

PRACTICE BRIEFING

Integrating approaches: Sustainable livelihoods, disaster risk reduction and climate change adaptation



Disasters and climate change are increasingly influencing the attainment of development objectives. Poor people regularly face hazards and stresses which undermine their lives and production systems, and on occasions result in widespread disaster. Climate change is causing many hazards and stresses to increase in frequency and intensity. The unpredictability of future climate and weather patterns means that potential pathways out of poverty are less obvious. In December 2009, Practical Action hosted a seminar bringing together academics, practitioners and policy-makers to explore how thinking on climate change adaptation and disaster risk reduction can be integrated with sustainable livelihoods approaches for more effective and sustained poverty reduction. This briefing paper provides an overview of the theme of the seminar, followed by summaries of the presentations made there.

Overview

In the past, work on sustainable livelihoods, on disasters, and on climate change was addressed by different communities of practice with differing priorities and assumptions. Whilst varied entry points still exist, the synergies between these approaches are now being recognized.

Sustainable livelihoods approaches take a holistic and people-centred approach to understanding and addressing the diverse factors that influence poverty and well-being. Livelihood projects tend to focus on increasing household access to assets, and thus to greater income-earning opportunities. This is often at the expense of addressing the hazard context, i.e. ensuring the safety and adaptability of people and their assets in hazard-prone environments. As climate change comes to the fore, the need for a more dynamic analysis of socio-environmental systems is being recognized, and climate predictions are being incorporated into livelihoods analysis.

Approaches to disasters have tended to focus on response, recovery and reconstruction – typically the domain of humanitarian agencies or divisions. Shifts towards disaster prevention and preparedness emphasized hazard-specific structural and organizational measures, such as emergency plans. More recently, however, the risk reduction agenda has recognized social and economic aspects of poverty as underlying causes of disaster risk, and that strengthening and protecting livelihoods is an important strategy for preventing disaster.

Early work on climate change focused on trying to predict changes in climate and weather and project how these might impact on physical environments and economies. Action was directed towards climate change mitigation, i.e. reducing further greenhouse gas

emissions. However, more recently there has been a shift towards understanding the impacts of climate change on the poor, and the action needed to ensure they are able to adapt to those changes, which remain uncertain. Again, strengthening livelihoods is increasingly seen as a critical strategy for supporting adaptation.

The seminar addressed three areas relating to integration of approaches: examples of practice on the ground; how integration is being scaled up into policy and wider institutional practice; and what frameworks have been developed to aid integration.

Integrated approaches in practice

Three presentations, and a number of posters (see p. 12), illustrated experiences from the field. These demonstrated strong consensus that holistic, livelihoods thinking is relevant to understanding and addressing disaster and climate change impacts. Research by the Institute of Development Studies (IDS), Tearfund and Action Against Hunger (Naess et al., p. 13) applied a livelihoods approach to researching how herders and farmers in Mali and Ethiopia are coping with the impacts of climate change. Practical Action Nepal (Gurung, p. 4), working in areas prone to flooding and landslides, have strengthened livelihoods and income as an explicit approach to reducing disaster risk, alongside more traditional disaster prevention and preparedness activities. The Western Orissa Rural Livelihoods Project (Everett, p. 5) focused on different aspects of asset strengthening, but concluded that this approach also achieved vulnerability reduction and climate adaptation outcomes.

The examples made it clear that livelihood diversification – increasing options as well as income – is central to helping households and communities to cope with hazards and adapt to climate change.

Challenges of bottom up and top down

The challenge of strengthening integrated approaches in policy and practice was addressed from two angles: how to scale up project experience within government, and how to ensure that international policy commitments are translated into practice. The case from Nepal (op. cit.) recognized the challenge of disjointed policy and practice in government. This was tackled by building district government capacity to support integrated analysis and planning in communities, and incorporate the outcomes into district development plans.

Oxley (p. 6) shared experience from grassroots monitoring of implementation of the Hyogo Framework for Action – an internationally agreed policy on national support to disaster risk reduction. This multi-country civil society process has had many benefits in terms of improving downward accountability and opening spaces for dialogue between communities and policy makers. Similar methodologies could be applied to monitoring policy commitments to supporting climate adaptation.

Integrated frameworks

Frameworks and approaches are evolving to help guide staff, partners and policy makers towards more integrated practice, and there is also a need for learning processes to ensure they are effective.

The Adaptive Social Protection framework described by Arnall et al. (p.7) brings together social protection, DRR and CCA approaches to ensure that asset transfers contribute to climate-resilient livelihoods. Ewbank (p. 8) articulates a set of steps developed by Christian Aid for incorporating climate change analysis into existing participatory vulnerability and capacity assessment, drawing on both climate science and local knowledge to inform risk assessment and develop future scenarios. Practical Action's Vulnerability to Resilience approach (Pasteur, p. 9), rather than attempting to forecast an uncertain future, highlights building communities' capacity to adapt to a wide range of potential climate

outcomes. Through improved access to relevant information, technologies, skills and resources, they are able to modify livelihood strategies and respond to changing disaster risks.

