

Case Story

This Case Story was submitted to the 2016 CLA Case Competition. The competition was open to individuals and organizations affiliated with USAID and gave participants an opportunity to promote their work and contribute to good practice that advances our understanding of collaborating, learning, and adapting in action.

Iterative Learning Prevents Losses From Climate Change

Emily Janoch, Nicola Ward CARE



Credit: CARE Kenya.

What is the general context in which the story takes place?

Climate variability and change is affecting Sub-Saharan Africa, with more intense and prolonged droughts, floods, and storms. This adds another layer of difficulty for managing disaster risk and achieving secure, productive livelihoods among the most vulnerable people and threatens development gains. However, climate change also presents opportunities that are rarely recognized and taken advantage of. Responding to the magnitude of the challenge requires taking a different approach, bringing together diverse stakeholders to share information sources and participate in new forms of collaboration, learning, and adapting (CLA).

The scope of the problem means that working in traditional silos is not sufficient to build the resilience of vulnerable people. Instead, what is required is an integrated approach to development, risk management, and humanitarian assistance which recognizes the current and future impacts of climate change. The approach must draw on all sectors, contexts, levels, and actors—from government officials and climate scientists to vulnerable people themselves—recognizing the contribution of the different knowledge, capacities, and experiences of each.





What was the main challenge or opportunity you were addressing with this CLA approach or activity?

Adaptation to climate variability and change is not simply about moving to new technologies, nor is resilience a stable future state. People need to continuously make decisions that anticipate and respond to potential climate crises and variability. In order to make good decisions, they need context-specific information on the climate and its uncertainties, the risks and opportunities it poses, possible impacts, and options that give the flexibility to respond to changes as they occur and build their resilience.

However, access to such information is limited and, if available, often presented in a form that decision-makers at the government and community levels cannot understand. Often, climate data is not specific enough or framed as an actionable decision point. Further, climate information from meteorological services is often viewed as overly scientific and uncertain. Information from local knowledge—which is much more accessible to communities—is not widely appreciated in formal spaces. Additionally, given the changing climate and uncertainty, traditional methods of predicting weather are less and less reliable, influenced by factors such as changes in land use patterns, changes in seasonal climate patterns, and urbanization. Even more critical, information on climate uncertainty is not well-communicated and understood to inform decision-making.

Participatory Scenario Planning (PSP), a community-based adaptation (CBA) approach developed by CARE through the Adaptation Learning Program for Africa (ALP)¹ attempts to address these challenges. PSP supports adaptation decision-making through creating a multi-stakeholder forum for access, collective interpretation, and communication of seasonal climate forecasts and associated uncertainty. The multi-stakeholder forum provides space for regular interaction, exchange of knowledge and learning, and collective planning for livelihoods, disaster risk management, and sectoral and broader climate resilient development, all informed by climate information. Its strengths lie in bringing together many stakeholders to make joint decisions that respond to all people's needs. Communities can present their interpretation of traditional weather indicators. They also express what their needs, priorities, and risks are in cases of climate fluctuation. Meteorological services bring their climate information services. Governments bring their resources and planning to ensure that their money is spent in the most effective way possible.

"When we receive temperature and rain information in degrees and millimeters, for most of us it makes no sense as we don't really know what it means," says Noor Jelle, an agro-pastoralist from Garissa County in Kenya. "It would be better if the information was more focused on letting the community know what we could grow [and] when. We have been struggling with the concept of climate change, but when ALP interacted with us and talked to us about it, we gained some interest in better understanding and using climate information from the Kenya Meteorological Department."





¹ ALP is a climate change adaptation program implemented in Ghana, Kenya, Niger, and Mozambique from 2010 to 2017. It promotes a range of CBA approaches that strengthen the adaptive capacity of vulnerable men and women to adapt to climate variability and change.

Describe the CLA approach or activity, explaining how the activity integrated collaborating, learning, adapting culture, processes, and/or resources as applicable.

ALP developed PSP in 2011, based on learning from climate vulnerability and capacity analysis while facilitating communities to make participatory CBA plans. The approach borrows from Regional Climate Outlook Forums, enabling local actors to have better access to seasonal forecasts and advisories on options for action.

PSP is as a 2-day multi-stakeholder workshop, held soon after national seasonal forecasts are released, bringing together National Meteorological and Hydrological Services (NMHS), local forecasters, community representatives, government departments, research institutions, NGOs, community-based organizations, and others. CARE facilitates and creates linkages between stakeholders.

Seasonal forecasts from NMHS and local forecasters are presented. Collectively, stakeholders discuss and merge scientific and local forecasts into a consensus-downscaled forecast for the local area. The interpretation process recognizes that for seasonal forecasts to be usable in planning, they need to relate to local livelihood, disaster risk management, development, and adaptation decisions. Additionally, participants develop scenarios and interpret uncertainty so that planning accounts for probabilities in a seasonal forecast and cater for likely and less certain situations in a season. Figure 1 shows this process.

