

The Context

As an organisation Concern Worldwide is committed to working with the Extreme Poor in the poorest and most vulnerable contexts. At a country level, Chad falls into this category – with a per capita national income of US\$1,105 per year, it is ranked 183rd out of 187 on the Human Development Index (HDI)ⁱ, 133rd out of 135 on the Global Gender Gap Reportⁱⁱ and is susceptible to many and frequent shocks. Regular and continuous challenges relate to protection and assistance for refugees, assistance to people affected by malnutrition, food insecurity, epidemics, floods and droughts, as well as the repatriation and reintegration of migrants returning from Libya and Nigeria.

Chad was affected by the 2012 Sahel food crisis. During the peak of the food crisis 28% of the population was moderately food insecure and 14% severely food insecure. In the Dar Sila region in the east of the country, where Concern works, the proportions rose to 47% and 18%, with lack of food, health services, water and sanitation resulting in high Global Acute Malnutrition (GAM) rates of 16.3% and Severe Acute Malnutrition (SAM) rates of 2.5%.

Concern has been operational in Chad since 2007, originally in response to the needs of Internally Displaced Persons (IDPs) and conflict-affected host communities in the East, managing seven IDP sites in the Sila Region until 2010. As people started to return home, our programme shifted to working with communities in their villages of return. Our aim is to work in areas where there are recurrent food crises and droughts, with a focus on increasing people's resilience and their ability to better manage the causal factors that lead to spikes in food and nutrition insecurity in the short term.

Defining Resilience

Research and documentation reviews have shown that the potentially catastrophic food and nutrition crisis of 2012 in the wake of drought in West Africa's Sahel region was as much one of eroded resilience as a general shortage of food. Agricultural production in the Sahel was reduced due to late and irregular rains and prolonged dry spells in 2011 and was 26 per cent lower than in 2010. However, 2010 was one of exceptional rains and a record harvest. The startling fact is that the 2011 harvest across the Sahel was **only 3% lower than the average of the past five yearsⁱⁱⁱ**.

Concern understands resilience as *the ability of a country, community or household to anticipate, respond to, cope with, and recover from the effects of shocks, and to adapt to stresses in a timely and efficient manner, without compromising their long-term prospects of moving out of poverty^{iv}*. Resilience is essential to people's livelihoods and their ability to accrue assets and maximise their returns on these assets. Enhancing resilience is essential to dealing with the risks and vulnerabilities and inequalities that people face. When shocks do occur, resilience is about the ability to *bounce back better*, and in the face of stresses to be able to adapt to a changing and increasingly unpredictable environment through increased livelihoods *diversity, learning* from experience, and *innovation*.