Twig (p. 11) recognized that frameworks are useful tools but that learning processes are also important to ensure that they are adapted to local contexts. Experience developing a set of *Characteristics of a Disaster Resilient Community* produced lessons for more process-oriented approaches.

Conclusion

The papers and workshop discussions demonstrated strong agreement that integration of livelihoods, DRR and CCA approaches has much to offer. However, challenges still remain. Although scaling up of integrated thinking into national planning systems was touched upon, it remains a critical challenge. Frameworks and models of good practice now exist amongst NGOs and researchers. Building understanding, capacity and appropriate structures for adoption within government and other institutions is now a priority.

A further challenge is how to deal with the gap in knowledge about the climate over the next 20 years. Whilst short-term weather forecasts and long-term climate predictions can be quite accurate, much uncertainty lies between. Scenario planning is of relevance when there is confidence about possible outcomes. However, more work is needed to better understand adaptive capacity, that is, the dynamic ability to adapt to sometimes unpredictable change.

Finally, it was recognized during the seminar that most practitioners were still working with the expectation of reaching a climate agreement that would limit us to a rise in global temperatures of less than 2 degrees centigrade. If this is not achieved, and global temperatures rise to 4 degrees or more, with vastly increased risks to livelihoods and ecosystems, then the above approaches may not be sufficient to maintain well-being and more radical strategies will need to be considered.

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See also

Details of the seminar including powerpoints and sound recordings of presentations are available on the Practical Action website at <http://practicalaction.org/reducing-vulnerability/integrating-approaches-seminar>



Practical Action, Bangladesh

Climbing above the flood level in Bangladesh

LOCAL CLIMATE ADAPTATION IN ETHIOPIA AND MALI

Farmers and herders in African drylands are often considered as being on the front line of climate change. Collaborative research between Action Against Hunger (ACF), Tearfund, and the Institute of Development Studies (IDS), in Ethiopia and Mali showed a considerable capacity of households to adapt to what they perceive as changing rainfall patterns, but also significant costs and barriers to their responses.

Preliminary findings from the study, due to be published in early 2010, illustrate some key areas for support to strengthen adaptive capacity.

Changing risks and impacts

A perception of changing rainfall patterns features prominently in both country case studies. Over the past ten years, the rain has become increasingly unpredictable and erratic; the seasonal rains have started later and finished earlier. This is detrimental to people's key assets, cattle and farmland, which are vulnerable to climate risks. Key trends that affect households' ability to tackle climate risks include increasingly limited livelihood choices and reduced solidarity in times of stress. Recurrent drought has significantly reduced harvests and extended hunger gaps. Communities report an increasing sense of fatigue in the face of the changes they are experiencing. Even richer groups are experiencing increasing losses of key assets from multiple shocks, and an increasing feeling of insecurity.

Challenges to adaptation

A number of adaptive strategies were observed in response to climate and other stressors, but many are associated with costs to households' livelihoods. For example:

- Reduced pasture quality means herders adapt by travelling farther and for longer periods with their animals. However, yield from livestock is still insufficient. Furthermore, conflict over grazing and water resources has increased between local people and those from different areas passing through.
- Poorer households often use labour migration in times of need. However, this can reduce households' abilities to look after their own farms, thus increasing their vulnerability to future shocks.
- Formal and informal community and external institutions have traditionally provided support during drought. However, access to support from community institutions is, to a large extent, dependent on gender and wealth. Furthermore, as times have become tougher for all, external institutions are only partially able to fill the gaps in support that households need.

Key recommendations

The following areas of action could strengthen existing household adaptive capacity and community solidarity, in order to avoid strategies that further increase vulnerability.



Samuel Hauenstein Swain

Livestock herder in Djebock, Mali

- Increase the options of the poorest people to diversify their livelihoods, by improving their access to and sustainable use of assets such as agricultural inputs, natural resources and credit, particularly during critical hunger periods.
- Strengthen existing local institutions with financial and technical support so that they can boost household strategies (regardless of the wealth, gender or ethnic identity of household members) and fill gaps in institutional support.
- Integrate adaptation into national development policies, with a joined-up approach between agriculture, water, nutrition, the environment, climate change and disasters. Longer term programmes are needed in order to effectively build resilience to climatic and economic shocks.

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See also

Changing climates, changing lives: Adaptation strategies among pastoral and agro-pastoral communities in Ethiopia and Mali. By ACF International, IDS, TEARFUND, IER, A-Z CONSULT, ODES. In Press. <http://tilz.tearfund.org/Research/Food+and+Security+reports>

DISASTER RISK REDUCTION THROUGH LIVELIHOOD IMPROVEMENTS

Communities are vulnerable when they have limited livelihoods assets and options, and are frequently affected by hazards such as flood, drought, crop pests, livestock diseases, etc. Their vulnerability is further amplified when local or national policies and plans do not address their needs. Vulnerable communities can fall into disaster when even a small shock or hazard affects them.