Advisories are disseminated through a range of channels and enable more informed seasonal decisions on local government sectorial plans, early warning systems, community adaptation action plans for livelihoods, and risk reduction. The focus is on making information accessible, comprehensible, and actionable for all stakeholders as it gets disseminated. This integrated approach allows for more coordinated, timely, and targeted

Seasonal forecast (Local & Scientific) Terciles + probabilities of occurrence Scenario A Scenario B Scenario C Hazards Hazards Hazards Risks Risks Risks Impacts Impacts Impacts Opportunities Opportunities Opportunities Plan A Plan B Plan C Communication through Community monitors, religious leaders, chiefs, government departments, media etc

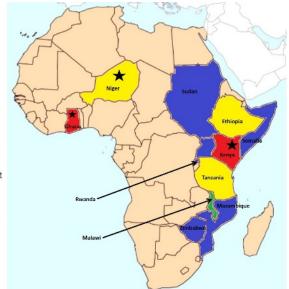
support to communities that avoids duplication and contradictory efforts and creates a concerted environment for resilient development.

PSP was first piloted in Garissa County, Kenya, during the October to December (OND) rainfall season in 2011. This involved the six pastoral and agro-pastoral communities where ALP was implementing CBA, together with the Kenya Meteorological Department, government ministries/departments (agriculture, livestock, water, gender and social development, and planning), government-appointed chiefs, sheikhs, and local organizations working in the county. Following learning from Kenya, in 2012, CBA/PSP methods have been adopted in 135 communities and eight countries that are not ALP targets, but where ALP has been able to share learning and information. CBA/PSP have been written into nine national and 66 local policies/development plans. (See Figure 2 and the question on scaling and the way forward.)





Figure 1. History of PSP Adaptation



Key

Countries in Red – PSP adopted, upscaled and integrated in development and sectoral planning

 Countries in orange – PSP implementation at pilot stage

- Countries in green PSP pilots and recognised in meteorological policy
- Countries in blue PSP champions trained and are promoting adoption of the approach
- Community managed rain gauges informing adaptation, agriculture and DRR actions

The PSP is a multi-stakeholder decision-making forum. The process is designed to be driven by local stakeholders who are purposely involved from the design step to create local ownership of the process. Building partners' capacity to understand and use climate information and related uncertainty in collective and individual decision-making and planning enables their effective engagement in PSP, resulting in reaching a wider audience who need to use the information and associated services. Step 2 and 5 of the PSP process (Figure 3) allow users and implementing partners to evaluate the process through

discussions at the end of a season on issues such as:

- How was the seasonal forecasts and advisories from PSP workshops communicated and to whom?
- How the information was communicated understood by different users?
- Was the information relevant and useful for decision-making and planning?

What is are the results and benefits of access to and use of climate information from PSP workshop? What is the current

Step 1. Designing the PSP process
Developing a locally relevant and appropriate PSP process, including deciding the level (e.g. national, country/province, distinct etc) at which to conduct PSP and forming partnerships for support & sustainability of the process

PSP is an iterative learning process

Step 2. Preparing for a PSP workshop A multi-stakeholder forum for accessing, advisories from a PSP workshop. To reach all actors who need to use the information and in focal seasonal timestrating and planting the process of the coming partnerships for support & sustainability of the process

PSP is an iterative learning process

Figure 3. Steps to PSP







Were there any special considerations during implementation (e.g., necessary resources, implementation challenges or obstacles, and enabling factors)?

Activities before and after PSP workshops are linked to broader <u>CBA</u> activities; therefore, PSP is budgeted under different activities. For example, business development skills training given to a women's group is linked to helping them decide on innovative livelihood activities informed by seasonal forecasts and advisories.

Key enabling factors include access to climate information from national weather services, governments that are willing to engage with community stakeholders for joint decision-making, and the ability to translate technical weather data into actionable recommendations for communities and governments. Another key success factor is having solid facilitation skills to bring together stakeholders and get their perspectives shared and valued across a range of backgrounds and priorities.

Figure 4 presents items that need to be costed from the entire PSP process and that are useful for developing a budget for PSP in the local area. The items do not have monetary amounts attached to them, as their costs are very context-specific, considering factors such as variations in costs between and within countries; size, accessibility, and population of the local area; where meetings in the different PSP steps are conducted, who is involved, and what their contribution is.

Figure 4: Indicative Items to be Costed, Cutting across All Steps of the PSP Process

Major PSP Activities with Cost Implications	Key Items to Be Costed
Pre PSP Planning Meetings: Step I (Designing the PSP Process) and Step 2 (Preparing for PSP Workshop): • Design, review & planning meetings by partners • Focus group discussions with various actors • Capacity building, training, or awareness-raising sessions (where applicable) PSP Multi-stakeholder Forum: Step 3 (PSP Workshop)	Meeting/workshop venue Workshop or meeting materials
	 Communication costs Meals and accommodation (where applicable), transport costs
	Daily Subsistence Allowance or per diems (where applicable)





Post-PSP Forum: Step 4 (Communicating Advisories from a PSP Workshop) and Step 5 (Feedback, Monitoring, and Evaluation):

- Preparing communication materials and channels
- Monitoring and validation visits

Challenges:

- Access to reliable climate information and the ability to use information at different timescales.
 As users become more confident in using climate information at a particular timescale (e.g., use
 of seasonal forecasts and advisories through PSP), there is increased demand for daily, weekly,
 and monthly forecasts, as well as information for I to 5 years in advance for long-term planning.
- A systemic way of accessing and understanding the changing information needs on an ongoing basis so as to develop tailored climate information products that meet these needs over time.
- Communicating probability and uncertainty in understandable and usable forms while not losing people's trust in the information.
- Setting up effective climate information communication systems that ensure PSP advisories reach all vulnerable groups, including women, nomadic pastoralists, and those who have limited access to modern communication media.