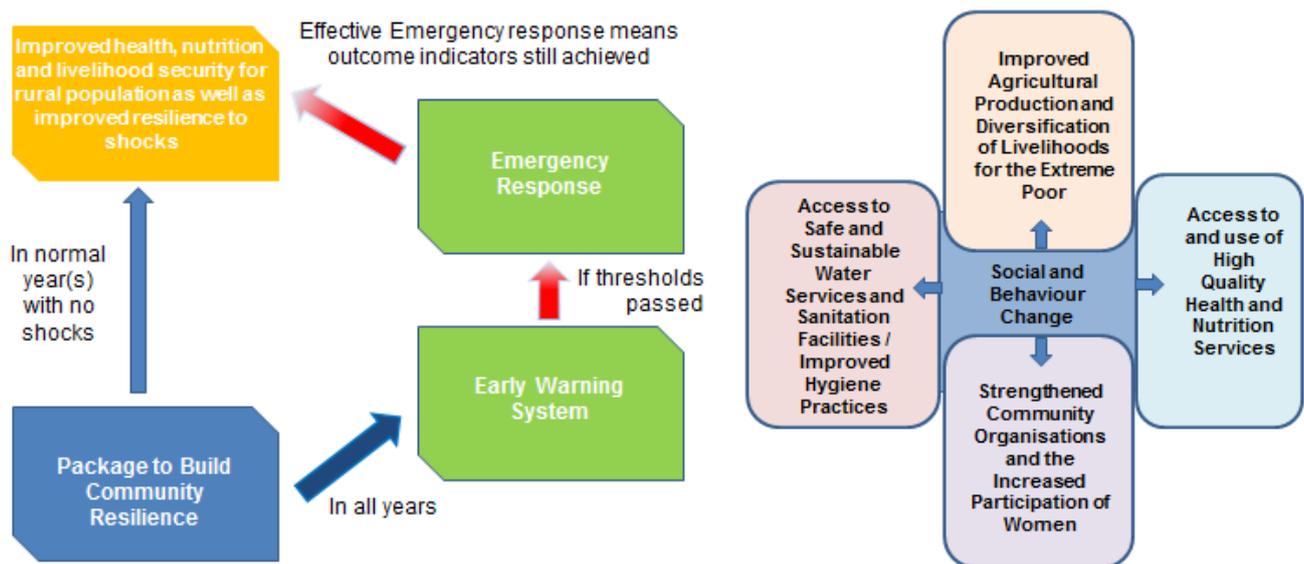
Resilience calls for more integrated programming between the often separate development and humanitarian sectors, but also between standalone technical projects in a number of areas, such as water and sanitation, nutrition or agriculture. This integrated approach is increasingly necessary as the complexity of problems presented by, for instance, climate change, requires a new approach to development programming. Resilience also includes the need for early warning and response to be embedded in more long-term development programmes.

Designing for Resilience

Learning from past experiences, Concern in Chad has designed a medium term intervention (running from 2012 to 2016) that brings together activities related to water, nutrition, disaster risk reduction (DRR), livelihoods and inequality **to improve the overall health, nutrition and livelihood security of the rural population of Dar Sila (Eastern Chad) while improving their resilience to shocks**. Taking this integrated approach means that we will be able to deliver a range of projects which address multiple needs through coordination across a variety of sectors to achieve common goals. Success will be assessed through measuring household wealth (through proxies such as livestock ownership and household assets), which in turn is expected to lead to increased dietary diversity, reduced negative coping strategies, and increased food security. Improvements in health and nutrition will be measured by improved practices around child health and behaviour, while improvements in water and sanitation will be measured by increased access to potable water and latrines. The impact of the whole programme will be reflected in terms of improvements in nutritional status of children and maternal health.

The programme will also incorporate a comprehensive community based Early Warning System (EWS) to identify the early onset of potential shocks, enabling us to deliver early an emergency response package that can be rapidly scaled up for delivery in the most effective manner possible, bringing together humanitarian and development programmes in an integrated manner.

Figure 1- Linking humanitarian and development programming in an integrated manner



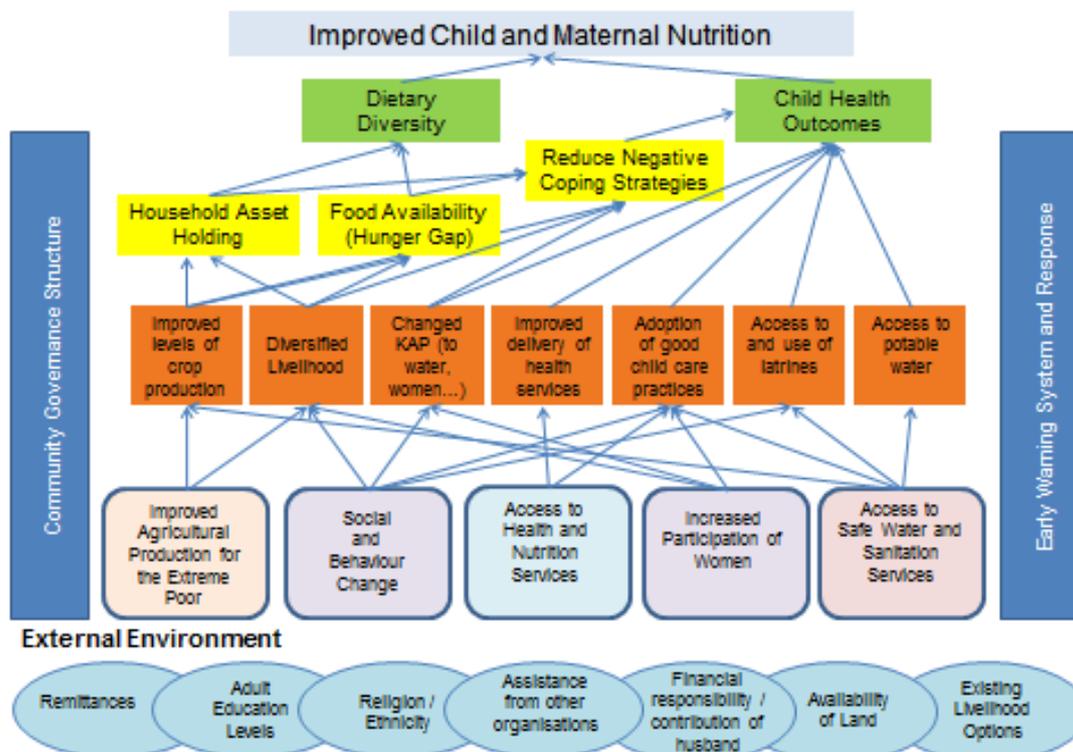
The first part of the intervention is to provide an integrated package to beneficiary communities to build long-term community resilience. This focuses on five specific areas of intervention:

- Improving agricultural production and diversifying livelihoods and assets. Specific activities include the promotion of conservation agriculture and homestead gardening, measures to improve soil fertility, enhancing the delivery of extension messages to farmers and the developing of Community Animal Health Workers. At the same time we will work with beneficiaries in enhancing their links to local and regional markets.
- Improving access to health services through community health outreach, community case management and care groups and the effective management of moderate acute malnutrition at that level. At the same time we will work with the Government to strengthen the management of the formal health system.
- Increasing access to safe water and promoting improved sanitation and sanitary practices at community level.
- The fourth element is to work with community groups at all levels, including establishing overall apex bodies for better governance, to enhance their capacities, and to ensure that women participate fully in these. This will necessitate working closely with community leaders and targeting change in their attitudes and behaviours. One of the outputs from this will be the production of a disaster management plan.

- (e) To achieve all of this it will be necessary to promote social and behaviour change amongst those we work with – this comes across all elements of the work, including changing feeding practices, encouraging better hand washing techniques and changing how farmers plant their crops.

The second part of the programme includes the development of an EWS that identifies thresholds on key indicators that signal the need for an emergency response. The first level of intervention for any response will be the community themselves, who will act on their own disaster management plans. After that, the programme will initiate a response, which includes strengthened capacities for market analysis and nutrition surveys, having systems in place to scale up cash interventions, a system for the immediate distribution of emergency supplies, having village maps that identify the most vulnerable to shock and a strategy for scaling up staff capacity.

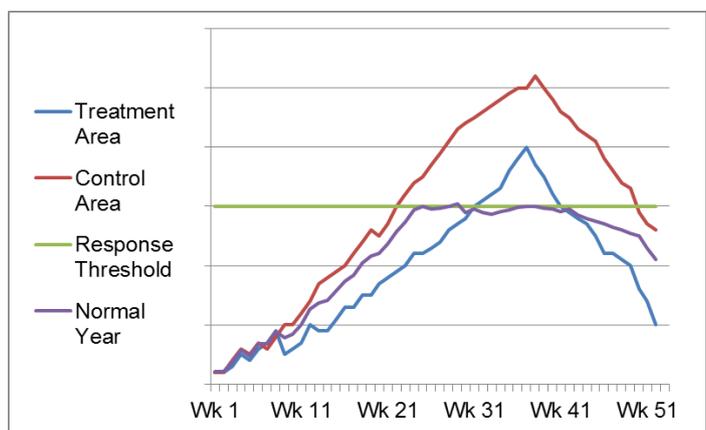
Figure 2- What we hope to achieve without the need for an intervention



In essence, we hope that through the provision of this integrated package we will have a positive impact on child and maternal nutrition in a “normal year” (Figure 2).