Practical Action Nepal has been working with communities in Chitwan and Nawalparasi Districts who frequently face drought, flood and wildlife hazards, being close to a national park. This project has taken a livelihoods approach to disaster risk reduction. It recognizes that unsustainable livelihoods, e.g. deforestation, cultivation of steep slopes, unmanaged grazing etc., can exacerbate hazards. In turn, hazards can undermine livelihoods through land erosion, destruction of crops, damage to infrastructure, and loss of life.

Livelihoods approach to disaster risk reduction

Two key strategies are pursued in order to reduce vulnerability to disaster:

- minimizing the adverse impacts of hazards on assets and resources through prevention, protection and preparedness; and
- ensuring effective recovery through strengthening and diversifying livelihood strategies.

After carrying out a participatory vulnerability analysis, community members are now able to understand the hazards and take steps to protect their lives and livelihood assets. This is achieved through improved forest management which reduces hazards such as flooding and landslides. Gabions and bunds have been constructed which protect land from erosion when flooding does still occur. Early warning systems, response plans and emergency shelters have been established to ensure that lives (human and animal) can be protected.

Interventions have helped communities to strengthen their access to livelihood assets, and to diversify their livelihood options, which enables them to recover from hazards more quickly. For example, they have successfully accumulated assets, including cash through saving and credit schemes, which can be drawn on to cope in times of need.

Scaling up into policy

To achieve this kind of change at scale, government and other agencies need to take a similar integrated approach to development and disaster management. Practical Action has built the capacity of local government and partner NGOs to work with communities to analyse and address vulnerability. Community plans are now incorporated into District Development Plans in Chitwan and Nawalparasi.

Adaptation strategies

Communities in these districts are already starting to feel the impacts of climate change in the form of more frequent and unpredictable hazards. Therefore, the above strategies to support disaster risk reduction are ever more important. Furthermore, strengthening access to livelihoods assets is proving to be critical to ensuring households and communities are able to adapt to changes in weather patterns. In addition to these strategies, work by Practical Action has led to the conclusion that access to new types of information will also be critical: not only information about climate change and its potential impacts, but also new skills and technologies which will help communities to maintain production under an unpredictable environment.

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Practical Action, Nepal

Using gabions to construct dykes for flood protection at Kolhuwa, Nepal

See also

For further information about this work and related publications, please visit http://practicalaction.org/nepal/region_nepal_disaster_climate

LEARNING FROM A LIVELIHOODS PROJECT

The Western Orissa Rural Livelihoods Project (WORLP) was designed to alleviate poverty and reduce vulnerability in four of the most disadvantaged districts in Orissa, India. Using a Sustainable Livelihoods Approach the project demonstrates important development impacts which are found also to enhance climate change resilience and adaptation.

WORLP, a partnership between the Government of Orissa and the UK's Department for International Development (DFID), started in 2000 and is still on-going. It has had a substantial impact on poverty, with a 30 per cent reduction in the number of poor households recorded in the project districts. Approximately 15,000 households or 72,000 people have moved above the poverty line. Much of this success can be attributed to enhanced levels of financial, human, natural and social livelihood assets. Five successful strategies of the project can be highlighted.

Project strategies and impacts

1. *Empower the poor.* Participatory approaches were used to engage with poor and very poor people, to empower and inform them. This created an enabling environment for them to make informed choices for their long-term well being.
2. *Build human capacity.* Substantial technical support to increase skills in both farm and non-farm activities helped people to strengthen and diversify livelihoods. Crop yields increased significantly, often 50–100 per cent. Lean season food deficit days and stress migration have significantly reduced.
3. *Build institutions for the poor.* Over 5,000 self-help groups with over 65,000 members were supported. The increased number and strength of SHGs increased social cohesion, reduced people's vulnerability, and increased the opportunity for collective action in case of climate-related shocks.
4. *Provide access to resources.* Ensuring appropriate entitlements to land and water resources enabled poor and very poor people to benefit from opportunities and invest in their future.
5. *Manage natural resources.* Community water harvesting technologies enabled better water management, reduced fluctuations in, and raised, the groundwater table and improved hydrological conditions. This in turn enabled the expansion of aquaculture and agriculture. The gross land area cropped increased by around 16 per cent, with cropping intensity up by 10 per cent.

Reducing vulnerability to climate change

Climate change risks in Western Orissa are considered substantial, with increasing variability of rainfall, extended dry spells and droughts, and flash floods during the rainy season. Whilst WORLP was not designed with any climate change adaptation objectives, all the interventions described above helped reduce vulnerability, by ensuring that poor and very poor people



The self help group 'Maa kamalini' is for widows

are better able to cope with anticipated hazards and adapt to a changing environment.