With your initial challenge/opportunity in mind, what have been the most significant outcomes, results, or impacts of the activity or approach to date?

Saving money: In Niger, investing in <u>CBA</u> and PSP showed that for every \$1 invested in community resilience, the government was able to avoid \$4 of losses. In Kenya, the numbers are \$3.72 for every \$1 invested. CARE worked with the New Economics Foundation to use Social Cost Benefit Analysis to <u>prove impact</u>.

Building trust, especially between local actors and meteorological services, through open sharing of information and knowledge, including on uncertainty. The result is increasing willingness to use seasonal forecasts and advisories from PSP in decision-making.

Offering better services:

"Before this, I used to do needs-based trainings with no consideration of how the climate would look like. Thanks to PSP, I am now able to use climate information to plan for community trainings and field assessments that are relevant to the probable impact scenarios. I allow for flexibility in my planning since I know that each season is different."

-loel Okal, Ladgera sub-county livestock production officer, Garissa County, Kenya.





"From the workshops we received information on rainfall and temperature, additional advice on what to plant when, where to get inputs, technical support ... The information is communicated in Somali, our local language."

—Noor Jelle, agro-pastoralist from Garissa County, Kenya.

In addition, meteorological services are embracing a wider user base and becoming more serviceand user-oriented. The Ghana Meteorological Agency and the Kenya Meteorological Department feel a lot more relevant now as they are more actively engaging with the users.

Taking action on climate:

Communities in Ghana, Kenya, and Niger are using seasonal forecasts and advisories from PSP to take up long-term livelihood adaptation strategies such as growing fruit trees to protect their farms from flooding, selecting adapted crop varieties, improving household nutrition, and diversifying livelihoods.

What were the most important lessons learned?

PSP depends on NMHS staff being present or available at the local government level with some level of downscaling of the national forecast. For successful advisory development, NMHS staff at PSP sessions need capacity to listen to, respect, understand, learn from, and communicate with the end users, which include farmers, pastoralists, rural communities, local government decision-makers, and intermediaries such as NGOs and service providers.

Other lessons ALP has learned that need to be taken into account:

- Link and interpret climate information at different timescales. This includes historical data such as from community-managed rain gauges, daily to monthly forecasts, seasonal forecasts, and climate projections spanning 5 years and longer. This requires national meteorological services to have better linkages and support from international climate science organizations to improve capacity in generating a seamless suit of climate information products.
- Meteorological services need to understand user needs for climate information and create user-responsive climate information products. This requires linkages and support from stakeholders in government sectors, development and humanitarian assistance to set up sustainable two-way communication systems between users, and meteorological services and intermediaries.
- Sustaining continued multi-stakeholder interaction and dialogue to co-design and deliver locally relevant climate information services benefits from integrating support for climate information services into development and sectoral policies, plans, and budgets.





Any other critical information you'd like to share?

Scaling and the way forward:

- By 2014, PSP had been mainstreamed in all 47 counties and nationally in Kenya, and
 mainstreaming in Ghana is planned. The countries' ministries of agriculture work with the
 national meteorological services at the local government level and with other NGOs.
- Through on-demand training provided by ALP, PSP has been adopted and replicated in Ethiopia (Pastoralist Areas Resilience Improvement through Market Expansion program with CARE Ethiopia); in Malawi (Civil Society Network on Climate Change and Enhancing Community Resilience with CARE Malawi); and three CARE programs in Tanzania, including the Pathways initiative.
- The International Fund for Agricultural Development has organized two learning routes in Garissa, Kenya, bringing policymakers and government staff from Ethiopia, Rwanda, Lesotho, and Sudan to listen to the PSP experience.
- In Niger, AGRHYMET is keen to adapt PSP to the local context, and CARE's Building Resilience and Adaptation to Climate Extremes and Disasters program will roll out PSP in a new region.
- In response to PSP training requests, in 2015 ALP will conduct a PSP training-of-trainers targeting committed and interested government and NGO practitioners from Kenya, Ghana, Ethiopia, Malawi, Tanzania, Zimbabwe, Lesotho, Rwanda, Uganda, as well as countries in South East Asia.
- Integration of multi-stakeholder forums into national and sub-national decision-making processes to ensure sustainability of approaches such as PSP.

The CLA Case Competition is managed by USAID LEARN, a Bureau for Policy, Planning and Learning (PPL) mechanism implemented by Dexis Consulting Group and its partner, Engility Corporation.