However, we know that in Goz Beida, about one year in three brings comprehensive weather related shocks. Figure 3 shows what we hope to achieve here. The purple line represents the values for one of our early warning indicators in a normal year – this fluctuates on a seasonal basis and may come close to the intervention threshold. The horizontal green line represents the intervention threshold – once we go above this level, we need to consider an emergency intervention. We expect that in one year in three this intervention threshold will be crossed and the spike will be quite high (the red line of the graph). However, through our resilience-building package we expect those spikes to be much lower and later, and more importantly that the recovery will happen quicker (the blue line on the graph).

Figure 3- How we would protect this in an intervention year



Producing Evidence

There is a lot of interest in systems to build resilience at community level; unfortunately there is not a lot of rigorous data that shows whether any particular intervention package works. In this respect, Concern is delighted to be partnering with the Feinstein International Centre (FIC) at Tufts University to rigorously test the CRAM model, and generate evidence to contribute to international discussions around the concept of resilience.

To this end, Tufts will lead an impact evaluation of Concern's programming throughout the course of the programme and will use a household survey approach to answer the following questions:

- a) To what extent has the implemented CRAM package of activities contributed to improvements in specified outcome indicators of the participating households and communities?
- b) After an emergency, to what extent has the CRAM package of activities enabled the participating households and communities to withstand specific shocks or improve speed of recovery?
- c) To what extent does the CRAM package of activities reduce the need for external response following a shock experienced by the participating households and communities?

Observations gathered through the household survey will be further investigated through qualitative assessment following the implementation of the baseline survey. The quantitative evaluation will collect data from participating households on control, process, and outcome variables. Control variables relate to household and community demographics, including education levels of adults, religion, ethnicity, cultural norms surrounding intra-household dynamics, and past displacement, access to land for production and existing livelihood options. These are variables that are not likely to change with the introduction of the programme, but which may be correlated with programme impact. The quantitative survey also measures the process through intermediate variables related to crop production and agricultural practices, crop sale diversity, livelihood diversity, household wealth, dietary diversity, coping strategies, food security, child health, access to water and latrines, and female participation in decision-making. Finally, programme impact is measured primarily by maternal and child nutrition, and overall mortality within the community.

The programme will be implemented in 53 of the 88 villages of Kimiti. 35 of these will receive the same package of services and will be rigorously monitored to test the success of the programme, 18 will receive various elements of the programme, in some instances as part of a pilot for new interventions. The remaining 35 villages will receive the benefits of the strengthened government health system in the area, and will be included in the EWS; they will also be surveyed, to be able to demonstrate that the intervention has worked. In the event these villages pass the emergency response thresholds, then Concern will intervene. In the longer term, after phase one of the programme, and if the intervention is proved to be successful, we will look to scale up this work.. All 88 villages are deemed vulnerable and so the 53 beneficiary villages will be chosen randomly.

The impact evaluation was developed with a two-stage randomized experimental design, stratified by priority level, where Priority 1 villages are those in the northern part of the region which are geographically more prone to drought (32 villages), and with Priority 2 villages in the south of the region which historically experiences more rainfall (38 villages). Within each of the strata, the programme will be randomly assigned on the village level.

A baseline survey was carried out in all 70 villages in November and December 2012, and will be followed by a midterm in November 2014 and an endline in November 2015.

ⁱ UNDP (2011) Human Development Report, 2011 (<http://hdr.undp.org/en/reports/>)

ⁱⁱ World Economic Forum (2012) Global Gender Gap Report 2012 (http://www3.weforum.org/docs/WEF_GenderGap_Report_2012.pdf)

ⁱⁱⁱ Peter Gubbels (2012) Improved Community Resilience to Chronic Food Insecurity and Food / Nutrition Crises in the Horn of Africa and the Sahel: Literature Review for Concern Worldwide

^{iv} Shocks are single events with negative consequences, such as natural disasters or some types of conflict. Stresses are gradual changes with negative consequences, such as climate change, or slow changes in the economic or political context)