Improved command over resources increases the strategies available to prepare for climatic change, such as soil and water conservation or investment in resistant agriculture. Diversifying incomes increases resilience to climate shocks through ensuring alternative sources of food and income when the main source fails. SHGs increase the opportunity for collective action to address the impacts of climate change.

The project is also now incorporating new initiatives to help build adaptive capacity to climate change, principally through Climate Change Schools, based upon the successful model of Farmer Field Schools.

In conclusion, there is much that can be learned from the field of poverty alleviation about reducing vulnerability to climate change and enhancing capacity to adapt.

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Impact Assessment of Western Orissa Rural Livelihoods Project, by Sambodhi and Winrock International, 2008, available, along with many other publications of potential interest, on the WORLP website: www.worlp.com.

BUILDING CLIMATE RESILIENCE – EXPERIENCES FROM DISASTER RISK REDUCTION

'The people I work with every day see many clouds – international initiatives and plans – but very little rain – actual change at the frontline'. This quote from Donald Mtetemela, a development worker for over 25 years and head of an East African development organization sums up the challenge of turning the Hyogo Framework for Action (HFA) 2005–2015 – a global policy blue print for preventing disasters – into practical, sustainable activity. Lessons may be relevant to scaling up climate adaptation.

'Clouds but little rain' was the name given to the Views from the Frontline (VFL) action-learning initiative. This brought together 7,000 people and 400 organizations in 48 countries in a unique collaborative action designed to paint a global picture of the progress being made in implementing disaster reduction activities where it matters most – amongst vulnerable people.

The VFL review provided substantive evidence that, despite progress at international and national policy levels, the greatest barrier to building disaster-resilient communities is the lack of systematic implementation of disaster risk reduction activities at the grassroots level. Reports of progress fade as activities get closer to vulnerable people, particularly high-risk groups such as women and children.

Key findings were that:

- The foundation for reducing vulnerability is an understanding of the risks people face, yet this was one of the lowest scoring areas.
- Lack of resources was cited by communities as a main constraint to progress, but there are resources at local level which remain untapped.
- Turning policy into practice means finding the right balance between top-down and bottom-up engagement, through deepened engagement with and accountability to vulnerable people.
- It is not possible to measure effectiveness of policy interventions without local monitoring framework and baselines. Connecting measurable inputs at the national level with measurable outputs and outcomes at sub-national levels is essential.

Lessons for climate adaptation

Similar challenges will be faced in connecting the aspirations of internationally and nationally formulated climate adaptation policies with the realities of policy execution at the local level. Whilst experts may differentiate between DRR, CCA and poverty alleviation, at the household level the issues converge into one complex inter-related problem which boils down to the same thing – the security and well-being of people's lives, livelihoods and assets.

Accordingly, experience and insights gained through the realities of DRR execution at the local level provides relevant learning and policy recommendations that are transferable to global efforts to build adaptive capacities. There are many benefits to carrying out an impartial local level monitoring process such as VFL, for instance:

- Building a credible evidence base to link policy and practice.
- Establishing local baselines against which to measure future progress.
- Opening opportunities for policy dialogue.
- Enhancing transparency and domestic accountability.
- Enhancing local research, analytical and advocacy capacities.

Possible next steps

The lessons from the first VFL have been significant. They point towards interesting opportunities for the future. Could a VFL 2011 develop a participatory model for measuring climate and disaster resilience at the local level? Could the VFL survey indicator metrics be adapted to incorporate climate adaptation considerations? Could the geographical coverage be extended to other low-income countries?

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Views from the Frontline Report (June 2009)
Global Network of Civil Society Organisations for
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<http://www.globalnetwork-dr.org/VFLreports.htm>



PROMOTING CLIMATE-RESILIENT RURAL LIVELIHOODS THROUGH ADAPTIVE SOCIAL PROTECTION

Adaptive social protection (ASP) combines key elements of social protection (SP), disaster risk reduction (DRR) and climate change adaptation (CCA) approaches as a means to promote climate-resilient rural livelihoods in policy and practice in developing countries.

Rural livelihoods in developing countries are coming under increasing pressure due to climate change. To date, little progress has been made on thinking about how to protect the poorest and most vulnerable people from its impacts. With large amounts of financial assistance pledged for adaptation and social protection in the most vulnerable developing countries in the coming years, ASP (see Figure 1) offers a promising approach through which to channel adaptation assistance to those who need it the most.

In addition, it is becoming increasingly recognized that SP initiatives, such as cash transfers and food-for-work programmes, are as much at risk from climate change as other development approaches. They are unlikely to succeed in reducing poverty if they do not consider the short- and long-term shocks associated with climate change, such as increased frequency and intensity of floods and droughts. ASP therefore aims to address this concern by developing climate change-resilient SP programmes.

