal Helvetas and Solidar Suisse

Cash Learning Partnership, CaLP and Accenture Development Partnerships, 2018. The State of the World's Cash Report Cash Transfer Programming in Humanitarian Aid February 2018 https://reliefweb.int/sites/reliefweb.int/files/resources/calp-sowc-report-web_0.pdf

Datta, Ajoy, Sigdel, Shailendra, Owen Katie, Rosser, Nick, Densmore Alexander and Rijal Samin, 2018. The role of scientific evidence during the 2015 Nepal earthquake relief efforts ODI Report, Overseas Development Institute London UK. <https://www.odi.org/publications/11044-role-scientific-evidence-during-2015-nepal-earthquake-relief-efforts>

Harvey, P. and Bailey, S. 2011. Cash transfer programming in emergencies Good Practice Review 11 Humanitarian Practice Network Overseas Development Institute, London UK <https://odihpn.org/wp-content/uploads/2011/06/gpr11.pdf>

Helvetas, 2016. Economic Recovery of earthquake Affected People, Project Document

Helvetas, 2017. Practical experiences and lessons learned from cash transfer project (power point presentation by the project team)

Helvetas, 2018. Nepalese Coffee: High quality, high demand A history of Helvetas support for a promising economic growth sector Learning Series 2018/1 Helvetas Nepal.

Helvetas, 2018. Women Masons and Carpenters: The hard work of breaking social stereotypes. Briefing Note, Helvetas Swiss Intercooperation Nepal.

Government of Nepal National Planning Commission, 2015. Post Disaster Needs Assessment Nepal Earthquake 2015 Volume A Key Findings https://www.npc.gov.np/images/category/PDNA_Volume_A.pdf

NSET, National Society for Earthquake Technology Nepal, 2011. NSET Information Kit 001/2011 Kathmandu Valley Earthquake Risk Management Project (KVERMP) <https://www.nset.org.np/nset2012/images/publicationfile/20111220133210.pdf>

OCHA 2018 World Humanitarian Data and Trends 2018, United Nations. ISBN: 978-92-1-132049-7 https://www.unocha.org/sites/unocha/files/WHDT2018_web_final_singles.pdf

Routley, Sarah and Bogati, Subindra, 2017. Accountability to affected people: Accountability to affected people: A review of methods and practices in the Swiss Solidarity funded response to the Nepal earthquake Report submitted to Swiss Solidarity

Ruegg, Peter, 2019. Waiting for the complete rupture 16.01.2019 <https://ethz.ch/en/news-and-events/eth-news/news/2019/01/waiting-for-the-complete-rupture.html>

Slim, Hugo, 2019. Joining What Belongs Together? The triple nexus and the struggle for policy synthesis Rural 21 1/2019 Volume 53 https://www.rural21.com/fileadmin/downloads/2019/en-01/Rural21_1_2019.pdf

Shelter Cluster Nepal, 2015. Tool for Shelter Cluster Partners on Beneficiary Targeting and Prioritisation <https://www.sheltercluster.org/sites/default/files/docs/prioritisation-final.pdf>



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