How does ASP work?

ASP recognizes that the disciplines of SP, DRR and CCA have their own strengths and weaknesses, and works to maximize the advantages that each brings to poverty and vulnerability reduction.

By combining SP approaches with DRR and CCA, it is possible to look beyond simply protecting people from transitory, shock-induced poverty, towards disaster prevention and livelihood promotion to address the structural constraints associated with poverty. For example, Practical Action's Mainstreaming Livelihood-Centred Approaches to Disaster Management project (see http://practicalaction.org/?id=mainstreaming_disaster_approaches_bangladesh) in Bangladesh utilizes asset transfer SP mechanisms for the extreme poor, as well as ensuring sufficient investment for asset appreciation and disaster protection over the longer term. This addresses some of the root causes of marginalization associated with lack of viable livelihood options rather than simply attempting to lift people out of poverty over the short term.

Similarly, considering CCA and DRR in the context of SP creates strong incentives for developing longer-term, risk reduction perspectives that increase climate resilience. For example, the aim of the Improving Capacity of Vulnerable Households project in Bangladesh (managed by BCAS, CARE Bangladesh, RVCC, and CIDA) is to increase the capacity of communities in the Gopalganj district to adapt to the adverse effects of climate change through diversification of livelihood options. Activities involve identifying vulnerable

households, carrying out beneficiary needs assessments, and providing skills development training courses for beneficiaries.

What further work on ASP is required?

Future work needs to strengthen the evidence base upon which ASP is based, focusing on the practice of SP, CCA and DRR on the ground. To this end, Institute of Development Studies is currently completing a desk-based review of approximately 150 agricultural projects and programmes in south Asia and east Africa. This evidence can form the basis of advocacy efforts on ASP amongst decision-makers in developing countries and the development community.

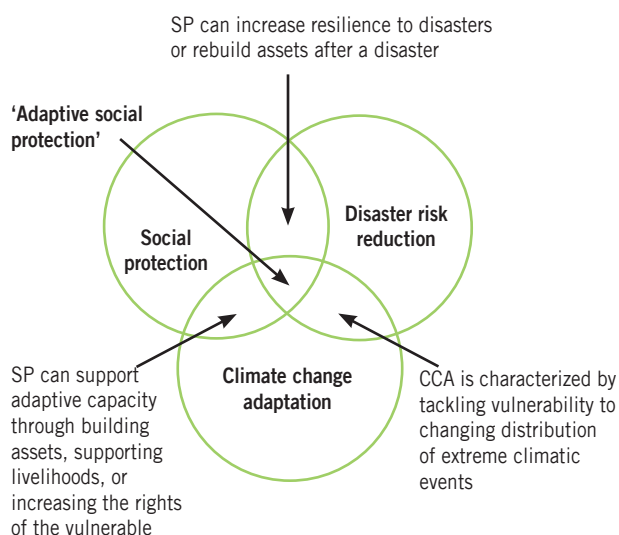


Figure 1: Adaptive Social Protection

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See also

Davies, M., Guenther, B., Leavy, J., Mitchell, T. and Tanner, T. (2008) 'Climate Change Adaptation, Disaster Risk Reduction and Social Protection: Complementary Roles in Agriculture and Rural Growth?' *IDS Working Paper*, Volume 2009, Number 320.
<http://www.ntd.co.uk/idsbookshop/details.asp?id=1084>

INTEGRATING CLIMATE CHANGE ANALYSIS – THE CHRISTIAN AID APPROACH

More than half of Christian Aid's programme funding supports livelihoods work and a substantial part of this is directed towards reducing disaster risks. A major challenge has been to integrate climate change adaptation, building on existing programme expertise and experience, rather than creating another specialism.

The key to this has been establishing frameworks that use existing tools wherever possible, explaining new concepts where necessary and building these into one integrated approach (see Figure 2). Central to this is a risk cycle management approach to development planning, where predictable risks are anticipated and long- and short-term risk reduction activities are integrated into livelihood development. In this way, time spent in emergency or rehabilitation is minimized.

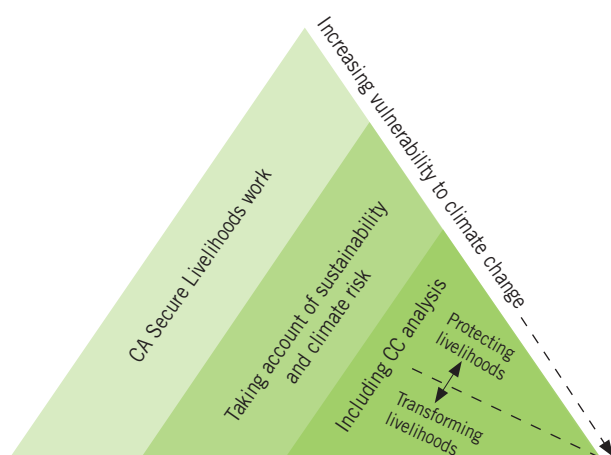


Figure 2. Christian Aid's framework for programme responses

Coping and adaptation

The problem of how to deal with the risks related to both variability and slow trends in climate is two fold:

- how to expand coping limits in the face of increased climate variability so that the damage to livelihoods of extreme events is minimized;
- how to adapt livelihoods so that longer-term resilience can be strengthened.

Participatory vulnerability and capacity assessment (PVCA) is a tool already used extensively in risk reduction work. When informed by a climate change analysis, this can be deployed to address both fast-onset disaster risk and slow-onset climate change. It also provides an opportunity to examine how long- and short-term climate change risks interact with each other and with other risks, such as earthquakes, conflict and unaccountable governance.

Climate change analysis

Climate change analysis involves five basic steps:

1. accessing climate science, and particularly time series data for key variables such as rainfall, temperature, etc;

2. documenting local knowledge, which can raise additional questions that science can address, so these first two steps may require some iteration;
3. cross-referencing science with local knowledge, increasing the value of information through triangulation and attribution;
4. prioritizing key climate risks and developing this into a forward-looking scenario to detail what might happen over the next 10 years;
5. linking back to climate scientists regularly to get the latest information in this fast-moving field, and feed back local knowledge and new information requirements.

The value of local knowledge is increasingly acknowledged and is, for example, included in regional climate outlook fora. Certain livelihoods groups, especially pastoralists, are known as 'libraries' of climate expertise and can provide vital location-specific information where gaps exist in climate science coverage.

Where science and local knowledge agree, confidence increases. Where they disagree reveals interesting points for discussion. For example, a low-density network of meteorology stations may miss flash floods cited by the community as a major emerging threat. On the other hand, community knowledge may be vulnerable to biases which need to be addressed by the scientific record.

The key issue for both national climate science institutions and the emerging Global Framework for Climate Services is how scientific information can be made available through mechanisms such as climate change analysis to support risk reduction and adaptation by the poorest and most vulnerable.

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See also

Adaptation Toolkit. Integrating Adaption to Climate Change into Secure Livelihoods. 1. Framework and Approach. Christian Aid. http://unfccc.int/files/adaptation/application/pdf/christianaid_ap_update_sep_09_toolkit_6_sp.pdf

Christian Aid Climate Change Resources, available online at http://www.christianaid.org.uk/resources/policy/climate_change.aspx – papers on various aspects of climate change, including adaptation.

FROM VULNERABILITY TO RESILIENCE (V2R)

Poverty, vulnerability, and disasters cannot be viewed in isolation from one another. Uncertainty about the future is a further characteristic of the lives of the poor, as they are affected by trends, including climate change, that are often beyond their understanding and influence. Practical Action has developed a framework to guide work which helps people move from vulnerability to resilience.

This framework (see Figure 3), known as the V2R, draws on existing approaches to help practitioners and policy makers to understand, analyse and address the multiple factors contributing to vulnerability in order to build community resilience. Resilience here is understood as not only an ability to cope with and recover from sudden shocks and seasonal stresses, but also to adapt to changes brought about by long-term trends. Even when affected by trends and sometimes unpredictable hazards, households and communities must be able to maintain food security, fully recover their livelihoods and well-being in a timely manner, and continue to move out of poverty.

Sustainable livelihoods and disaster risk reduction

Two interrelated strands of work are central to building community resilience. Firstly, livelihoods are strengthened by working through community organizations and forging links to service providers to build capacity and voice, and support access to assets,

skills, technologies and markets for enhanced production, income and security. Secondly, hazards and stresses are addressed through disaster-preparedness measures including hazard analysis, prevention, protection, early warning and contingency planning.

Dealing with future uncertainty

What is innovative about this framework is the dynamic element of looking at long-term trends and how they might affect community resilience in the future. Climate change is a critical trend, but economic policy trends, environmental degradation, and migration also contribute to future uncertainty.

Building capacity to deal with future uncertainty involves:

- Improving local understanding of trends and their impacts. Hazard analysis should be extended to take into account the impacts of future trends. Communities may need support to understand trends, e.g. why and how climate change is affecting weather patterns. Local impacts of global trends should also

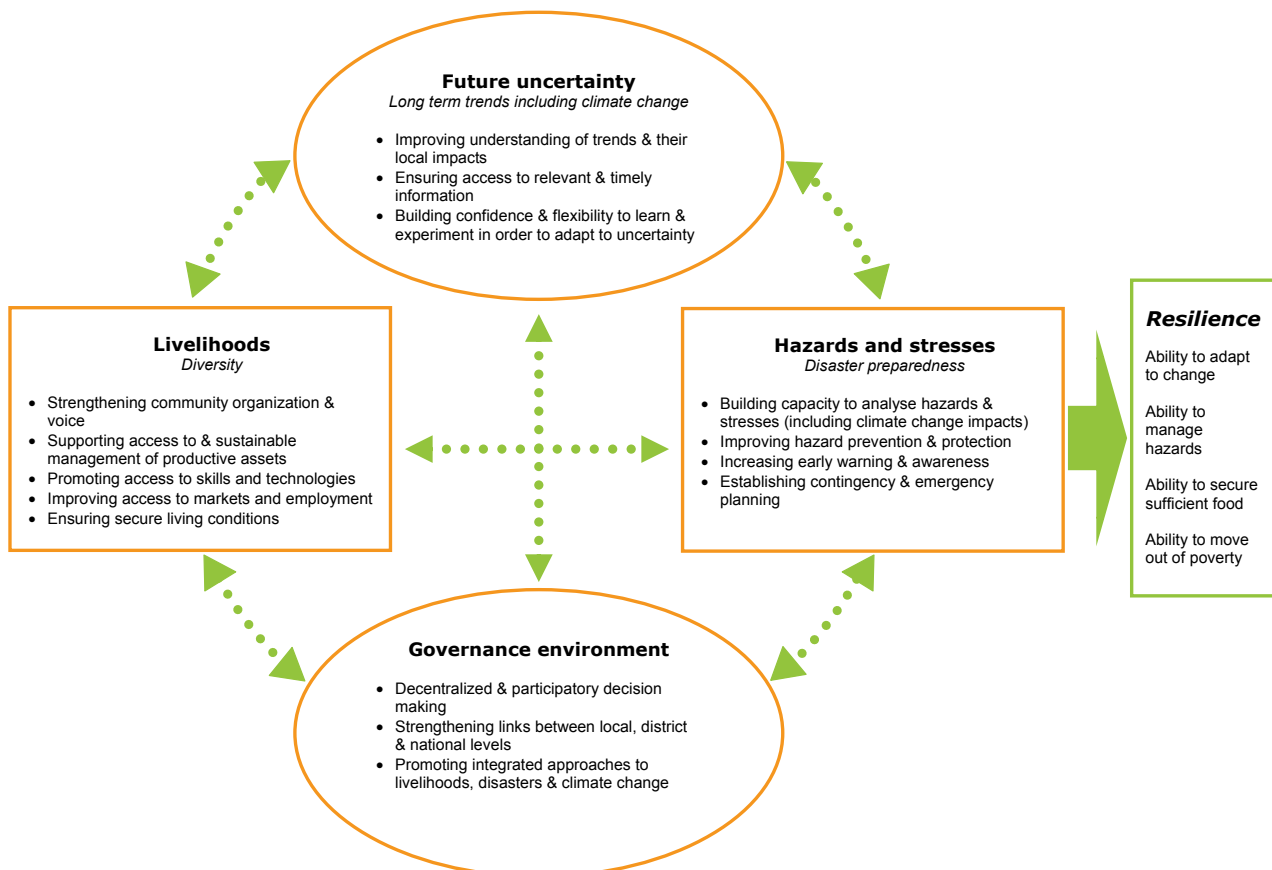


Figure 3. From vulnerability to resilience: the V2R framework



Practical Action, Peru

**Meeting on adapting to climate change in Peru.
The gradual melting of glaciers is resulting in variability in the availability of water resources**

be communicated e.g. demonstrating the effects of climate change on the poor can add to the imperative in the developed world to reduce emissions.

- *Ensuring access to relevant and timely information.* Geographically specific predictions of the impacts of climate change, economic policies, etc. can help communities prepare to adapt. However, accurate medium-term predictions are rarely available, therefore information to strengthen communities' capacity to adapt to change is often more relevant, e.g. alternative crop varieties, improved water storage, etc.
- *Building confidence and flexibility to learn and experiment.* In order to adapt, communities will need to explore unfamiliar opportunities, which can require new skills for managing risk.

Pro-poor policy and practice

Addressing the issues raised in this framework requires relevant institutions, including government departments, to understand the integrated nature of vulnerability and work together to strengthen resilience and

adaptive capacity. Action to influence policy and build organizational capacity for improved practice is a critical element within the V2R approach.

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See also

Katherine Pasteur (forthcoming) *From Vulnerability to Resilience (V2R): Guidelines for Analysis and Action to Build Community Resilience*, Practical Action. Available online at <http://www.practicalaction.org/>

TOOLS OR PROCESS? LESSONS FROM ATTEMPTS AT INTEGRATION

Many international NGOs are developing new tools and frameworks for understanding and working towards disaster risk reduction (DRR) and for linking DRR to other development approaches. But is too much importance attached to conceptual and methodological innovation? Would more emphasis on improved processes of learning and reflection within organizations be more effective in stimulating integrated approaches?

Recent work to develop and test a new resource for understanding and working towards resilience at the community level, the *Characteristics of a Disaster-Resilient Community*, has highlighted the importance of learning processes in empowering agencies and communities. Taking the UN's Hyogo Framework for Action 2005–2015 as a starting point, it breaks the concept of disaster resilience down into sets of themes, components and characteristics that become progressively more detailed in illustrating what an ideal 'disaster-resilient community' might look like. Extensive feedback from nearly two years of field testing has informed a second edition, due to be published early in 2010.

A starting point

The *Characteristics* resource should be viewed as an entry point to stimulate a process of learning and change.

- It is not a model for every situation.
- It is a resource, not a checklist.
- It stimulates and facilitates discussion.
- It helps users visualize the widest possible range of options.
- It should be adapted to the context in which used and to users' needs and capacities.
- It views resilience-building as a continuing process of learning and practice.

'Customizing' the themes, components and characteristics to particular contexts is encouraged, to make them more relevant. They are most useful when they are selected by those who need to use them, through

participatory processes of discussion and validation at the local level. In this way, resilience-building becomes a continuous process of reflection and practice.

Solution-focused

Another key feature of the *Characteristics* resource is that it is solution-focused, not problem-driven, emphasizing capacities over vulnerabilities. In practice, this has proved to be of great psychological value in creating a positive attitude amongst users, as this quote from DRR practitioners in Bangladesh illustrates:

'Previously, they knew what they wanted to prevent in a disaster-prone village, but this was turned around so that they could see what they wanted to achieve.'

Lessons for future practice

Experience with developing the *Characteristics* points to important lessons for those working towards integrated approaches to SLA, DRR and CCA. We should be working towards a progressive refinement and harmonization of existing methods, filling knowledge and methodological gaps, building on existing work by sectors and programmes, and making links. This should be seen as an organic process of learning, development and integration. Efforts should focus not on more tools but on improving capacity to use them. More attention needs to be paid to the question of what will be most useful to people working on the ground. The main demand in country is for time and space to reflect on the issues and the different tools available so that they can make informed choices about how best to use them.

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Christian Aid - Bangladesh

Community meeting during a participatory vulnerability and capacity assessment carried out in Manikgonj district, Bangladesh

See also

John Twigg (in press) *Characteristics of a Disaster-Resilient Community: A Guidance Note*, 2nd edition, DFID DRR Interagency Group, available online at www.proventionconsortium.org/?pageid=90

POSTERS

Nine posters were presented in a lunchtime session at the Seminar. These are listed below and the posters can be accessed on the Practical Action website at <http://practicalaction.org/reducing-vulnerability/integrating-approaches-seminar>

Rural transformations: Livelihood adaptation to climate change in Uganda

Sarah Cooper PhD Student. Walker Institute for Climate System Research, School of Agriculture, Policy and Development, University of Reading
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Climate change resilience in vulnerable communities: The role of information and communication technologies (ICTs)

Angelica Ospina PhD Student. School of Environment and Development, University of Manchester
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Cyclone resistant and flood adapted affordable building design in south west Bangladesh

Blanche Cameron, Consultants. RESET Development.
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Mainstreaming local perceptions of hurricane risk into policymaking: A case study of community mapping in Mexico

Prasanna Krishna Krishnamurthy, Research Assistant, Oxford University
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Institutional structures for climate change adaptation

Jon Ensor, Climate Change Policy Officer, Practical Action
Jonathan.ensor@practicalaction.org.uk

Reducing vulnerability through sustainable livelihoods - youths' perspectives from an urban slum

Phil Rundell, Masters in Disasters, Adaptation and Development, King's College, London.
rundell@gmail.com

Livelihood centred approach to resilience building

Vajira Hettige, Practical Action Sri Lanka; Priyanka Mohan, IDRC, India; Nihal Atapattu, Canadian International Development Agency, Sri Lanka Vajira.
Hettige@practicalaction.org.lk

Community based initiatives in disaster risk reduction and climate change adaptation in coastal region of Bangladesh

Mehdi Azam, Masters student, Albert-Ludwigs-Universität Freiburg, Germany,
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Disaster risk reduction: Building disaster resilient communities (BDRC) approach

Jerome Faucet, Policy and Research Officer, Christian Aid
JFaucet@christian-aid.org

Endnote

This briefing paper and seminar are the fourth in a series organized by the Livelihoods Network and funded by the Economic and Social Research Council. For more details of the seminar series, please visit: <http://community.eldis.org/sla>



Practical Action is an international development agency working with poor communities to help them choose and use technology to improve their lives for today and generations to come. Our work in Africa, Asia and Latin America is in partnership with poor people and their communities, using technology to challenge poverty. We work with poor people to build their capabilities, improve their access to technical options and knowledge and help them to influence the social, economic and institutional systems for the use of technology.

For further information, please contact:
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